

## Utah Water Sustainability Post-Doctoral Fellowship Coupled Human-Natural Water Systems

The University of Utah and Utah State University seek a post-doctoral fellow to participate in a new NSF EPSCoR-funded project on water sustainability in the Wasatch Front of northern Utah. This region is experiencing rapid population growth and urbanization as well as changing climate and water availability. Understanding water sustainability in this region requires an interdisciplinary approach to studying the biophysical, social, and engineered aspects of local water supply, management, redistribution, recharge, and consumption. The iUTAH project (innovative **U**rban **T**ransitions and **A**ridregion **H**ydro-sustainability) is a multi-campus capacity-building program focused on interdisciplinary research, training, and outreach in local water sustainability.

iUTAH seeks a post-doctoral fellow to work with a team of hydrologists, ecologists, climate scientists, social scientists, planners, and engineers to:

- Lead an effort to refine a conceptual model that represents the major water pools and fluxes in our study domain that guides the study of human-natural interactions related to local water sustainability
- Oversee the inventory and documentation of relevant models currently used by Utah scientists to study aspects of the water system in the Wasatch Front, including hydrologic, ecological, climate, land use, and agent-based models
- Contribute to an ongoing inventory of historic and current data on the inputs, outputs, and system states associated with these models
- Work with stakeholders and scientists to develop a suite of scenarios representing future changes in the water system that can be used as a common basis for model evaluations by the interdisciplinary project team

Within this broad framework, the fellow will be expected to conduct an independent research project on coupled human-natural water processes using local datasets and/or developing and linking water-related models in the study region. The initial appointment is for one year, with the option of renewal for an additional year. The fellow will choose either the University of Utah in Salt Lake City or Utah State University in Logan but will also meet frequently with project participants at other campuses in Utah. For more information about the iUTAH project, please visit <a href="https://iutahepscor.org/">https://iutahepscor.org/</a>.

Applicants should hold a Ph.D. in ecology, hydrology, climate science, natural resource management, engineering, sociology, or planning with relevant experience in studying water issues.

Applications should consist of a single PDF file that contains a cover letter, statement of research interests, curriculum vitae, and the names and contact information of three references. The review of applications will begin on January 1, 2013, and applications will be received and reviewed until the position is filled. The appointment start date is flexible but early in 2013 is preferred. Inquiries and applications should be directed to Prof. Diane Pataki at the University of Utah (diane.pataki@utah.edu).