presents a seminar on

Two-Dimensional Semiconductors for Solar Energy Storage



James R. McKone
Postdoctoral Researcher: Chemical Engineering;
Solar Energy Capture and Electrochemical Energy Storage
Cornell University
Postdoctoral Fellow
U.S. Department of Energy:
Energy Efficiency & Renewable Energy

Solar energy is by far the most abundant renewable resource, but due to the intermittency of sunlight, photovoltaics alone can only offset a small portion of global fossil fuel consumption. To address this challenge, solar energy capture and storage can be integrated by using emiconductor light absorbers to electrochemically drive redox reactions. In this seminar, I will discuss recent work on tungsten diselenide, a promising semiconductor material for solar-driven electrochemical energy storage. I will focus on studies of tungsten diselenide relevant to energy storage through electrolysis of water and hydroiodic acid.

Tuesday, January 20th
Lecture at 4:00 PM
Room 1610 Engineering Hall
Refreshments will be served at 3:45 PM