2020 IEEE International Professional Communication Conference (ProComm 2020)

Kennesaw, Georgia, USA 20 - 21 July 2020



IEEE Catalog Number:

CFP20IPC-POD 978-1-7281-5564-7

ISBN:

Copyright © 2020 by the Institute of Electrical and Electronics Engineers, Inc. All Rights Reserved

Copyright and Reprint Permissions: Abstracting is permitted with credit to the source. Libraries are permitted to photocopy beyond the limit of U.S. copyright law for private use of patrons those articles in this volume that carry a code at the bottom of the first page, provided the per-copy fee indicated in the code is paid through Copyright Clearance Center, 222 Rosewood Drive, Danvers, MA 01923.

For other copying, reprint or republication permission, write to IEEE Copyrights Manager, IEEE Service Center, 445 Hoes Lane, Piscataway, NJ 08854. All rights reserved.

*** This is a print representation of what appears in the IEEE Digital Library. Some format issues inherent in the e-media version may also appear in this print version.

 IEEE Catalog Number:
 CFP20IPC-POD

 ISBN (Print-On-Demand):
 978-1-7281-5564-7

 ISBN (Online):
 978-1-7281-5563-0

ISSN: 2158-091X

Additional Copies of This Publication Are Available From:

Curran Associates, Inc 57 Morehouse Lane Red Hook, NY 12571 USA

Phone: (845) 758-0400 Fax: (845) 758-2633

E-mail: curran@proceedings.com Web: www.proceedings.com



2020 IEEE International Professional Communication Conference (ProComm) ProComm 2020

Table of Contents

ProComm 2020 Conference Committee x

| Session 1: Academic and Industry Perspectives |
|---|
| Merging Territories, Part III: Reaching Maturity and Responding to Change <u>1</u> |
| Technical Communication in the United Kingdom: The Academic and Professional Contexts .1.3 Yvonne Cleary (University of Limerick, Ireland) and Marie McCullagh (University of Portsmouth, United Kingdom) |
| Session 2: Global Considerations |
| Transnational Science Publication Ethics Training Using Scenarios <u>1.8.</u> Kathryn Northcut (Missouri S&T, United States), Clair Kueny (Missouri S&T, United States), Alanna Krolikowski (Missouri S&T, United States), Kaidi Yang (University of Missouri, United States), and Rainer Glaser (Missouri S&T, United States) |
| Kindly Requested Is Your Rapt Attention: Embedded Support for ESL Students in Technical Writing Classes .25. |
| E. Jonathan Arnett (Kennesaw State University, United States), Laura A. Palmer (Kennesaw State University, United States), and Katherine Taylor (Kennesaw State University, United States) |
| The Small Languages in the Large World of Technology .30 |

Session 3: Biases and Beliefs

| Interrogating Normalizing Pedagogies, Policies, and Practices in Professional Writing through Disability Studies 34. Kristin Bennett (Arizona State University, United States) |
|--|
| Cognitive Biases in Technical Communication <u>39</u> |
| The Role of Taste in the Belief of Pseudoscience .47 |
| Session 4: Science, Engineering, and Mathematics |
| Teaching Metaphors to Scientists: A Mixed Methods Approach .52 Michael McCarthy (Grand Valley State University, United States) |
| 'Here We Show': Teaching Engineering Students to Reason with an Audience .56 |
| Math Matters in Communication: Manipulation and Misrepresentation in Data Displays .61 Kathleen Hardesty (Webber International University, United States) and Craig Hardesty (Hillsborough Community College, United States) |
| Engineering Students' Empathy Development Through Service Learning: Qualitative Results in a Technical Communication Course <u>.68</u> |
| Laura Patterson (University of British Columbia, Canada) |
| James M. Lufkin Award for Best Conference Paper |
| Rhetoric of Public Crisis: Constructing Communication Networks in Transcultural Digital Contexts .76 |

Session 5: The Feedback and Editing Process

Kamila Etchegoyen Rosolova (Center for Academic Writing, Czech Academy of Sciences, Czechia)

Digging, Displaying, and Translating: Content-Centric Feedback, Powered by Metaphors .92..... Sara Doan (Kennesaw State University, United States)

Session 6: The Future Starts Today

Comparing the Effects of Paper and Mobile Augmented Reality Instructions to Guide Assembly Tasks .96.

Yumeng Yang (University of Twente, Netherlands), Joyce Karreman
(University of Twente, Netherlands), and Menno de Jong (University of Twente, Netherlands)

| Practical Considerations for the Remediation of 3D CAD into Visual Technical Communication 105 Thomas Burns (AutomationDirect, United States) |
|--|
| Communicating Next-Generation 911 with Local 911 Professionals: Preliminary Recommendations 110 |
| Rob Grace (Texas Tech University, United States) and Jess Kropczynski (University of Cincinnati, United States) |
| Session 7: User Experience |
| The State of Mobile UX: Best Practices from Industry and Academia .1.15 |
| What is "Eating Right" at Work? User Experience with an Employee Wellness Program .1.23 Danielle Stambler (University of Minnesota, United States) |
| Adding the Humanities into Math Curriculum Development: A UX Study on Writing Mathematical Arguments 128. |
| Kylie M Jacobsen (Grand Valley State University, United States) |
| Session 8: Writing |
| Using iPads in Technical Editing: An Untapped Resource 1.33 |
| Creating Rhetorical Complexity: Using Popular Science Articles to Teach Abstract Writing .1.3.7 Crista Mohammed (The University of The West Indies, Trinidad and Tobago) and Cathy-Ann Radix (The University of The West Indies, Trinidad and Tobago) |
| Scalable Writing Pedagogy for Strengthening Cohesion with Interactive Visualization .1.4.1 Suguru Ishizaki (Carnegie Mellon University, United States) and David Kaufer (Carnegie Mellon University, United States) |
| Panel 1 |
| Chinese Developers' Information Behaviors When Using Technical Documentation .1.46 |
| What Makes It Findable? An Exploration on User Search Behavior and the Findability of Technical Documentation .1.5.4 |
| Reading Time Prediction Model on Chinese Technical Documentation <u>.1.6.1</u> |

Panel 2

Courtney Crooks (Georgia Tech Research Institute, United States), Jerri Lynn Hogg (Fielding Graduate University, United States), Sophia Martin (Georgia Institute of Technology, United States), Jay Grant (Fielding Graduate University, United States), Kerri Lemoie (Fielding Graduate University, United States), and Monica Robbins (Fielding Graduate University, United States)

Panel 3

Extended Abstracts

| Extended Abstract: STEAM Communication in the Third Space: Perspectives from a Graduate Professional Development Program 177. Katie Homar (North Carolina State University, United States) |
|---|
| Extended Abstract: Action Research and Accessibility in Technical Communication .1.78 |
| Extended Abstract: Custom OR Off-the-shelf Software: Making the Right Choice for Corpus Analysis .1.8.0 |
| Extended Abstract: Plain Language in the Sciences: A Qualitative Meta-Study of Research .1.82 Kira Dreher (Carnegie Mellon University in Qatar, Qatar) |
| Extended Abstract: Everything Old Is New Again <u>.1.8.4.</u> Saul Carliner (Concordia University, Canada) and Margaret Driscoll (IBM, United States) |
| Extended Abstract: How Hurricane Visualization Tools Affect the Public's Perception of Risk and Preparedness .1.8.6 |
| Extended Abstract: Tactical Translation Solutions for Component-Based Content Management 188 Michelle Cowan (Texas Tech University, United States) |
| Extended Abstract: What to Expect When You Are Learning Data Visualization: A Textual Analysis of Course Syllabi .1.89 |

| Extended Abstract: Science Fiction and Social Justice: Teaching Students to Consider Ethics, Sustainability, and Diversity Issues .1.9.1 |
|--|
| Extended Abstract: Using Empirical Data to Inform Technical-Editing Pedagogies .1.92 |
| Author Index 195 |