

# Purdue Geotechnical Society Workshop Program

Friday April 13, 2012

Room 218, Stewart Center, 128 Memorial Mall, Purdue University, West Lafayette, IN

## Theme: Geotechnical Engineering: Crossing Boundaries

- 7:30 a.m. Breakfast: coffee, juice, rolls, fruit, etc.  
8:00 a.m. **Opening of Workshop** : *Philippe Bourdeau, Purdue University*  
Welcome: Speaker TBA

### MORNING SESSION Moderator & Coordinator: TBA

- 8:20 a.m. **Keynote: THE BOUNDARIES BETWEEN DESIGN OR MENTAL MODELS AND REAL PERFORMANCE**  
*Rick Deschamps, Nicholson Construction company*
- 9:00 a.m. **Numerical Analysis of Structured Soils**  
*Angelo Amorosi, Politecnico di Bari*
- 9:20 a.m. **August 23, 2011 Central Virginia Earthquake and Implications of the IBC**  
*Morgan A. Eddy, Steele Foundation, LLC*
- 9:40 a.m. **Image Processing for Comprehensive Soil Characterization**  
*Roman D. Hryciw, University of Michigan*
- 10:00 a.m. **BREAK**
- 10:30 a.m. **New Generation TDR for Water Content and Dry Density of Soils**  
*Sochan Jung, Purdue University*
- 10:50 a.m. **Bioswale Demonstration Project (Cook County, Illinois)**  
*Angela C. Force, Christopher B. Burke Engineering, LLC*
- 11:10 a.m. **Construction Over Soft Ground: A Cost-Efficient Combination of Proven Technologies and Novel Design**  
*R. David Espinoza, Geosyntec consultants*
- 11:40 a.m. **GROUP PHOTO, PMU STEPS**
- 11:50 a.m. **LUNCH** – Room 118, Purdue Memorial Union

### AFTERNOON SESSION Moderator & Coordinator: TBA

- 12:50 p.m. **Keynote: IMAGING PHYSICAL PROCESSES IN FRACTURES**  
*Laura Pyrak-Nolte, Purdue University*
- 1:30 p.m. **Understanding Clays in Oil Sands Processes: how the clay particle beat the 10<sup>5</sup> ton per hour process**  
*Cliff Johnston, Purdue University*
- 1:50 p.m. **Lubrication Behavior of Drilling Fluids: Rheology, Tribology & Colloidal Science**  
*Pao-Tsung Huang, Purdue University*
- 2:10 p.m. **BREAK**
- 2:30 p.m. **Effects of Geochemical Changes on Geotechnical Properties of a Leached Ore Material**  
*Jeong-Yun Won, Fugro Consultants, Inc.*
- 2:50 p.m. **Performance of Energy Foundations for Heating and Cooling of Structures**  
*C. Guney Olgun, Virginia Tech*
- 3:10 p.m. **Residential Clients and Difficult Sites; Putting a Successful Project Together**  
*Rick Prince, Prince Engineering*
- 3:30 p.m. **PANEL DISCUSSION**  
Moderator: *Joe Sinfield, Purdue University*
- 4:15 p.m. **WORKSHOP CLOSURE**