Abstract
Response to stimulus is a basic characteristic of living systems. Based on inspiration from nature, synthetic chemists are interested in designing “smart” molecules that can respond to an external stimulus, such as a change in the chemical or mechanical environment of a compound. This seminar presents examples of stimuli-responsive molecules in the context of organometallic and polymer chemistry. The use of Lewis acids to change the electronic properties and reactivity of platinum complexes, and the ability of polymer-based photonic crystals to change color upon application of pressure or strain, will be discussed.