

- **An Ontology for Building Management and Evacuation (\*New - Fall 2018\*)**

**Faculty advisor:** Prof. Mark Fox

The focus of this project is the design of smarter and greener environments, in particular buildings, using a sensor data driven approach. We bring a multi-disciplinary approach to addressing problems in data collection, representation, dissemination, monitoring and demand-response, with a common theme being a data-driven methodology – we seek to use data obtained from measurements to drive actuation/control, optimization or resource management to address problems for smart environments. At the core of this research is an ontology for representing various aspects of a building, including its logical built structure, sensors, controls, environment, people, etc. The MEng project will focus on the development of rules of deduction for the existing ontology.