Sponsored Research Projects

Active Grants

- PEER grant 1123-NCTRYH "Flooding predictions and Interface for Pt. Huemene, CA". Co-PI: Juan M. Restrepo with H. Yeh. Total award $150,000, 2016.

Archival List

- BPA Technology Innovation Program, "Framework for Quantification of Risk and Valuation of Flexibility in the FCRPS", Co-PI Nathan Gibson, with Arturo Leon (PI, Civil Engineering), Yong Chen (Co-PI, Applied Economics), Claudio Fuentes (Co-PI, Statistics) and Christopher Hoyle (Co-PI, Mechanical Engineering), $1.2M, 10/2015--9/2018.
- National Energy Technology Laboratory Office of Research & Development Fund, "Applying Computational Methods to Determine the Electric Current Densities in a Magnetohydrodynamic Generator Channel from


- BPA Technology Innovation Program, ``Towards reduction of uncertainty in the operation of reservoir systems``, Co-PI Nathan Gibson, with Arturo Leon (PI, Civil Engineering) and Christopher Hoyle (Co-PI, Mechanical Engineering), $555,527, 10/2012--9/2015.

- "Risk Reduction of CO2 Storage with Stochastic Simulations" (PI M. Peszynska, Co-PI Mina Ossiander), DOE NETL project Nov. 15, 2013-October 31, 2014, $94,000

- "Cumulative Evaluation of Spatial Risk & Uncertainty in Support of CO2 Storage Evaluation" (PI M. Peszynska, Co-PI Mina Ossiander), DOE NETL project Nov. 15, 2013-October 31, 2014, $60,000


- Residence and First Passage Time Functionals in Heterogeneous Ecological Dispersion; Sep 2011-Aug 2013 PI's: Edward Waymire along with Brian Wood from the School of Chemical, Biological and Environmental Engineering. Co-PI's: Vrushali A. Bokil, Nathan Gibson, Enrique Thomann

- SOLAR: Enhanced Photovoltaic Efficiency through Heterojunction Assisted Impact Ionization: Sep 2010- Aug 2014), Collaborative project with University of Oregon, PI: Stepehen Kevan, OSU co-PIs: Malgorzata Peszynska Guenter Schneider and Janet Tate


- A New Look at the Freudenthal Magic Square; Jul 2013–Jun 2013 PI: Tevian Dray


- Interconnections Networks Topological Properties and Communication Algorithms; Sep 2010-Aug2013 PI:Bella Bose, CoPi:Mary Flahive


- Partition Rank Functions-American Institute of Mathematics Structured Quartet Research: Oct 2011-July 2015, PI's: Holly Swisher OSU, Sharon Garthwaite (Bucknell University), Soon-Yi Kang (Kangwon National University, Stephanie Treneer (Western Washington University), Amanda Folsom (Amherst College).


- Bridging the Vector Calculus Gap: Episode II, 2003–2007, see also project page, PI: Tevian Dray

- Model Adaptivity for Porous Media:2005-20011, PI: Malgorzata Peszynska


- Computed Tomography and Sampling Aug 2002-Jul 2006, PI: Adel Faridani

- Ecosystem Informatics IGERT Math Faculty involved: Vrushali Bokil, Yevgeniy Kovchegov, Mina E. Ossiander, Enrique A. Thomann, Edward C. Waymire

- Investigating the Effectiveness of the NWREL Mathematics Problem-Solving Model: A Quasi-Experimental Study, Co-PI: Thomas P. Dick

- Mathematical and Experimental Analysis of Reactive Transport in Discontinuous Porous Media Co-PIs:Vrushali A. Bokil, Enrique A. Thomann, Edward C. Waymire


- Paradigms in Physics: Multiple Entry Points: 2006--2011, see also project page,Co-PIs: Tevian Dray, Barbara E. Edwards

- Projectile Penetration into Sand Media; PI: Ronald B. Guenther