

CENTER FOR THE DEVELOPMENT AND USE OF ALTERNATIVE WATER SUPPLIES

Opportunities for collaborative research between NMSU and the Bureau of Reclamation

Las Cruces Convention Center

Tuesday, October 24, 2017

WORKSHOP AGENDA

Objective: Charting a course for the most meaningful and relevant research implementation

8:00 am BREAKFAST AND POSTER SESSION

8:40 [Sam Fernald](#), Principal Investigator, Cooperative Agreement
Director, New Mexico Water Resources Research Institute

8:50 [Javier Perea](#), Mayor, City of Sunland Park

9:00 *Overview of Reclamation Programs for Water Treatment*
[Yuliana Porras-Mendoza](#), Advanced Water Treatment Coordinator, Bureau of Reclamation

9:30 [NM Representative Bill Gomez](#), District 34

9:40 [NM Representative Nathan Small](#), District 36

9:50 [NM Senator Ron Griggs](#), District 34

10:00 BREAK

CURRENT NEW MEXICO STATE UNIVERSITY RESEARCH

10:15 *In-situ Synthesis of Antibacterial Ultrafiltration and Microfiltration Membranes with Controllable Pore Size*
[Reza Foudazi](#), Chemical and Materials Engineering

10:25 *Biochar for Desalination Concentrate Management*
[Catherine Brewer](#), Chemical and Materials Engineering

10:35 *Advanced Chemical Analysis Capability for Alternative Water Source Research*
[Tanner Schaub](#), Chemical Analysis and Instrumentation Laboratory

10:45 *Reducing Treatment Costs of Alternative Waters with Antifouling Ion-Exchange Membranes*
[Pei Xu](#), Civil Engineering

10:55 *Isotopic, Geochemical, and Modeling Evaluation of Source Water, Extraction Potential, and Potential Impacts of Using Brackish Water for Desalination in the Mesilla Basin, NM*
[KC Carroll](#), Plant and Environmental Sciences

11:05 *Low Cost, Low Energy Concentrate Water Desalination using Heat Recuperative Solar Still with Concentrating Solar Technology*
[Sarada Kuravi](#), Mechanical and Aerospace Engineering

11:15 *Valuing the Potential Contribution of Desalination and Water Reuse to the Water Supply Portfolio of Southern Dona Ana County, New Mexico*
[Brian Hurd](#), Ag Economics & Ag Business

- 11:25 *Irrigation with Brackish Groundwater and Desalination Concentrate: Effect on soil microbial properties, plant uptake and ion deposition in soil*
Sam Fernald for Manoj Shukla, Plant and Environmental Sciences
- 11:35 *Assessment of Brackish Groundwater Desalination for Municipal and Industrial Water Supply in Santa Teresa, New Mexico*
J. Phillip King, Civil Engineering
- 11:45 BREAK
- 11:55 **LUNCH**
- 12:00 pm *Bringing Desalination to El Paso, TX*
John Balliew, President & CEO, El Paso Water Utilities
- 12:30 *Desalination Plant in Ensenada, Baja California: The path towards reaching operational phase*
Fernando Barrera, North American Development Bank Senior Project Closing Specialist, Ensenada Desalination Plant
- 1:00 BREAK
- 1:15 *Decision Support System for Exploring the Energy-Water Investment Nexus*
Vince Tidwell, Distinguished Member of Technical Staff, Sandia National Laboratories
- 1:30 Community Small Group Discussion
Avery Olshefski, Program Coordinator, New Mexico Water Resources Research Institute
- 2:15 Discussion Highlights
Avery Olshefski
- 2:20 **ADJOURN**

Opinion Survey:

<https://goo.gl/FKeHrR>

