

KEYNOTE TALK

Tuesday, October 4, 2022 at 9:00am

Designing Augmented Reality for the Future of Work

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Abstract: Augmented Reality (AR) technology has improved significantly in recent years, to the point where it is expected that major technology companies will release consumer-focused AR glasses in the near future. Technical challenges in optics, power, and tracking remain, but are solvable. But what will we use these AR glasses for, and how will they provide value? In this talk, I will argue that some of the most impactful applications of future AR glasses will be those that transform the way we work. Using examples from my research on AR for knowledge work and intelligent AR for construction work, I will explain why user experience considerations are crucial to the adoption of AR for future work. Studying the design of these applications today will lead to guidelines that can help ensure the success of AR for the future of work tomorrow.



Speaker Bio-Sketch: Doug A. Bowman is the Frank J. Maher Professor of Computer Science and Director of the Center for Human-Computer Interaction at Virginia Tech. He is the principal investigator of the 3D Interaction Group, focusing on user experience and user interface design for virtual reality and augmented reality systems. Dr. Bowman is one of the co-authors of *3D User Interfaces: Theory and Practice*. He has served in many roles for the IEEE Virtual Reality Conference, including program chair, general chair, and steering committee chair. He also co-founded the IEEE Symposium on 3D User Interfaces (now part of IEEE VR). He received a CAREER award from the National Science Foundation for his work on 3D Interaction, and has been named an ACM Distinguished Scientist. He received the Technical Achievement award from the IEEE Visualization and Graphics Technical Committee in 2014, and the Career Impact award from IEEE ISMAR in 2021. His undergraduate degree in mathematics and computer science is from Emory University, and he received his M.S. and Ph.D. in computer science from the Georgia Institute of Technology.