

RACHEL SAWYER

Consulting Engineer



Rachel Sawyer is a consulting engineer at Modality Solutions. With the engineering team, she works with clients to ensure proper design and use of cold chain systems. She conducts product specific supply chain risk assessments, writes and updates Standard Operating Procedures for cold chain related processes that meet regulatory requirements, drafts protocols and reports for testing and validation of processes. In addition, Rachel reviews data packages for reports and conducts in-person cold chain consulting services.

Prior to joining Modality Solutions, Rachel worked as a research assistant at the Biological and Applied Nanotechnology Laboratory in Columbus, Ohio. In her position, she studied energy exchange mechanisms of DNA origami structures influenced by site specific bonding of gold nanoparticles. She also studied drug encapsulation and release time in synthesized PLGA PolyDots for clinical applications. In addition, Rachel worked at the Harvard Catalyst Clinic Research Center at Brigham and Women's Hospital in the Sleep-Disordered Breathing Lab in Boston, Massachusetts.

Rachel attended The Ohio State University where she received her B.S. in Chemical Engineering with a biological focus, and she was a Green Engineering Scholars graduate. Her coursework included: transport phenomena, separation processes, thermodynamics, kinetics, and reactor design. While at the university Rachel did a Mass Transfer Modeling Project where she mathematically modeled the diffusion of natural gas in air using a dynamic finite difference approximation.

Rachel's knowledge coupled with her experience with SolidWorks, ChemCad, MATLAB, Simulink make her an ideal member of the Modality Solutions engineering team.

Work Experience

Harvard Catalyst Clinical Research Center
Biological and Applied Nanotechnology Laboratory

Boston, MA
Columbus, OH

Education

Bachelor of Science, Chemical Engineering

The Ohio State University

Affiliations

AIChE (American Institute of Chemical Engineers)