

Provost Lynnette Zelezny, Fresno State

Executive Convener, DROUGHT SUMMIT

BIOGRAPHY

Lynnette Zelezny, PhD, is Provost and Vice President for Academic Affairs at Fresno State. Among her wealth of accomplishments and publications, Lynnette was also the Principal Investigator on the study, *The Impact of the Drought in the San Joaquin Valley* (fresnostate.edu/academics/drought), funded by the Wells Fargo Foundation. She is an Environmental Psychologist who has published on American and multinational values related to environmental behaviors; educational interventions to improve environmental behaviors; and gender differences in environmentalism. Lynnette was a Fulbright International Educational Administrator (Germany, 2012) and an ACE Fellow (2009-2010). She was selected to participate in Harvard University's Management Development Program (2007) and in the Wharton School of Business's Executive Leadership Program (2005).

Her recent Op-Ed in the *Fresno Bee* outlined Fresno State's commitment to becoming a premiere "Water University." The university's short list of water research places it at the leading edge of developing solutions for the most pressing concerns: the impact of drought, water use efficiency in agriculture and urban settings, the water needs of disadvantaged communities, integrated regional water management planning, and monitoring ground water resources (fresnostate.edu/water-research).

STATEMENT OF INTEREST

Lynnette has a strong interest in building a San Joaquin Valley collective to benefit the region and to be a national model of cooperative research, discourse, and high value information networks such as Fresno State's Water Information Resources Network and Drought Research Center (WIRN-DRC). The Drought Summit is a critical first step in encouraging collaboration and engagement from the entire region to raise awareness and to create solutions that make a difference in the San Joaquin Valley.

Alaniz, Ryan

Sociology

Cal Poly SLO

Drexler, David

Henry Madden Library

Fresno State

BIOGRAPHIES

Ryan Alaniz (PhD, Sociology) is an assistant professor at Cal Poly SLO. Dr. Alaniz is currently affiliated with the United Nations University-Institute for Environment and Human Security and the Resilient Communities Research Institute for his work on disaster recovery and resettlement. He recently directed a week-long conference, *Disaster by Drought*, that brought together scholars and practitioners from the Western United States and a dozen nations. His academic specialties are —

- Disasters; Resettlement
- Community Recovery and Development
- Community Social Health
- Social Movements/Collective Action/Social Change
- Latin America (especially Central America)
- Climate Change and Water Scarcity
- Drought in California and Social Issues.

David Drexler is Digital Initiatives Librarian at The Henry Madden Library at Fresno State. He received his MLIS at the University of Wisconsin–Madison School of Library & Information Studies in 2008 and served previously as Systems Librarian at Eastern Oregon University. He is the library liaison to Fresno State’s Music Department and a member of the Interdisciplinary Water Cohort.

STATEMENTS OF INTEREST

Ryan is interested in the cascading social consequences of drought, especially on marginalized groups in California. He also investigates potential ways of addressing the drought.

David is interested in library technology projects. He is involved in a number, most notably the Waterways project, a spatially-enabled web portal for information about California’s Central Valley.

Francis, Hunter

Center for Sustainability

Cal Poly SLO

Gruntfest, Eve

Professional Associate, Resilient Communities Research Institute

Cal Poly

BIOGRAPHIES

Hunter Francis is founder and director of the Center for Sustainability in the College of Agriculture, Food & Environmental Sciences (CAFES) at Cal Poly SLO. He holds an MS in Agriculture with a specialization in Soil Science from Cal Poly, where he also serves as a part-time lecturer. As part of his master's work, Hunter initiated Cal Poly's organic agriculture program. In 2012, he founded Cal Poly's Compost Project. He has helped to develop numerous professional development and continuing education workshops on a wide range of topics. He is co-editor of the semi-annual *Applied Biodynamics* newsletter and serves as a board director for the California Climate & Agriculture Network, the Sustainable Poultry Network, and Central Coast Grown, which manages the new SLO City Farm. Current projects at Cal Poly involve the development of workshops and programs for soil health, organic agriculture, and holistic grazing, all of which have the potential to mitigate and adapt to variations in climate and drought.

Dr. Eve Gruntfest is a Professional Associate in the Resilient Communities Research Institute at Cal Poly SLO. She is a geographer who has been working in the field of natural hazard mitigation for 40 years. Her career began with her Master's thesis research focused on what people did during the catastrophic 1976 Big Thompson Flood in Colorado. Eve also served a year as a Program Officer at NSF. Website: Evegruntfest.com

STATEMENTS OF INTEREST

Hunter is interested in building relationships with others who would like to collaborate on similar projects.

Eve has published widely and is an internationally recognized expert in her specialty research areas of warning systems, flash flooding, and integrating social science into atmospheric science. She is Professor Emeritus of Geography and Environmental Studies at the University of Colorado at Colorado Springs after working as a professor in the department from 1980 until 2007. She is the founder of the Weather and Society * Integrated Studies movement (WAS* IS).

Harootunian, Gil

Director, University Initiatives

Fresno State

Kahraman, Murat

Visiting International Scholar

Fresno State

BIOGRAPHIES

Gil Harootunian, PhD, is Director of University Initiatives at Fresno State. She makes initiatives happen. Among her most recent initiatives, she worked on securing the funding for and served as the Editor of Fresno State's study, *The Impact of the Drought in the San Joaquin Valley*.

Murat Kahraman, PhD, has worked for Turkey's Ministry of Food, Agriculture and Livestock as an Agricultural Engineer since 2002. He is a visiting scholar in the Department of Agricultural Business at Fresno State studying the effects of drought on the agricultural sector and importance of agricultural policy associated drought relief. His publications have researched the applied policies on and the importance of opium poppy in Turkey.

STATEMENTS OF INTEREST

Gil has served as a Fulbright Scholar and U.S. Project Director of educational exchange grants funded by the U.S. Department of State. Gil is interested in both the drought in the San Joaquin Valley and the local and international intersections of drought. She has begun developing an international matrix for drought (e.g., policies and practices, infrastructure, challenges).

Murat plans are to investigate drought policy and its impacts on agricultural production while at Fresno State. He is especially interested in learning about California drought issues associated with rural development, agricultural production, and water management. He hopes to visit with growers, policy makers, and water management experts during his time in the Central Valley.

Lawless, Christopher

Social Sciences

Durham University

Matsumoto, Mark

Dean, School of Engineering

UC-Merced

BIOGRAPHIES

Christopher is a Lecturer in Applied Social Sciences at Durham University, UK, having previously held positions at other UK institutions including the London School of Economics and Edinburgh University. He holds a PhD in Sociology from Durham University. His research encompasses a range of empirical interests focusing on the relationship between environmental risk, livelihoods, and social justice. Since 2013, he has participated in the United Nations University Resilience Academy, which brings together an international cohort of academic researchers, practitioners, and policymakers. The work of the Resilience Academy is aimed at enabling policymakers and civil society groups in climate-affected regions to develop sustainable livelihood strategies.

Mark Matsumoto, PhD, BCEEM, joined the University of California, Merced as the Dean of the School of Engineering on Sept. 1, 2015. Dr. Matsumoto is a widely published author or co-author of technical articles, research reports, textbooks, and review articles in his fields of interest. He has made scholarly contributions at more than three dozen symposia and conferences. His research work, often conducted with colleagues, has attracted more than \$10 million in sponsored support. He is a member of the American Academy of Environmental Engineers, the American Association for the Advancement of Science, and the American Society for Engineering Education. He has earned several honors and awards for teaching excellence. Dr. Matsumoto holds PhD and master's degrees in Civil (Environmental) Engineering from the University of California, Davis, and a bachelor's degree in Civil Engineering from the University of California, Irvine. Before joining the faculty at UC Riverside (1994), he taught for 11 years at the State University of New York at Buffalo, where he established and directed its Environmental Science Program.

STATEMENTS OF INTEREST

Christopher participated in the Cal Poly SLO week-long conference exploring the Great California drought and future research activities, including work addressing the effects of the drought in affected communities such as East Porterville. Christopher is developing a research agenda to study how combinations of environmental, infrastructural, material, political, economic, and other social factors have shaped responses to the drought in East Porterville. He will travel to the region later in 2016 to conduct fieldwork and to develop links with researchers and practitioners involved with addressing the drought in the area.

The California drought and the effects of climate change have caused people to realize past and current water use practice are most likely not sustainable nor adequate in the future. A comprehensive interdisciplinary assessment is needed to address water management policies and practice needs. The Dean's background is related to protecting and improving water quality, for municipal and agricultural applications. Research interests include agricultural drainage reuse, water and wastewater treatment, hazardous waste site remediation (soil, groundwater), nitrogen management.

McDonald, Peter

Dean, Henry Madden Library

Fresno State

McHale, Maggie

Student, Sociology

Cal Poly SLO

BIOGRAPHIES

Dean Peter McDonald came to Fresno State in February 2007 with extensive leadership in academic librarianship. He came from the Syracuse University Library, where he was the Associate University Librarian for Collection Services, and Director of the Belfer Audio Archive. Prior to Syracuse, he served as the head librarian at the Geneva Experiment Station Library at Cornell University, after completing his work on the Core Agricultural Literature Project as chief bibliographer at the Mann Library. He also worked as a Mellon Preservation Intern at the New York Public Library, Research Division, and as a copy cataloger at the Grolier Club in New York. Dean McDonald received his bachelor's degree from McGill University in the 1970s, his master's in library science from the University of Washington in Seattle, and a Preservation Administrator's certificate from Columbia University. He is an elected member of the governing Council of the American Library Association.

Maggie McHale is a Cal Poly senior, studying Sociology with minors in Women and Gender Studies and Communication Studies. She assisted Dr. Ryan Alaniz in organizing and delivering Cal Poly SLO's *Disaster by Drought* week-long conference. Her goal was to learn more about the Great California Drought and how it will impact the lives of this generation and future generations.

STATEMENTS OF INTEREST

Peter has a keen interest as a librarian in improving authoritative dissemination of water data and information resources to all stakeholders during California's historic drought.

Maggie would like to get a better insight into how academia can create viable solutions from the Fresno State Drought Summit.

Negrini, Robert

Geology

CSU-Bakersfield

Nelson, Fred

Science Education

Fresno State

BIOGRAPHIES

Rob Negrini's research areas include the geologic history of water resources feeding the San Joaquin Valley for the past 20,000 years. Robert has worked as a Professor at CSU Bakersfield since the Fall of 1985 and was selected as the CSUB Outstanding Professor in 1997 and the CSU Bakersfield Outstanding Research Faculty in 2012. He has published 30 papers in peer-reviewed journals including *Geology*, *Journal of Geophysical Research*, *Water Resources Research*, *Earth and Planetary Science Letters*, and *Geophysical Journal International*. His research has been funded with more than \$7M in grants from local industry, the NSF, USDA, the California Department of Water Resources, and the Petroleum Research Fund of the American Chemical Society. Robert has served as President of the San Joaquin Geological Society and was selected as the 2008 Educator of the Year by the Pacific Section of the American Association of Petroleum Geologists. He serves as the Director of the CSUB California Energy Research Center.

Dr. Frederick Nelson is Assistant Professor of Science Education in the Department of Curriculum and Instruction in the Kremen School of Education and Human Development at Fresno State. He received his PhD in Science Education from the University of Florida in 2012. He teaches courses in science methods and curriculum, instruction, and technology. He also held National Board Certification in Adolescent and Young Adult Science. He is Project Director of the Strategic Teacher Education Partnership and a member of the Interdisciplinary Water Cohort at Fresno State. He coordinated the first Reading About Water initiative in 2015 that featured a campus-wide common reading of Charles Fishman's book, *The Big Thirst*. He has expertise in naturalistic inquiry, reflective practice, and inquiry-oriented instruction.

STATEMENTS OF INTEREST

Robert is interested in collaborative grant writing to support faculty and student research (e.g., faculty release time, student research assistantships, travel support) on water resource issues. State water bond monies are an intriguing yet elusive funding source target.

Fred is interested in the design of curriculum that takes an interdisciplinary approach to student learning about the challenges of water. Water is a theme for developing understanding that is accessible to all learners.

Olson, Laura Lynn

**United Nations Development
Programme (UNDP)**

Pasha, Fayzul

**Civil Engineering
Fresno State**

BIOGRAPHIES

Laura Olson works with the UNDP's Recovery Unit as a Senior Consultant. She conducts Post-Disaster Needs Assessments after major events internationally, designs solutions to Disaster Risk Reduction and recovery dilemmas, and trains government employees on disaster management best practices. She has worked in the Middle East, Asia, and Africa with the UN leading recovery missions. She is also a Reservist with FEMA's Recovery Cadre, periodically supporting U.S. communities trying to rebuild after natural disasters. Her scholarly work includes teaching in Georgetown University's Emergency & Disaster Management program and research projects with Virginia Tech's Global Forum on Urban and Regional Resilience, where she is a Senior Research Fellow. She has responded to disasters and crises for 15 years with a variety of different entities: FEMA, HUD, the White House, the American Red Cross, United Way, VOAD groups, and the United Nations. <http://www.gwu.edu/~icdrm/people/olson.html>

Dr. Pasha is experienced in quantitative analysis in water resources planning and management. During his 15 years of research and professional career, he has developed different models and performed quantitative analyses for sustainable decision making in integrated water resources management using statistical methods, numerical techniques, optimization theories, and machine learning approaches. Dr. Pasha contributed the first chapter, "Severity of the Drought and its Impact on Agriculture and Use of Energy," to Fresno State's *The Impact of Drought in the San Joaquin Valley*. Dr. Pasha has won numerous awards including the Provost's "Promising New Faculty" award at Fresno State and a Project Award by Oak Ridge National Lab (ORNL). He has been recognized by the CSU's Water Resources and Policy Initiative (WRPI). Dr. Pasha teaches water resources engineering in the Civil Engineering Department at Fresno State. He earned his PhD from the University of Arizona and has authored more than 40 technical papers.

STATEMENTS OF INTEREST

Laura's research interests include —

- **Social Vulnerability, Community Recovery, Sustainable Development, and Disasters**
- **Social Theory, Disaster Sociology**
- **Organizational Resilience and Learning in Post-Disaster Contexts: Response and Adaptation to Sudden Internal and External Changes.**
- **Performance Evaluation of Disaster Management Programs**

Fayzul's work focuses on energy-water nexus. Water conservation, energy efficiency and conservation, efficient use of water in energy generation and distribution, and above all the development of water resources are his research interests.

Peters, Jason

English (Discourse Theory)

Cal Poly SLO

Pompeii, Brian

Geography

Cal Poly SLO

BIOGRAPHIES

Jason Peters is assistant professor of English at Cal Poly SLO. Previously, he was a Jacob K. Javits Fellow in speech, rhetoric, and debate at the University of Rhode Island, where he studied environmental rhetoric and communication. His research focuses on the cultural, political, and technical discourses that shape public understandings of watershed management. He has presented at national conferences for the Rhetoric Society of America and the Conference on College Composition and Communication. His article, "Tierra Contaminada: Economies of Writing and Contaminated Ground," forthcoming in the collection *Economies of Writing: Revaluations in Composition and Rhetoric* (Utah State UP 2016), explores the troubled relationship between technical reason and local forms of embodied knowledge in the environmental remediation of an urban pond system in Providence, Rhode Island.

Brian Pompeii, PhD, Geography, teaches in the Social Sciences Department, Cal Poly SLO. His research interests include water management, local environmental knowledge, socio-environmental change, and vulnerability to hazards.

STATEMENTS OF INTEREST

He is interested in studying the way technical reason, public discourse, and local forms of embodied knowledge interact and intersect, in the construction of conceptual models of watersheds and water scarcity, and in the determination of water rights and water access.

Brian is interested in pairing a historical-geography of water in the San Joaquin Valley with a comprehensive water security geodatabase as a tool to imagine future hydro-social landscapes and support decision making.

Siembieda, William

City and Regional Planning

Cal Poly SLO

Therkelsen, Jes

Documentary Filmmaking/Photography

Fresno State

BIOGRAPHIES

William Siembieda is Professor of City and Regional Planning and directs the College of Architecture and Environmental Design's Resilient Communities Research Institute at Cal Poly SLO. Research areas include disaster mitigation planning, recovery theory, resiliency planning, and the operation of urban land markets. He co-directed the State of California Multi-Hazard Mitigation Plan and the Climate Adaptation Planning Guide. International work includes research at the Disaster Prevention Research Institute, Kyoto University, and the Joint Center for Disaster Research, Massey University, New Zealand. He is a disaster recovery subject matter expert to the World Bank, the Asian Development Bank, the US Department of Homeland Security, and the Chilean National Research Center for Integrated Disaster Management. A Fulbright Scholar and a Fulbright Specialist, Dr. Siembieda holds a PhD in Urban Planning from the University of California, Los Angeles. Recent international scholarship includes research on extreme events and disaster recovery policy; Chile's initial recovery following the "27F" earthquake and tsunami; adaptation to seismic risk and climate change in San Francisco and Berkeley; and crisis management systems in Japan.

Jes Therkelsen is a documentary filmmaker, an adventure photographer, and an assistant professor of media storytelling in the Mass Communication and Journalism Department at Fresno State. Confronting inequality, sustainable development, and environmental justice, his award-winning documentary work has screened in festivals across the country and broadcasted on regional television. As a photographer with *National Geographic* Student Expeditions, he has worked in the Galapagos Islands, the Australian Outback, the Great Barrier Reef, Tuscany, Iceland, the Indian Himalayas, and the Namibian safari. He served as the first Environmental Filmmaker-in-Residence at the College of William and Mary in Virginia before joining the faculty at Fresno State. Jes is a member of the Water Cohort where he focuses on producing water-related stories. He has also published on media culture, environmental filmmaking, and the relationship between international service learning and documentary production.

STATEMENTS OF INTEREST

William's focus is the use of land use planning as a tool for hazard risk reduction. Of interest is the way in which incentives can be structured and administered to gain large-scale support and adoption. Land use regulation in California has not considered drought as a natural hazard. The assumption was that water availability was a given in the General Plan Land Use and Safety Elements. New thinking needs to be fashioned to include drought as a variable at least at the regional planning scale.

**Jes' research interests are represented in the two video narratives he created for Fresno State study, *Impact of the Drought in the San Joaquin Valley*:
Switching to Almonds
<https://vimeo.com/124495171>.
Password: almonds
East Porterville:
<https://vimeo.com/124558471>.
Password: Porterville.**

Wrathall, David

Geography

San Jose State University

Zoldoske, David

Director, CA Water Institute

Fresno State

BIOGRAPHIES

Dr. David J. Wrathall is a geographer with a PhD from King's College London. David studies human migration in "climate-scapes": places rendered uninhabitable due to climate pressures and the local possibilities for place abandonment. These local patterns of abandonment are always circumscribed by labor markets, and David is interested in migration and climate change in the most vulnerable and exploitative labor markets, such as Bangladesh (which has the lowest wages on earth), Honduras (the original Banana Republic, where a legacy of large-scale monoculture persists) and Peru (where water resources have been shaped by irrigation megaprojects during the past 30 years). David is currently pursuing this interest with massive sets of anonymized mobile phone data to investigate the impact of tropical cyclones on human mobility in the extreme south of Bangladesh. Previously, David was an associate academic officer at United Nations University Institute for Environment and Human Security. David also held an NSF post-doctoral research fellowship at UC-Santa Cruz, studying glacier recession and the effect of shifting water resources on migration in the Cordillera Blanca, Peru.

David Zoldoske, PhD, serves as the Director of the California Water Institute and the Center for Irrigation Technology at Fresno State, where he has been actively working on "water use efficiency" issues for over 30 years. He recently served as vice-chair of the California Department of Water Resources strategic planning caucus for New Water Technology, served as a member of the California Department of Food and Agriculture Nitrogen Tracking and Reporting Task Force, and served as a member of the Agricultural Measurement Subcommittee to the State of California's Senate Bill SBx7 7-Agriculture Stakeholders Committee.

STATEMENTS OF INTEREST

David is interested in California's agricultural labor market, which is constituted around an ambivalence toward unauthorized Latino laborers (i.e. it depends on low-wage workers in the most expensive state in the nation). He is interested in the effect of the drought on Latino migration within California and within the United States, particularly in population dynamics in different drought affected areas (vulnerable versus less vulnerable).

David is interested in a healthy discussion exploring what we should be doing to manage above normal rainfall for our future benefit, given that the 2015-16 water year is looking to be "wet."