

From land surface to the aquifer: vadose zone and recharge monitoring in Nebraska

Organized by Daniel Snow, University of Nebraska Water Center, and Troy Gilmore, University of Nebraska School of Natural Resources - Conservation and Survey Division and Biological Systems Engineering

Cosponsored by the Lower Platte South Natural Resources District, the Nebraska Water Center and with support from a grant from the Nebraska Department of Environmental Quality

Final Agenda - March 1, 2017

8:00-8:30 am – Welcome and Introductions – Dan Snow

8:30-9:30 am - “Unlocking the Secrets of the Vadose Zone” Tiffany L. Messer, Ph.D.

9:30--10:30 am – “Groundwater Recharge: Techniques and Challenges” Troy Gilmore, Ph.D.

10:30-10:45 am- Morning Break – Refreshments provided

10:45-11:30 am – “Chasing Vadose Zone Nitrate: Case Studies in Nebraska” Dan Snow, Ph.D.

11:30-12:00 – Hands on work with vadose zone core samples/Wrap up

The Nebraska Water Center will apply for 4 Continuing Education Units (CEUs) for appropriate categories of NDHHS water well licenses and certificates. To qualify you must attend the entire session, and make sure to include your license information, and email address to ensure that you get credit.

Presenters

Troy Gilmore is an Assistant Professor and Groundwater Hydrologist in the Conservation and Survey Division and Biological Systems Engineering Department at the University of Nebraska. He holds a PhD (Biological and Agricultural Engineering) and bachelor degree (Civil Engineering) from North Carolina State University. Troy started at the University of Nebraska in 2015. His research experience includes studies of groundwater contamination, groundwater recharge, and groundwater-surface water interactions.

Tiffany Messer is a new Assistant Professor in Biological Systems Engineering at the University of Nebraska. She holds degrees in Biosystems and Agricultural Engineering from University of Kentucky and North Carolina State University, and completed a postdoctoral appointment in the Nicholas School of the Environment at Duke University. Her research has focused on nutrient and insecticide fate and transport in agroecosystems, and her research interests reside at the intersection of engineering, ecology, and agriculture with an emphasis on environmental biogeochemistry and water resources in agricultural landscapes.

Daniel Snow is the Director of the University of Nebraska Water Sciences Laboratory, a part of the Nebraska Water Center, and a Research Associate Professor in the School of Natural Resources at the University of Nebraska-Lincoln. He holds a PhD from the University of Nebraska, a master’s degree from Louisiana State University, and bachelor degree from Missouri State. Over the past 25 years, his research interests and experience has focused on the environmental fate of agrichemicals in ground and surface water. His primary responsibility is development of new methods in support of water research.