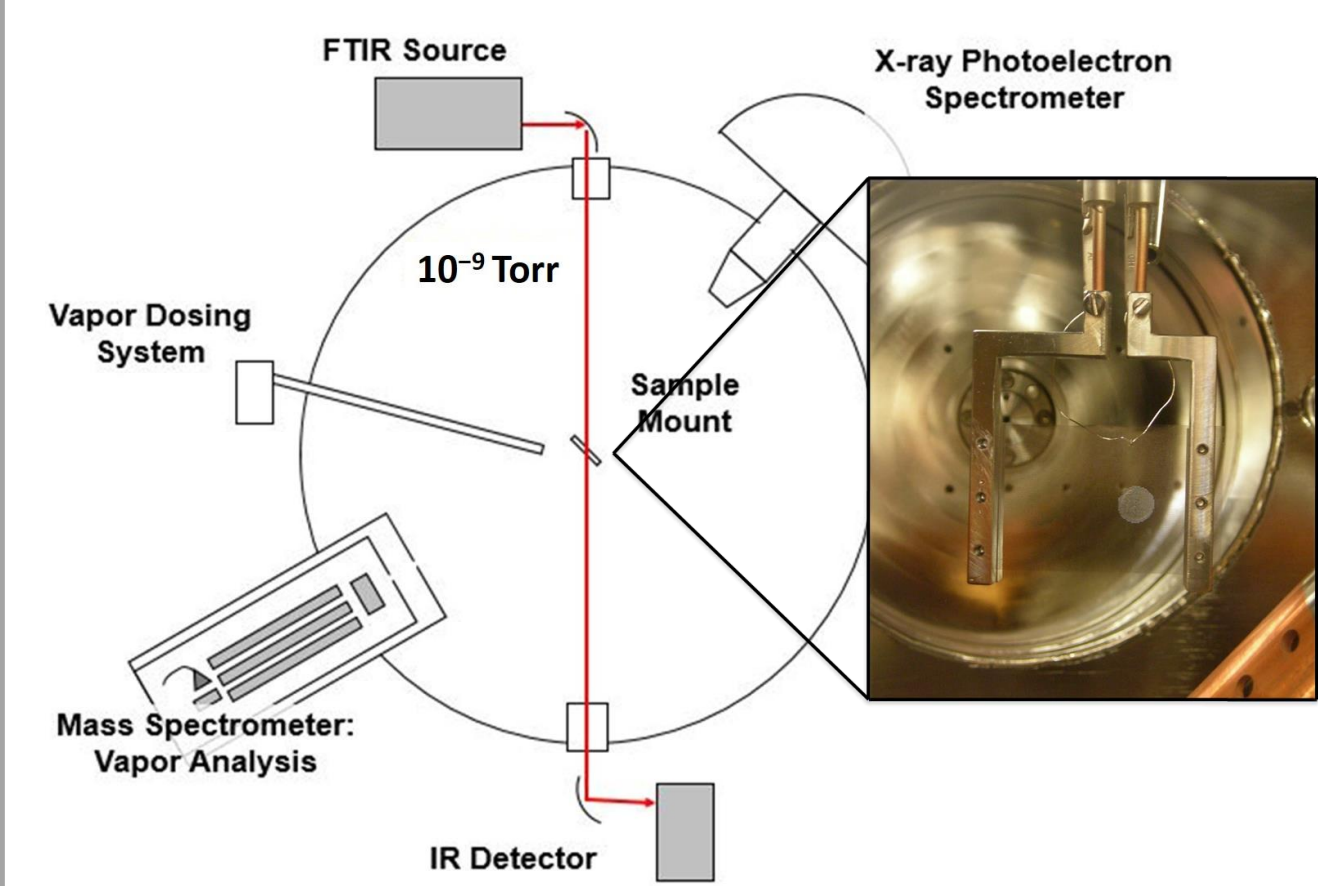
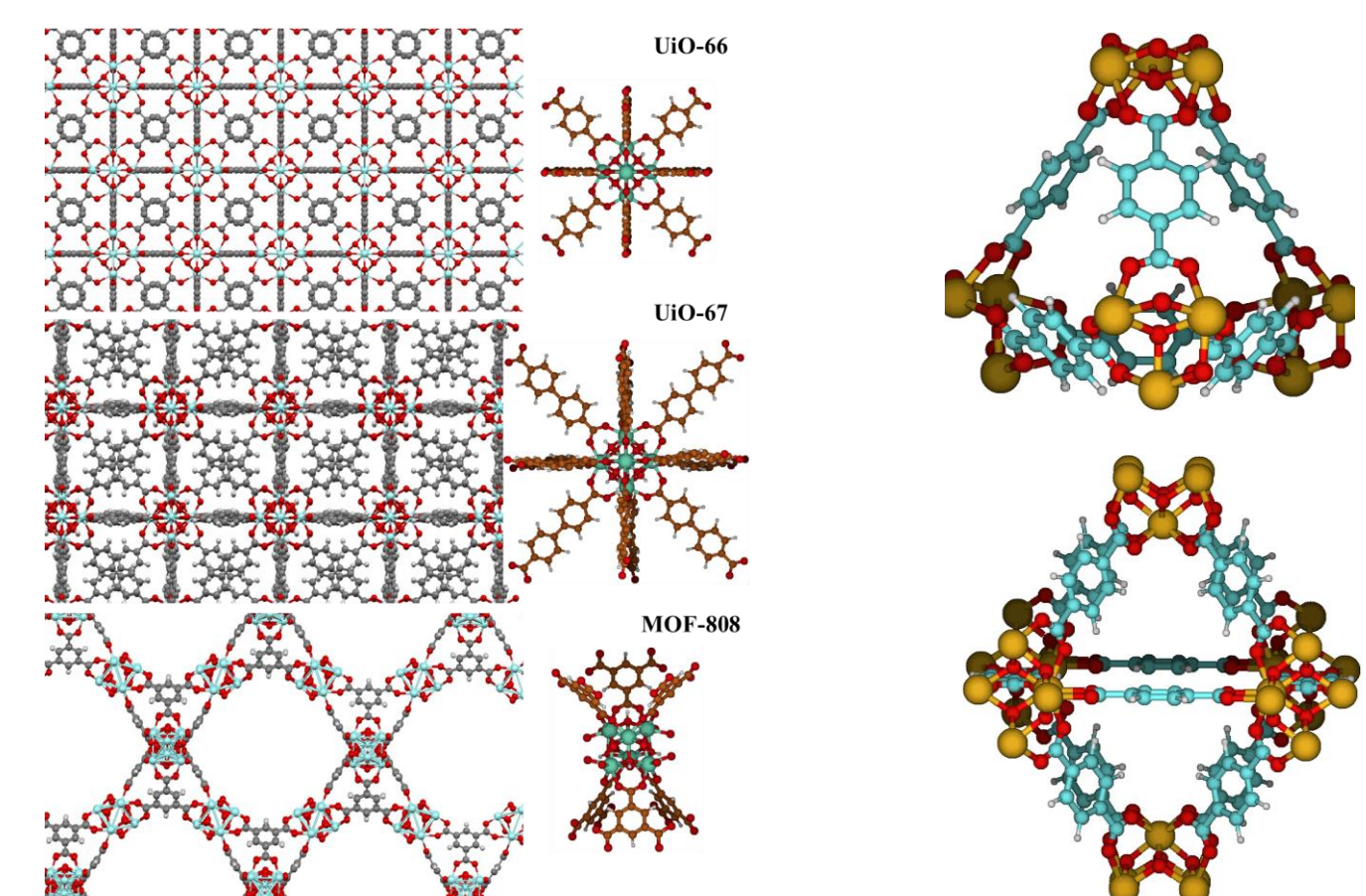


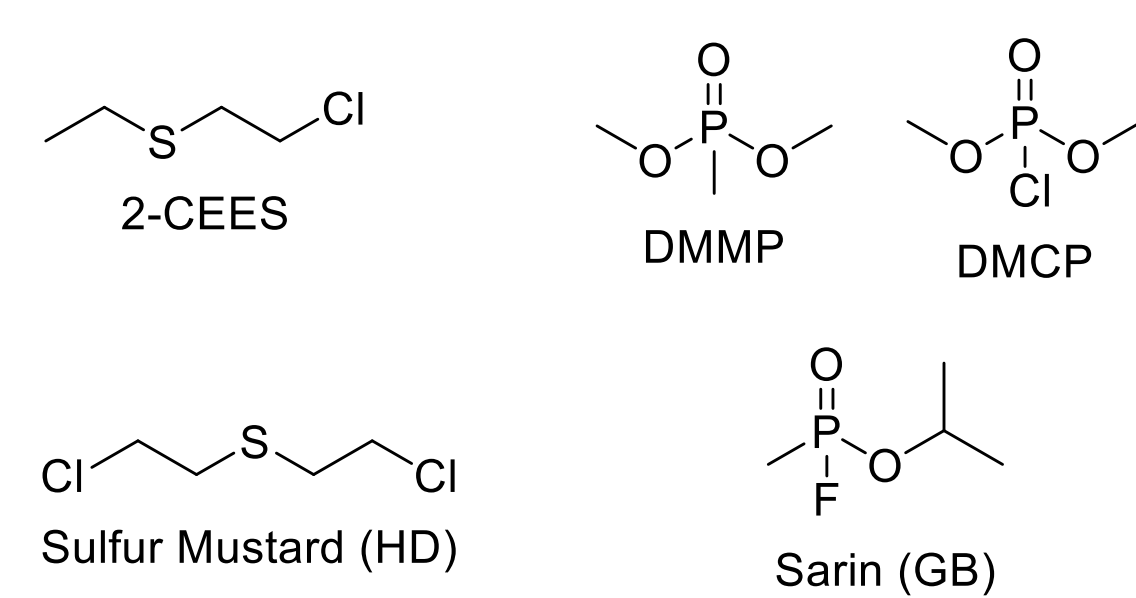
Novel Filtration Materials for Chemical Weapon Degradation



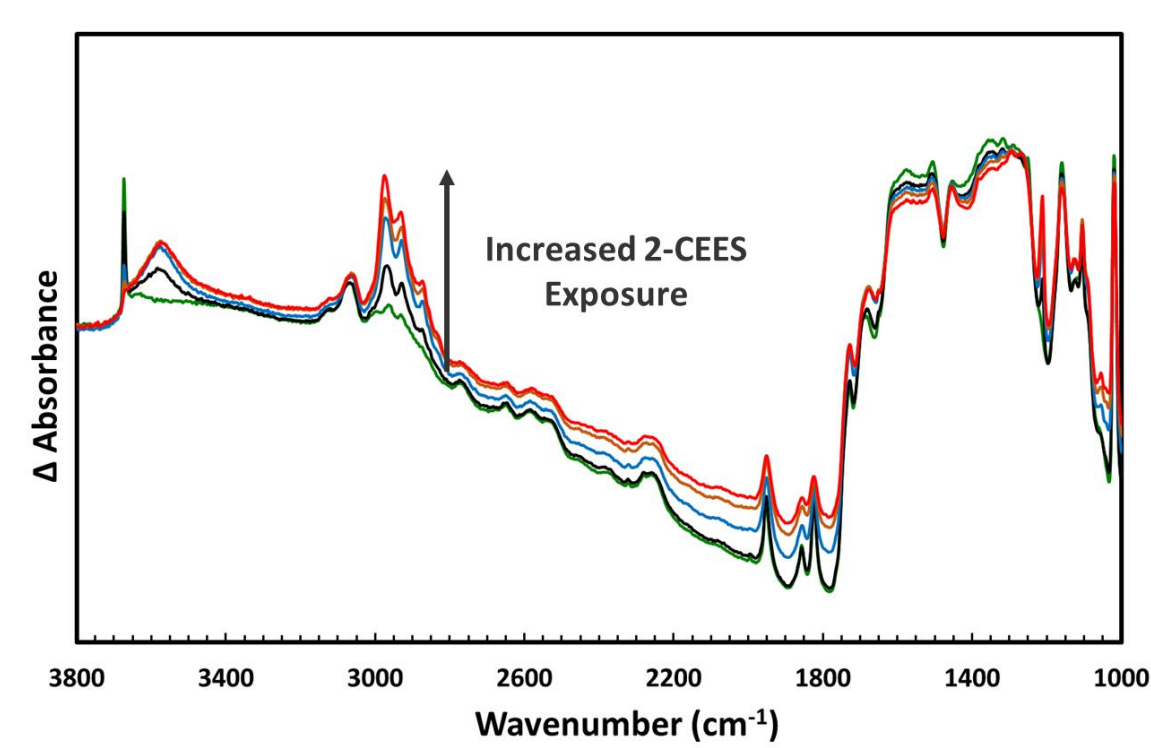
Ultrahigh Vacuum Chamber



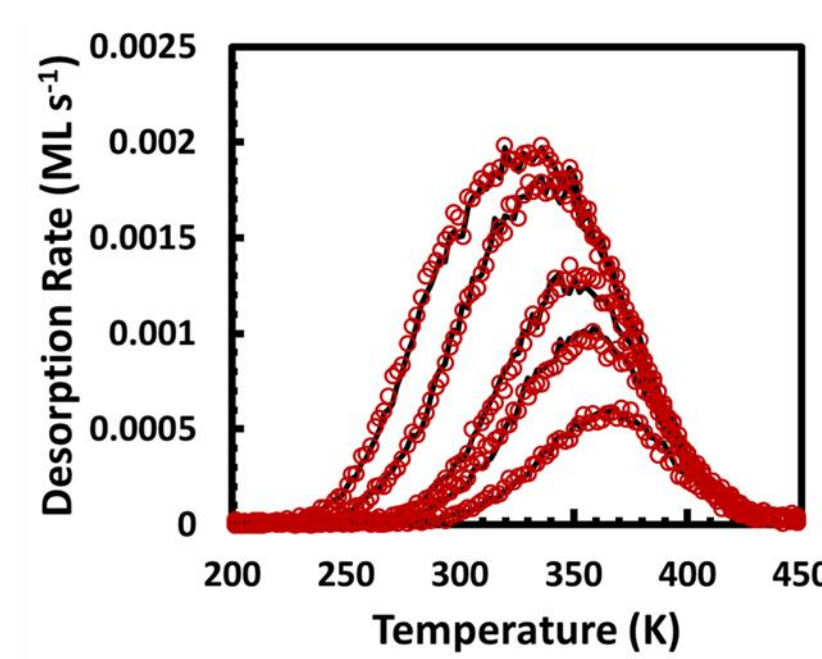
Zr₆-based Metal-Organic Frameworks



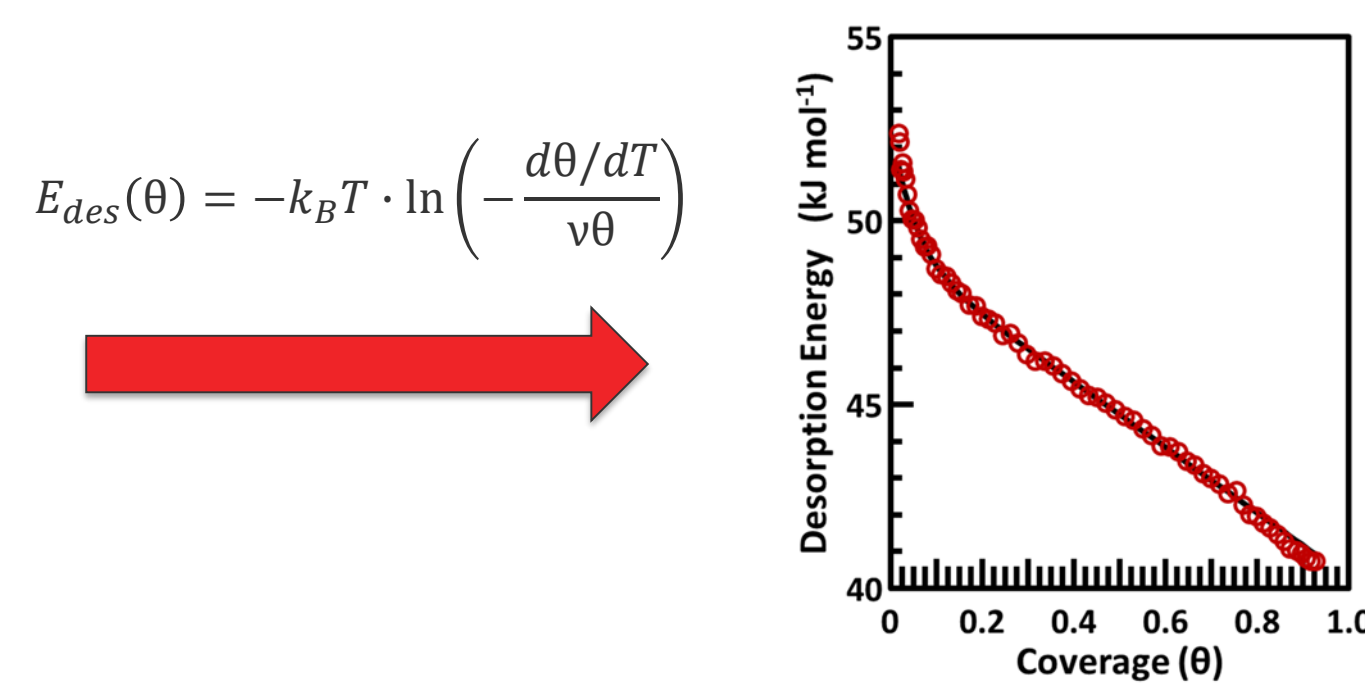
CWA Simulants



Determining Adsorption Mechanisms

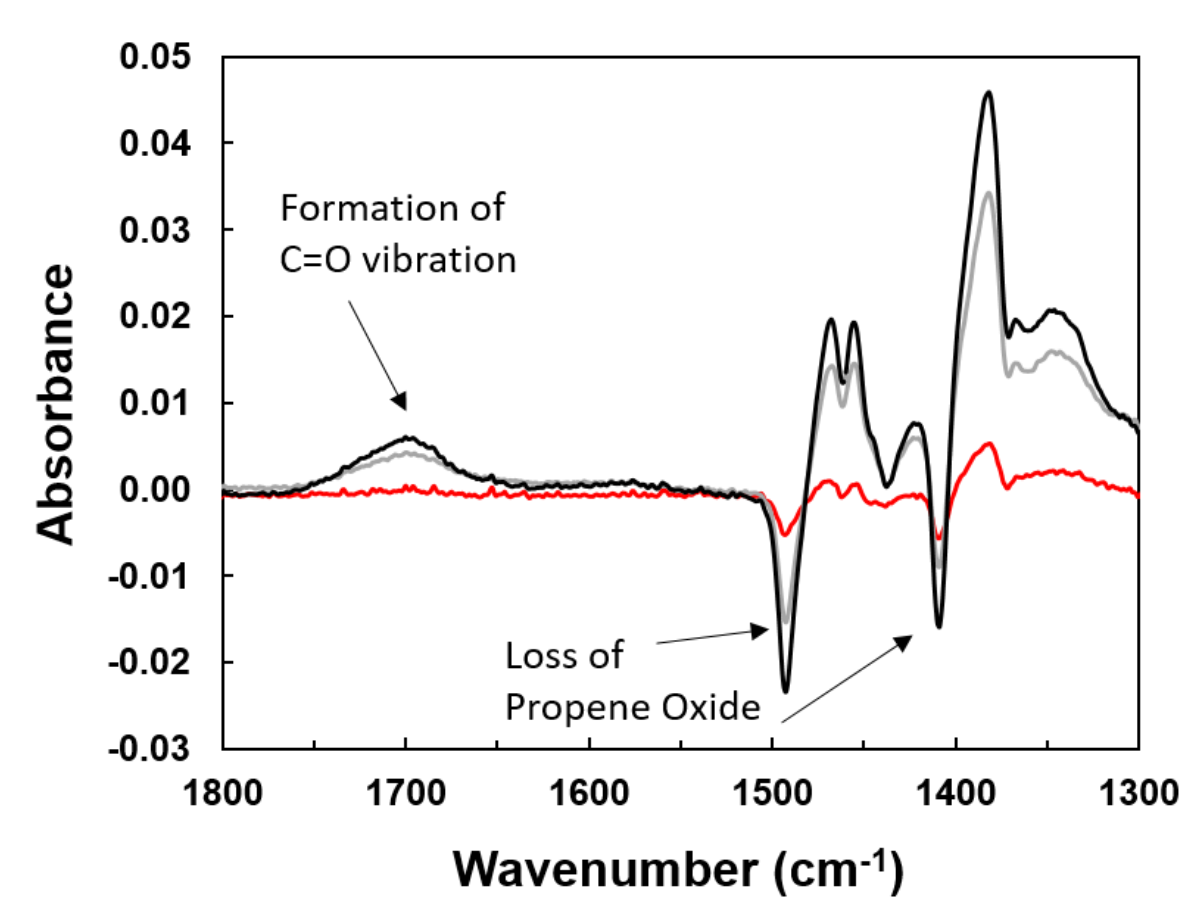
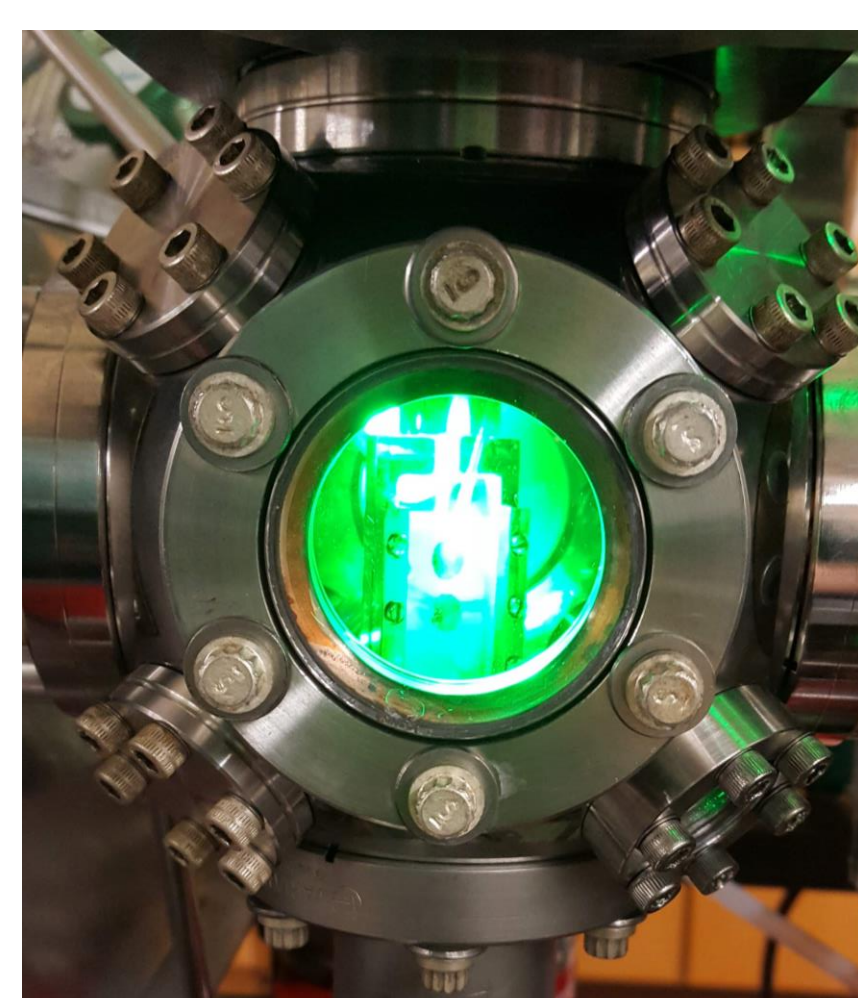
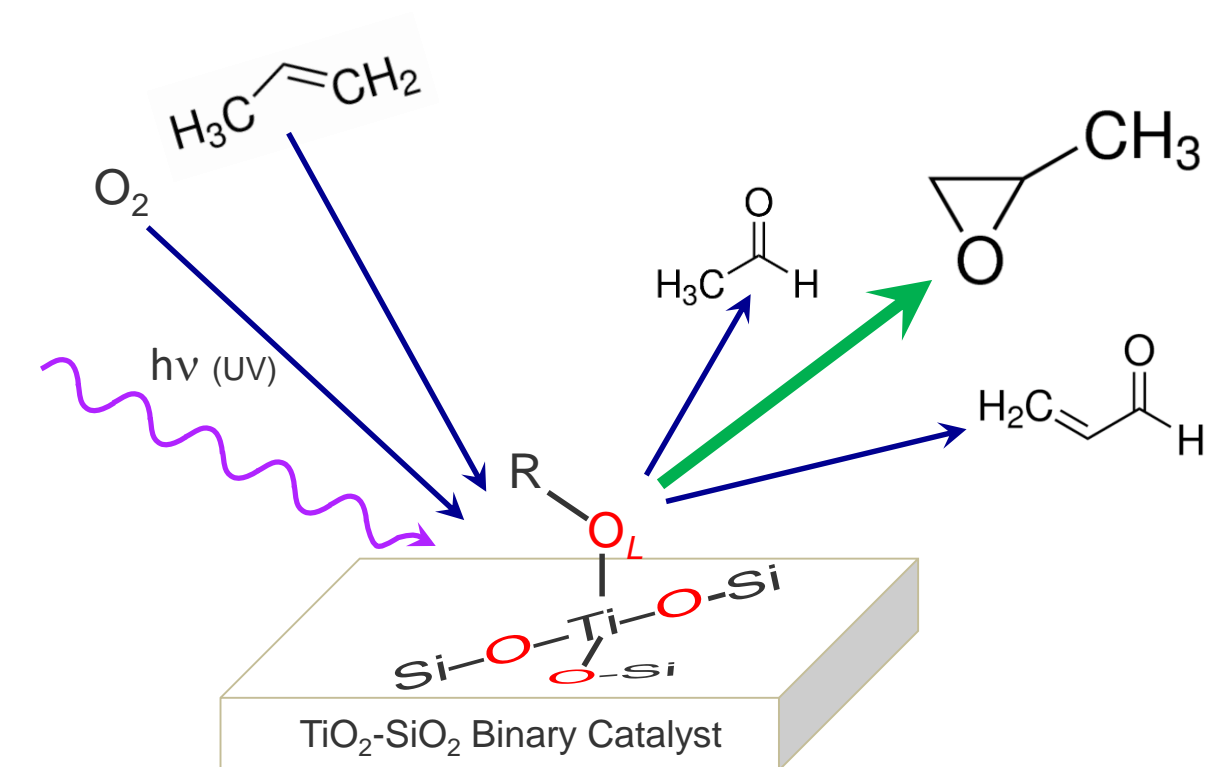
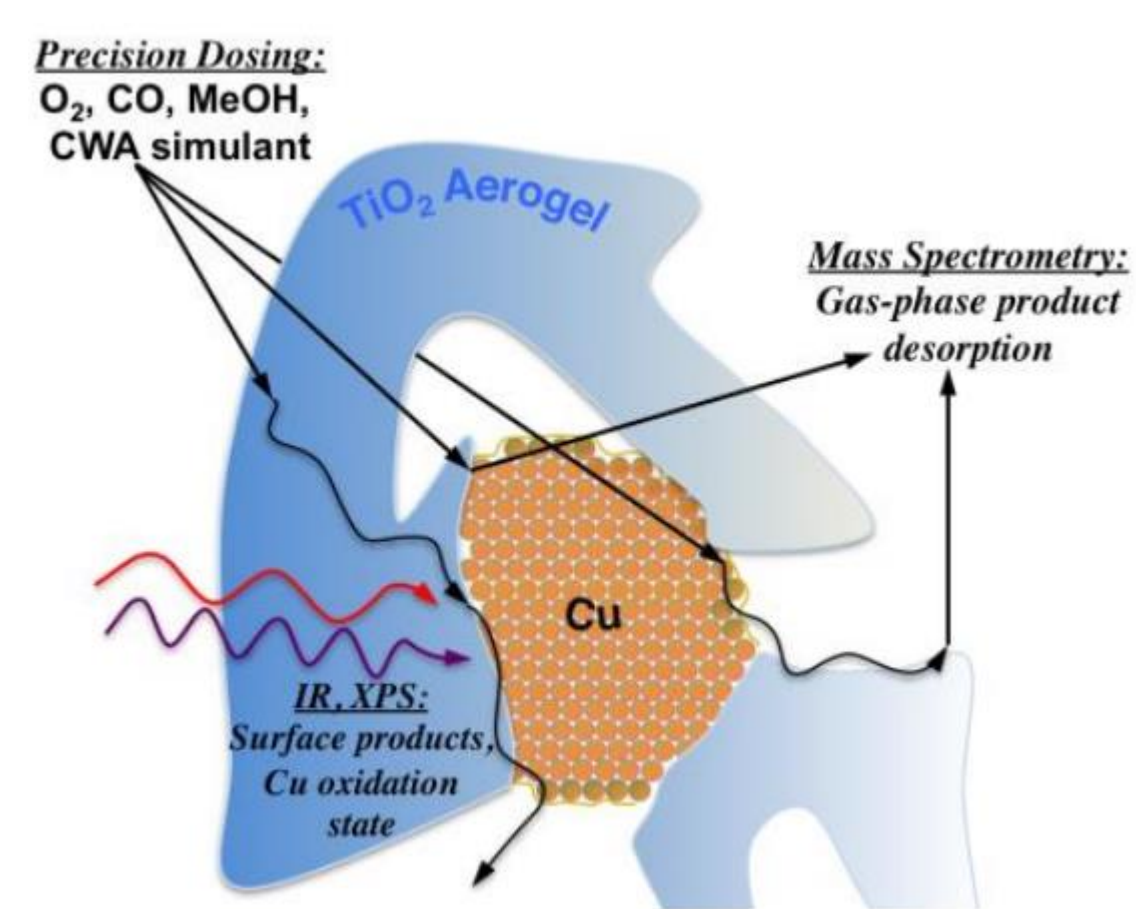


Quantifying Adsorption Energies



$$E_{des}(\theta) = -k_B T \cdot \ln \left(-\frac{d\theta/dT}{v\theta} \right)$$

Photocatalysis on Nanoparticulate Surfaces



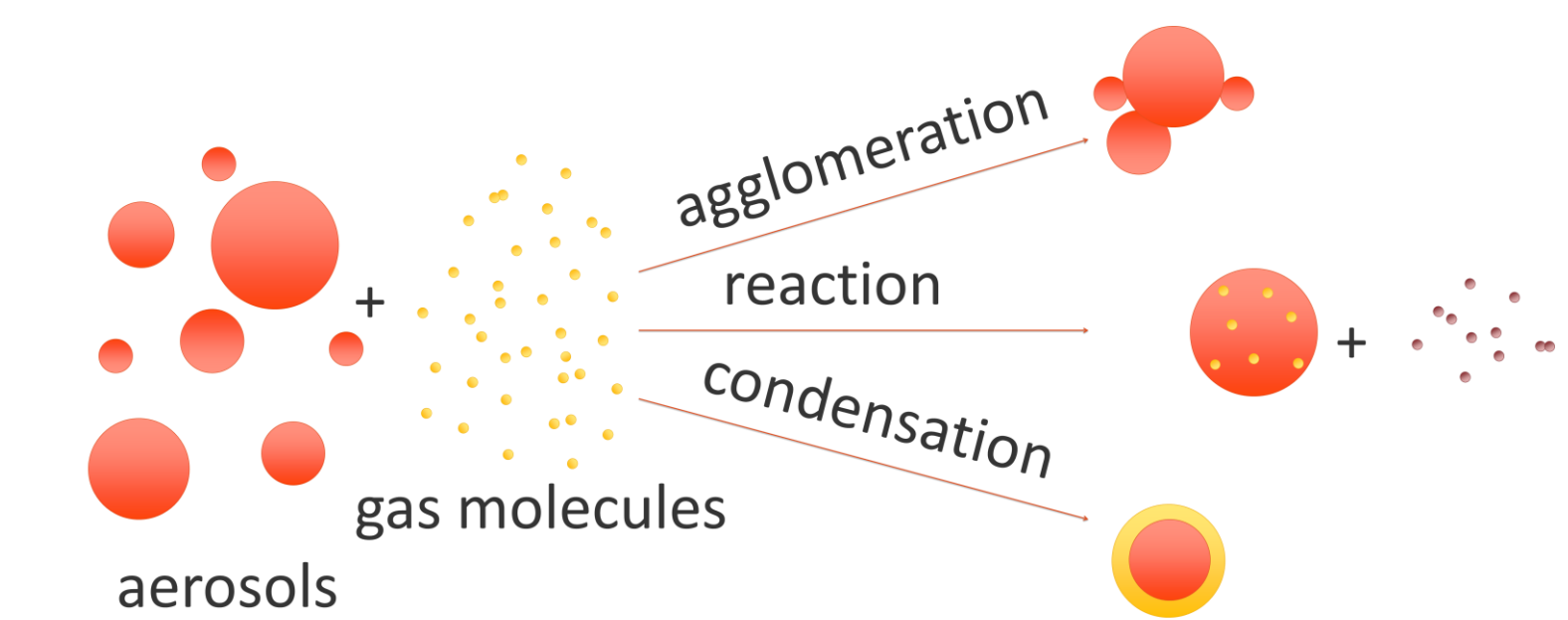
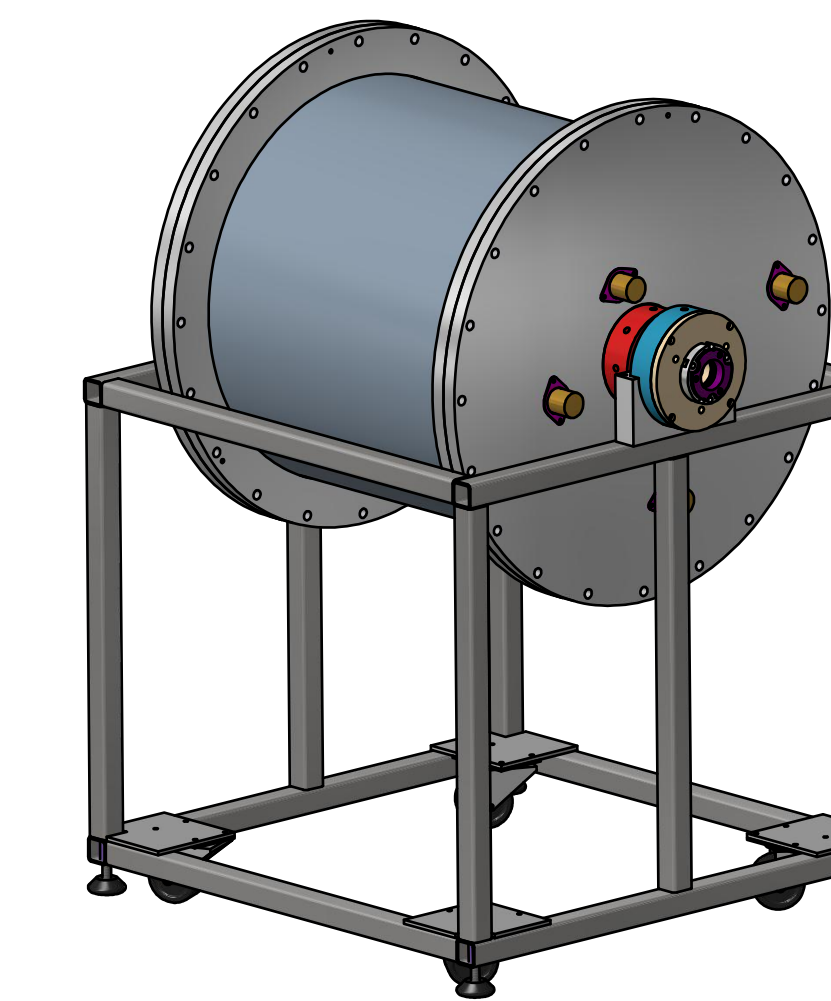
Our primary research objectives are to elucidate the atomic-scale mechanisms of gas-surface uptake, diffusion, and reactions that control important interfacial processes.

John Morris Group 2020

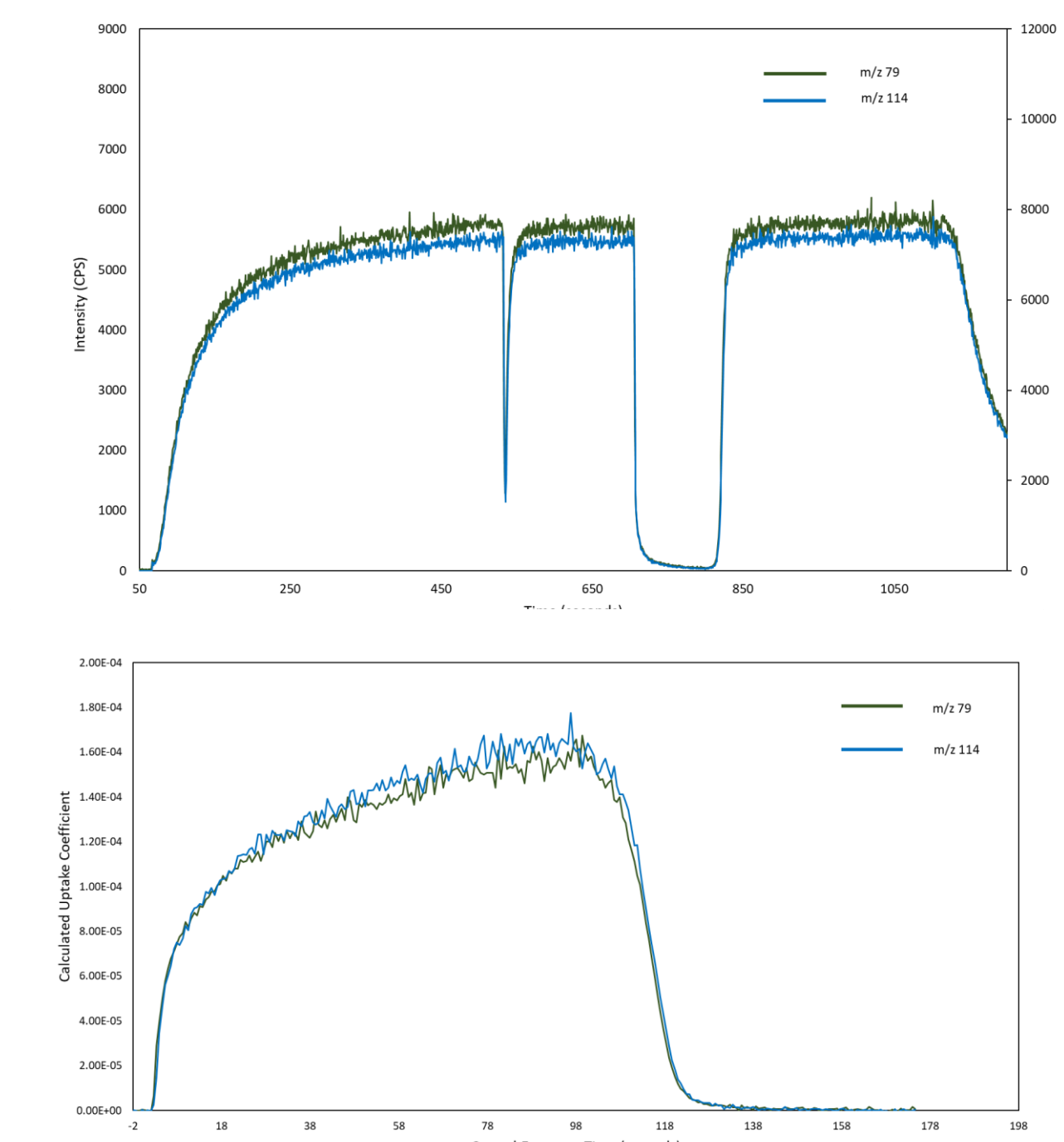
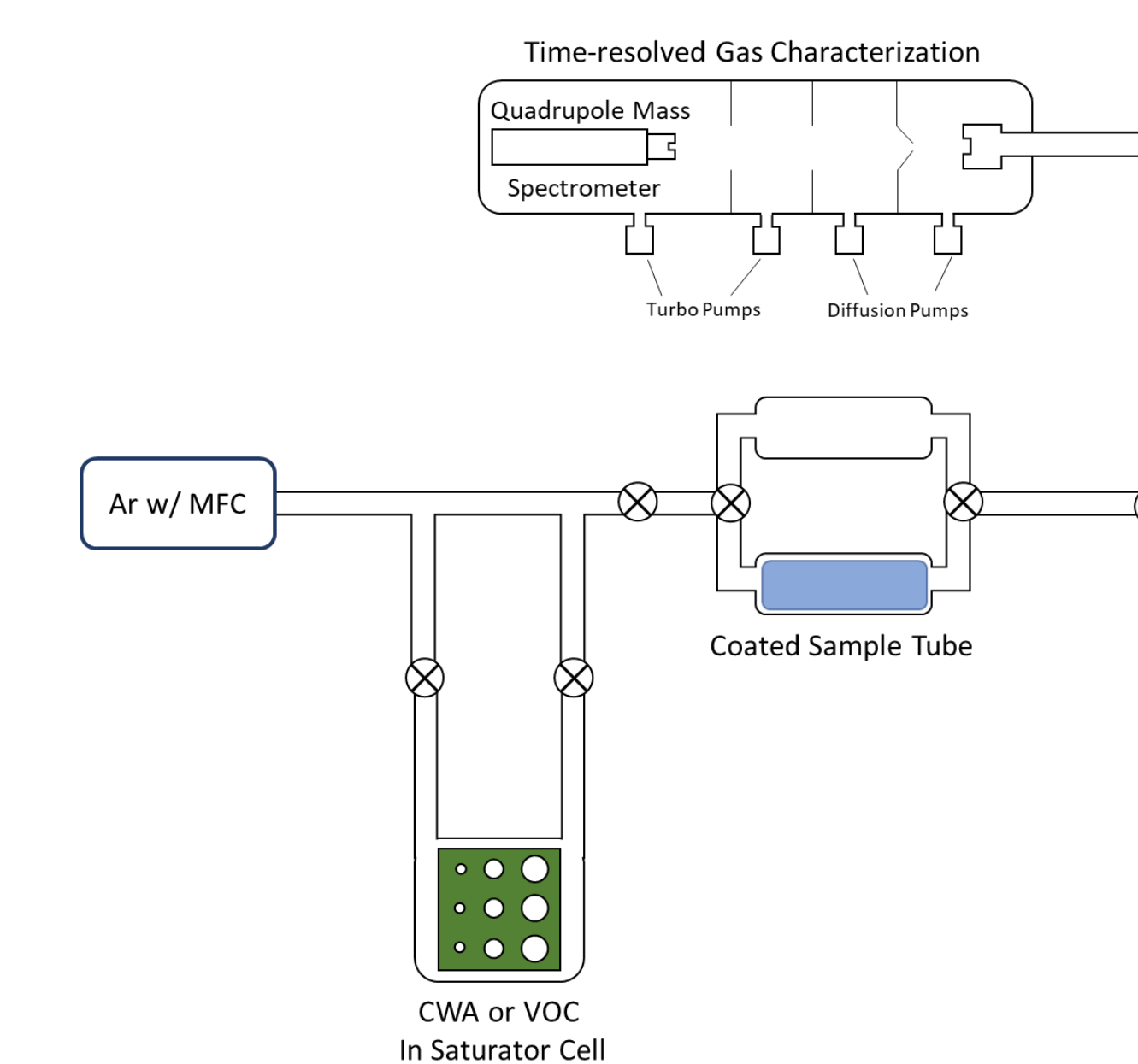
Nathan Jones, Nick Sapienza, Andrew Maynes, Graham Frazier, Harrison Siegal, McAlister Council-Troche, Undergraduates: Adam Gaghan, Anna Falls, Christopher Stoll, Rahaf Rousan



Atmospheric Chemistry of Gases and Aerosols



Atmospheric Cloud Simulation Chamber



Uptake Coefficient of VOCs and CWA

Ambient-Pressure Flow Reactor for Catalytic Screening

