

WRIGHT STATE UNIVERSITY

Human Factors & Industrial Organizational Graduate Program Newsletter

Newsletter Editor: Anirudh Kedia

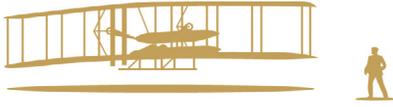
Newsletter Advisors: Dr. Debra Steele-Johnson, Dr. Scott Watamaniuk, Dr. Pam Garverick



A Message from the Department Chair

By: Dr. Debra Steele-Johnson

Hello HFIO! In 2020, we have been on a roller coaster, nationally, internationally, and at Wright State. Recent events have been stressful and frustrating. COVID-19 has raced around the world with devastating social and economic effects. National conversations are now focusing on a variety of issues, ranging from racial tensions to access to health care, to food and job security, to personal and public safety. However, from national challenges arise opportunities for Human Factors and I/O Psychologists to make contributions. For example, we have unique knowledge and skills that prepare us to make human systems better, especially in areas relating to technology, human reasoning, human resource management, and organizational functioning. We have to find better ways to work, provide services, and teach virtually. Display and interface design are of heightened importance now. Also, we have important contributions to make in terms of in recruiting, selection, training, performance appraisals—in other words, in how employers interact with employees. By providing integrated training in both HF and I/O Psychology, our PhD program has provided all of you with excellent training to bring a more integrated approach to finding solutions to these issues in your work. In a few final comments, let me note that Wright State is engaging in a university-wide reorganization, so Wright State faculty, students, and administrators are effectively active researchers/participants in a massive organizational change effort. Further, our faculty continue to maintain their robust research programs, and our students continue to make degree progress and find interesting and important jobs. We congratulate all of our alumni for their many contributions and successes, and we look forward to seeing your continued contributions. Please let us know what you're working on and thinking about, tell us about changes in your lives, and we'll keep you apprised of what's going on here.



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Graduate Program Address

by: Dr. Scott Watamaniuk
Graduate Program Director

Welcome to everyone and especially our newest graduate students. This has been and continues to be an interesting time not only at Wright State but across the country. The widespread COVID-19 virus has impacted our teaching with classes going totally online starting last March, and only recently getting back into our labs. However, our students and our program have not stopped, rather we have adapted to the situation – that is the very nature of HF and IO psychology. At this time, I would also like to congratulate and bid a farewell to the five PhD students who successfully defended their dissertation last year. We also had 10 students successfully defend their MS thesis in the 19-20 academic year. Not only is fall when we welcome new and returning students it is also when all returning graduate students tell us what they have accomplished during the previous year in the form of the annual activity report. These reports are reviewed by program faculty and used as a tool to help monitor student progress. This keeps the entire graduate faculty informed of how students are doing. The outcome of these activity reports is a letter from the program acknowledging the student's progress and offering congratulations, encouragement, and sometimes a bit of tough love. The point of this assessment is to keep students focused on the things they need to accomplish to progress through the program at a reasonable pace. In keeping with the latter purpose, these reports ask the student to identify what they hope to accomplish in the next academic year in order to provide themselves with tangible and achievable goals on which to focus.

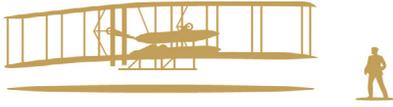
I want to highlight the important opportunity that our weekly brown bag seminars offer students and faculty. All students are required to register and attend the weekly brown bag (0 credit hours). At these Friday noon-hour seminars, our own faculty and students present their current research which is a great way for all of us to keep up with the research going on in our department. In addition, we also invite outside speakers to give presentations on topics of interest to our department. Of particular importance, we also invite our graduate program alumni to give presentations on their current work and offer advice to current students about finding jobs and working post-graduation. I truly enjoy hearing of our graduates' experiences as well as their accomplishments as they carry our program's influence into the world. These brown bag seminars are an excellent way to expand your knowledge of both IO and HF.

Ph.D. Graduates

Kinsey Bryant-Lees
Beth Frost
Daniel Bashore
Cheyna Brower
Joseph Dagosta

M.S. Graduates

Tyler Whitlock Peter Crowe
Mike Collins Morgan Borders
Daniel Jenkins Michelle Wang
Russell Islam Claire Shah
Alice Pyclick Joseph Borders



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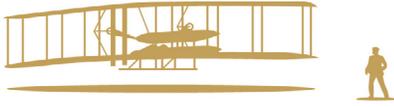
A window into current research

by: Dr. Valerie L. Shalin
Human Factors Area Leader

Dr. Shalin shares some information about her current research which is built around using naturalistic observation to analyse data from social media. You can find references to some of her research in the 'Recent Publications' section of this newsletter.

Psychological science is built on an impressive foundation of clever experimental methods and measures to test hypothesis about human behavior. For some time, my students and I have employed complementary methods, generally known as naturalistic observation, in which scientists have little control over the conditions of observation, and depend on extensive post-hoc analysis to reveal patterns and potential hypotheses for future laboratory study. One contemporary resource for naturalistic observation is social media – the mostly verbal data that participants post for public view, of their own volition.

Unlike traditional naturalistic observation that requires a dedicated, co-located observer, intrusive recording and generally labor-intensive manual coding, social media provide hundreds of thousands of data points from anywhere in the world, in the form of text that can be processed automatically. We often analyze the resulting so-called Big Data using state-of-the-art computational methods, including Natural Language Processing and Machine Learning. With partial support from the National Science Foundation and the Army Research Office, we have studied disaster behavior, global attitudes towards gender based violence, harassment, group affiliation including radicalization, political persuasion, expertise in sports, and yes, the response to COVID-19. Our analyses inform the measurement of discomfort associated with experience, the apprehension of context-dependent message intent, and spatial referents to the material world among other general psychological phenomena. Domain stakeholders like Emergency Operations hope to use our methods to assist in situation awareness, monitor public opinion and select representative crowds with diverse opinions. For more details, look us up in Google Scholar for the psychological perspective and the DBLP Computer Science Bibliography for the computer science perspective.



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Introducing our first years



Liam Stalker

I was drawn to the HF / IO Psychology program here primarily because of its importance in building science practitioners and the focus on human perception and cognition.

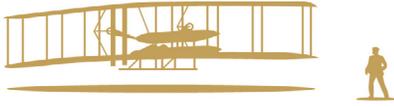
While it's hard to get to know someone from a couple of sentences, here is a minute glimpse! Starting in 2016, I attended The Ohio State University where I earned my B.S. in Cognitive and Computational Neuroscience. Though I'd worked up to the completion of my bachelor's degree, it wasn't until I landed a position as an undergraduate assistant in neuroscience research lab did I realize I wanted to attend graduate school. Though I will always be a Buckeye, I knew to come to Wright State was right for me when I discovered their Human Factors / IO program. I saw HF / IO as a unique way of better understanding the human mind and how its behavior shapes the workplace and interacts with the environment around it. My interests range widely as I've always been attracted to multi-disciplinary work.



Elizabeth Ellis

I chose to attend Wright State University because of their focus on applicability of research to the real world and their unique combination of the I/O and Human Factors disciplines.

I completed my dual degrees in psychology and business management and my Master's degree in Psychology at the University of North Florida. I became interested in I/O psychology during my freshman year of college when the topic was introduced by my Intro to Psych professor. I researched the field and became interested in researching employee well-being and turnover intention. Since then, I have been set on earning my PhD in I/O psychology.



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Krista Harris

I chose to apply to Wright State University because of similar research interests with my advisor and the countless opportunities for growth and new perspectives!

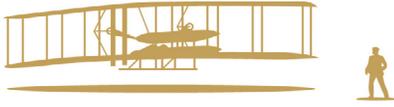
I received both my BA and MA in psychology from Marshall University. I first became interested in I-O while studying at Marshall through various courses taken and research involving attitudes and the representation of women. My current research interests include diversity, discrimination, sex and gender, personality, and attitudes.



Nick Kelling

I look forward to hopefully working with Dr. Watamaniuk, and aiding his research on the limitations of the human visual system.

This summer I graduated from The Ohio State University with a Bachelor of Science in Psychology. Throughout my studies there, I slowly came to realize that knowledge of psychology can be useful in so many more areas than just the clinical sense that most people seem to latch onto when they think of psychology. This is what initially drew me towards HF/IO. I chose to continue my education here because I was drawn towards the close-knit community experience that the campus provided during my tour. I look forward to becoming an active member of this community during my time here. I technically don't have any work experience that drew me to this field. That was mostly done through research and examining myself and my interests. I did, however, work for the Ohio State University Suicide Prevention Program updating their website and running their social media pages. During my time there, I had to pay close attention to how website viewers and our followers would perceive the content I was updating/creating since suicide can be a sensitive subject. I do hope that one day I will be able to incorporate HF into some position within the up and coming cannabis industry as it slowly continues to become decriminalized at the state level.



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Mitchell Eid

I chose Wright State to work with Nathan Bowling who has similar research interests and a great track record for developing IO psychologists.

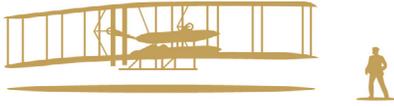
I went to the University of Central Florida for my B.S. in Psychology as well as an M.S. in I/O Psychology. Prior to that I went to school for accounting at the University of Miami to receive a bachelor's degree and the University of Florida for a master's degree. I became interested in IO after going back to school for psychology and learning what IO is. I liked the idea of combining my business knowledge with my interest in how people function. Before coming back to school I had a lot of trouble finding a career that was meaningful to me and was spending a large amount of time learning about myself by taking various psychological tests. I liked learning about assessments as well as the idea of making people's time at work more effective and pleasant. My current research interests include job boredom and other job attitudes, personality, assessments, CWB and creativity.



**Tyler J.
Vonderhaar**

I selected Wright State due to it having one of the few human factors programs with a focus in aviation in the country as well as its location in regards to Wright-Patterson Air Force Base and the Gem city.

I earned a Bachelor of Science in Psychology with a minor in sociology from Washington State University in 2019. During my time at Washington State University I was a research assistant, teaching assistant and a club officer. I became interested in Human Factors/IO after learning about the field from a documentary investigating commercial aircraft disasters. After reading more on the topic, I decided that the field was the psychology niche I was looking for. Related, but on the other side of the department, I knew about I/O psychology before and was interested in its applications for aviation and/or military special operation forces. While I am not trained in human factors I noticed its applications while working in an industrial setting; being responsible for OSHA regulations at a facility that belongs to a retail overlord, I had to be aware of how people used/misused equipment and what steps needed to be followed to ensure the safety of my employees. At the time of this writing, my current research interests include cognitive learning, neuroergonomics and aviation/military psychology.



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Alec Drabish

I chose the HF/ IO program at Wright State University foremost because of the opportunities to grow as a scientist, primarily in the research sense but in the applied sense as well.

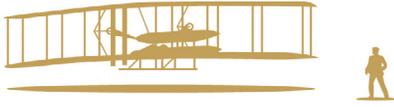
I graduated from Washington & Jefferson College and was a double major in Philosophy and Psychology. I am interested in I/O foremost because I am attracted to solving problems using scientific and empirical methods, and because I am motivated to use I/O to make the business world a better place. I plan to investigate further a pluralistic-ignorance effect in regards to employee perceptions of justice that I uncovered from an experiment at Washington & Jefferson, and to dive deeper into the predictors of employee well-being and performance with Dr. Bowling. Dr. Bowling's lab stood out because of his expertise, his wide-range of interests, and the success of his former advisees.



Mark Ramsey

I liked the mentor, lab, vibes of the department, and the Dayton area, so, given that I was also enthusiastic about the research, I quickly chose to accept Wright State University's offer of admission.

I majored in Psychology and minored in History at the Ohio State University, graduating in the spring of 2020. Prior to graduation, when considering graduate study, a mentor of mine, due to my experience in coaching and consulting, recommended that I consider industrial-organizational psychological research. When I looked at labs and their research, I was interested in research regarding careless responding in questionnaires, and I eagerly applied to Dr. Nathan Bowling's lab at Wright State. Broadly, I'm interested in studying careless responses to questionnaires. I'd like to investigate the effects that the environment in which individuals complete a questionnaire has on data quality and the degree of careless responding observed. I'd also like to investigate possible mechanisms (i.e. fatigue, depletion) through which careless responding occurs, the temporal consistency of careless responding and its effects, interventions to prevent careless responding (i.e. warnings, rewards, or changes to questionnaire structure), and, as a method, eye tracking to capture careless responding looking behavior. I'm excited to continue engaging with and mastering new information over these next few years at Wright State University.



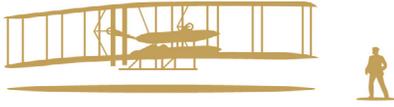
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I chose WSU because it is a family tradition. My mom went to WSU, I went to WSU for my bachelor's degree, and my husband went to WSU for his PhD.

**Lindsey K.
McIntire**

I am a senior research scientist and supervisor for Infoscitex; a local Air Force contracting company. For the past 13 years, I have been a PI for the Non-Invasive Brain Stimulation team at AFRL's Airmen Systems Directorate. My team and I utilize various forms of non-invasive neuromodulation techniques to enhance human performance in the areas of learning, fatigue, attention, and multi-tasking ability. I have over 40 publications and over 10 first author publications. I am also a fellow of the Aerospace Medical Association. I have a bachelor's degree in Political Science from Wright State and a master's degree in Psychology from the University of Phoenix. I am most interested in non-invasive neuromodulation techniques as a fatigue countermeasure. Outside of work and academia I spend my time with my family and enjoy traveling, cooking, and running.

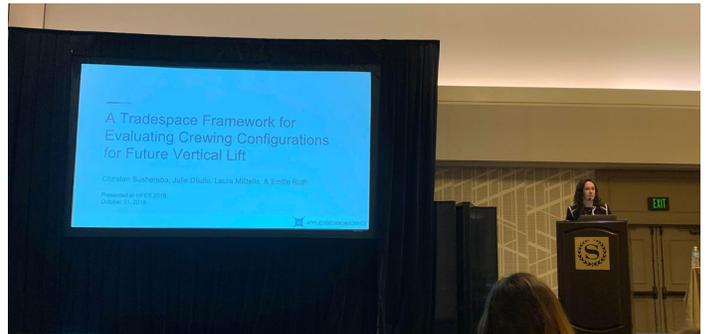


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Conference and Workshop pictures



Pre-COVID-19



Post-COVID-19



Joint Acquisition of Path and Manner Action Description

Claire S. Shah & Valerie L. Shalin

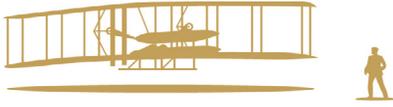
Cognitive Science Virtual Congress 2020
July 29th – August 1st

Generalizing Bayesian Strategy Use and Switch Inferences to Category Learning

Alexander R. Hough¹, Kevin A. Gluck², & Michael D. Lee³

¹ORISE at Air Force Research Laboratory, Wright-Patterson Air Force Base, OH 45433
²Cognitive Models and Agents Branch, Air Force Research Laboratory, Wright-Patterson Air Force Base, OH 45433
³Department of Cognitive Sciences, University of California, Irvine

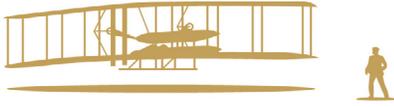


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Recent Publications

- Bowling, N. A., Gibson, A. M., Houpt, J. W., & Brower, C. K. (in press). Will the questions ever end? Within-person increases in careless responding during questionnaire completion. *Organizational Research Methods*.
- Bowling, N. A., Wang, M., Matthews, R. A., Shi, J., & Wang, Q. (in press). Non-linear relationship between targets' experienced aggression and target-perpetrated deviance: A test of the acceleration effect. *Occupational Health Science*. doi: [10.1007/s41542-020-00060-7](https://doi.org/10.1007/s41542-020-00060-7)
- Bowling, N. A., Lyons, B. D., & Burns, G. N. (in press). Staying quiet or speaking out: Does peer reporting depend on the type of counterproductive work behavior witnessed? *Journal of Personnel Psychology*. doi: [10.1027/1866-5888/a000238](https://doi.org/10.1027/1866-5888/a000238).
- Eschleman, K. J., Bowling, N. A., & Zelazny, L. (in press). Getting a grip on the gripers: Curmudgeon personality's relationships with employee well-being and interpersonal relationships at work. *Personality and Individual Differences*.
- Gibson, A. M., & Bowling, N. A. (2020). The effects of questionnaire length and behavioral consequences on careless responding. *European Journal of Psychological Assessment*, 36, 410-420. doi: [10.1027/1015-5759/a000526](https://doi.org/10.1027/1015-5759/a000526).
- Miller, C. E., Brady, M. F., & Dean, S. L. (2020). Is Conscientiousness a proxy for Depression? A study of Big Five Conscientiousness predictive power above depression. *Journal of Mental Health and Social Behavior*, 2, pp. 112 – 116.
- Rezvan M, Shekarpour S, Alshargi F, Thirunarayan K, Shalin VL, Sheth A (2020) Analyzing and learning the language for different types of harassment. *PLoS ONE* 15(3): e0227330. <https://doi.org/10.1371/journal.pone.0227330>
- Robinson, F.E., Feufel, M., Shalin, V.L., Steele-Johnson, D., Springer, B. (2020). Rational adaptation: Contextual effects in medical decision making. *Journal of Cognitive Engineering and Decision Making*.
- Rothwell, C., Shalin, V.L. & Romigh, G. (in press). Comparison of common ground models for human-computer dialogue: Evidence for audience design. *ACM Transactions on Human Computer Interaction*.
- Wang, Q., Burns, G. N., Narayan, A., Lin, M. A., & Bowling, N. A. (in press). Cross-cultural examination of the relationships between job attitudes and workplace deviance. *Asia Pacific Journal of Management*.

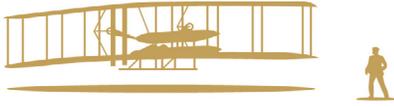


Where are our graduates now?

Below, you will find the name of each graduate, their current position and organization, and what their degree emphasis was (HF or I-O).

To all of our alumni, you should be proud of what you have achieved and the roles you play in these organizations.

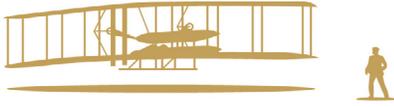
Name	Job Title	Employer	Year	Focus
Joseph Dagosta	Abercrombie and Fitch Co.	Associate Analyst, HR Reporting & Analytics	2020	IO
Cheyne Brower	Psychological Research Intern	National Center for Organizational Development, VA	2020	IO
Daniel Bashore	Talent Assessment Consultant	SKS Consulting	2020	IO
Elizabeth Frost	Research Psychologist	Air Force Research Laboratory	2019	HF
Beth Bullemer	Human Factors Scientist	Abbott Laboratories	2019	HF
Kinsey Bryant-Lees	Assistant Professor	Northern Kentucky University	2019	IO
Hanshu Zhang	Postdoc Research Fellow	Carnegie Mellon University	2019	HF
Elizabeth Fox	Postdoc Research Fellow	Oak Ridge Institute of Science and Education	2019	HF
Anthony Gibson	Research Psychologist	Air Force Research Laboratory	2019	IO
August Capiola	Research Psychologist	Air Force Research Laboratory	2018	HF
Tyler Barnes	Personnel Psychologist	VHA National Center for Organizational Development	2018	IO
Clayton Rothwell	Assistant Professor	Ohio State University	2018	HF
Andrew Hampton	Postdoc Research Fellow	University of Memphis	2018	HF
Jenny Baumgartner Artiano	Postdoc Research Fellow	University of California San Diego	2018	HF
Lisa Douglas	Experience Research Manager	Rapid7	2017	HF
Kyle Behymer	Human Factors Specialist	Infoscitex	2017	HF
Silas Martinez	Assistant Professor	United States Army War College	2017	IO



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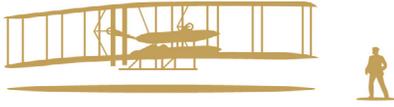
Name	Job Title	Employer	Year	Focus
F. Eric Robison	Research Psychologist	Naval Medical Research Unit Dayton	2017	HF
Jerred Holt	Research Scientist	Air Force Research Laboratory	2016	HF
Steve Khazon	Research Scientist	Amazon	2016	IO
David Periard	Research Scientist	Amazon	2016	IO
Caitlan Rizzardo	Research Scientist	Aptima	2016	HF
Jordan Haggit	Research Scientist	TIER1 Performance Solutions	2016	HF
Kathleen Van Bremen	Senior Consultant	Select International	2016	IO
Suzanne Dean	Chose not to work		2016	IO
Sarah Jackson	Adjunct Professor	Wright State University	2016	HF
Katherine Lippa	Pending Non-Tenure Track Faculty Pool	University of Texas, Austin	2016	HF
John Kegley	Research Scientist	Aptima	2016	HF
Darrell Kelly	Organizational Development Specialist	Altisource	2016	IO
James Garrett	Research Scientist / Portfolio Manager	NASA Johnson Space Center	2016	HF
Micheal Hoepf	Psychologist-Human Performance Investigator	National Transportation Safety Board	2015	IO
Caleb Bragg	Associate Professor	Central Connecticut State University	2015	IO
April Courtice	Consumer & Market Knowledge Manager	Procter & Gamble	2015	HF
Marc Winterbottom	Sr. Research Psychologist	USAF School of Aerospace Medicine	2015	HF
Corinne Wright	Senior Director of Date Strategy	ADP	2015	HF
Megan Morris	Human Factors Professional I	Ball Aerospace	2014	IO
Sheldon Russell	Senior Research Associate	Virginia Tech Transportation Institute	2014	HF
Erin O'Brien	Post-Doctoral Fellow	Army Research Institute	2014	IO
Julie Steinke	Lead Behavioral Scientist	The MITRE Corporation	2014	IO
Elizabeth Peyton	Postdoctoral Fellow	VHA National Center for Organization Development	2014	IO
John McIntire	Engineering Research Psychologist	US Air Force Research Labs, 711 Human Performance Wing	2014	HF
Cristina Kirkendall	Research Psychologist	U.S. Army Research Institute	2013	IO



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Name	Job Title	Employer	Year	Focus
Jeh Cooper	Human Performance Analyst	Canadian Nuclear Laboratories	2013	HF
Patrick Clark	Senior Behavioral Analyst	Infor PeopleAnswers	2013	IO
Kathryn Van Dixhorn	Sr. Consultant, HR Advanced Analytics	Nationwide Insurance	2013	IO
Stephen Gabbard	Lecturer and Associate Brand Manager	Wright State University	2013	HF
Timothy McEwen	Scientist	Charles River Analytics	2012	HF
Jenna Filipkowski	Research Director	Human Capital Institute (HCI)	2012	IO
Zachary Kalinoski	Senior Consultant	SkillCheck Assessments	2012	IO
Greg Hammond		CPS HR Consulting	2011	IO
Kevin Eschleman	Associate Professor	San Francisco State University	2011	IO
Qiang Wang	Associate Professor	East China University of Science and Technology	2011	IO
Brian Simpson	Technical Advisor and Senior Engineering Research Psychologist	Air Force Research Laboratory	2011	HF
Gene Alarcon	Research Psychologist	Air Force Research Laboratory	2009	IO
Markus Feufel	Assistant Professor	Technische Universität Berlin	2009	HF
Bradley Schlessman	Research Scientist	Chally Group Worldwide	2009	HF
Esteban Tristan	Safety Practice Manager	Select International	2009	IO
Satomi Maeda	Global Coordinator	Leave a nest Co.	2009	HF
Pam Garverick	Instructor	Wright State University	2009	HF
Liza Lerner Papautsky	Assistant Professor	University of Illinois at Chicago	2009	HF
Candace Eshelman-Haynes	Human Factors Analyst	NATO Allied Command Transformation	2009	HF
Shia Regina	Research Psychologist	Air Force Research Laboratory	2008	HF
Daniel Schwartz	Direct Product Management	Liberty Mutual Insurance	2008	HF
Mei-Hua Lin	Associate Professor	Sunway University	2008	IO
Chad Thompson	VP, Consulting and Assessment	Taylor Strategy Partners	2008	IO
Charlene Stokes	Research Psychologist	Air Force Research Laboratory	2008	HF
Anupama Narayan	Associate Professor	University of Tulsa	2008	IO



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Name	Job Title	Employer	Year	Focus
John McKee	Manager, Client Insights, and Analysis	American Century Investments	2007	IO
Megan Leasher	Director of Talent, Growth and Development	Bon Secours Mercy Health	2007	IO
Louise Rasmussen	Principal Scientist	Global Cognition	2007	HF
Mark Palumbo	Assistant Professor	Indiana University of Pennsylvania	2007	IO
Gina Thomas	Research Engineer	Air Force Research Laboratory	2005	HF
Joseph Lyons	Senior Research Psychologist	Air Force Research Laboratory	2005	HF
Paul Heintz	Associate Professor	Edison State Community College	2005	IO
Kevin Gildea	Research Psychologist	Federal Aviation Administration	2004	HF
Hal Guterman	Vice President, Performance Consulting	Psychological Associates	2004	IO
Phill Mangos	President and Chief Scientist	Adaptive Immersion Technologies	2003	IO
Matthew Smith	Sr. Project Engineer	Delphi	2000	HF
Russell Beauregard	Principal Engineer	Intel Corporation	2000	IO
Patrick Monnier	Street Photographer		1999	HF
Terry Stanard	Senior Research Psychologist	US Air Force Research Labs, 711 Human Performance Wing	1998	HF
Cindy Dominguez	Principal Cognitive Scientist	MITRE	1997	HF