



UNIVERSITY OF DELAWARE

ENGINEERING

DEPARTMENT OF CHEMICAL AND BIOMOLECULAR ENGINEERING



SEMINAR SERIES

FEBRUARY 17, 2023 | KURT WOHL MEMORIAL LECTURE

DAVID SHOLL

OAK RIDGE NATIONAL LABORATORY AND GEORGIA INSTITUTE OF TECHNOLOGY

Director and Professor

Attend virtually: <https://udel.zoom.us/j/99615073260>

SEPARATIONS AND HYBRID PROCESSES TO ACCELERATE DECARBONIZATION

Decarbonizing the world's energy system will require enormous changes in many sectors of the economy. I will discuss examples of developing separations and hybrid processes to tackle "difficult to decarbonize" sectors. Specific examples will be discussed of using computational materials modeling to accelerate development of sorbents for challenging separations. A framework for developing concepts associated with carbon dioxide removal technologies will also be introduced.

ABOUT THE SPEAKER

David Sholl is the Director of the Transformational Decarbonization Initiative at the Oak Ridge National Laboratory and a Professor of Chemical & Biomolecular Engineering at Georgia Tech. He is currently a Strategic Policy Advisor for DOE's Office of Clean Energy Demonstrations and the Editor-in-Chief of AIChE Journal. From 2013-2021 David was the School Chair of Chemical & Biomolecular Engineering at Georgia Tech. He has published over 400 papers, a textbook on Density Functional Theory, a novel, Polyphony, and a book for early career researchers, Success and Creativity in Scientific Research. David was on the Board of Directors of AIChE from 2019-2021 and in 2020 chaired the inaugural Gordon Research Conference on Chemical Separations. He was a member of the study committees that wrote the National Academy of Engineering's reports Research Agenda for a New Era in Separations Science and Chemical Engineering: Challenges and Opportunities in the 21st Century.