Learning Sciences Brown Bag Colloquium Series -Co-Sponsored by MPES-

Tammy Clegg, Ph.D – University of Maryland Thursday, October 13th, 12:30-1:30pm, Annenberg 303



Scientizing Daily Life with New Social, Mobile, & Wearable Technologies

How can new technologies help learners begin to see the world through scientific lenses (i.e., scientize their lives)? In this talk Clegg leverages two projects to understand and promote learners scientific disposition development through technology-supported life-relevant science learning experiences. In *Science Everywhere*, Clegg with colleagues Ahn and Yip are designing a social media app and interactive community displays to help entire neighborhoods in low-SES contexts scientize their daily life experiences together. Clegg will describe an initial analysis of learners' and their families' interactions with the Science Everywhere mobile app that informs our understanding of ways new mobile technologies can promote learners' scientizing across contexts. In *BodyVis*, Clegg and collaborator Froehlich are iteratively designing wearable e-textile shirt and software prototypes to reveal otherwise "invisible" parts and functions of the human body. An analysis of learners' personally meaningful, collaborative STEM experiences with initial prototypes of the BodyVis system will be presented, specifically linking to ways such live physiological sensing and visualization tools show potential for supporting learners' scientizing.

Tamara "Tammy" Clegg is an assistant professor in the College of Education with a joint appointment in the College of Information Studies at the University of Maryland. She received her PhD in Computer Science at Georgia Tech in 2010 and her Bachelor of Science in Computer Science from North Carolina State University in 2002. From 2010-2012 Clegg was a postdoctoral fellow at the University of Maryland with the Computing Innovations Fellows program. Her work focuses on developing technology and learning experiences to support *life-relevant learning* environments where children and communities engage in science in the context of achieving goals relevant to their lives. Clegg uses participatory design to design these new technologies. Her work is supported by the NSF Cyberlearning and Future Learning Technologies and Advancing Informal Science Learning (AISL) programs as well as the Institute for Museum and Library Studies and Google.