Pizza & Prof: Driving Automation Systems

Pizza & Prof: Driving Automation Systems

Tuesday, October 23, 2018 - 5:15pm to 7:30pm
Commonwealth Honors College, East Events Hall

Driving automation systems, also known as self-driving cars, hold much promise in terms of reducing traffic crashes. However, before these systems are unleashed on the road, we first need to understand how people will react to the new technology. Dr. Shannon C. Roberts, an Assistant Professor in the Mechanical and Industrial Engineering Department, and the co-director of the Human Performance Laboratory at UMass Amherst, will deliver the October Pizza & Prof talk on "Driving Automation Systems." In this talk, she will describe a series of experiments being undertaken at the UMass Human Performance Laboratory that seek to understand how this technology will change driver behavior.

Dr. Roberts is a trained Human Factors engineer and has studied the interaction between humans and systems in transportation safety in addition to other domains. Her research falls into three areas: (1) studying and improving young driver behavior, (2) developing and testing driver feedback systems, and (3) studying how the introduction of automation into vehicles changes driver behavior. Her research has required collaborations from other academic institutions, government agencies, as well as industry partners and has resulted in a total of 12 peer-reviewed conference and journal publications. Prior to joining UMass Amherst, she was a technical staff member at MIT Lincoln Laboratory in the Cyber Analytics and Decisions Systems Group. Dr. Roberts received her PhD and MS in Industrial Engineering from the University of Wisconsin – Madison and she received her BS in Mechanical Engineering from MIT.

Dr. Roberts teaches two courses each year: Human Factors Design Engineering and Statistical Quality Control.