

iUTAH Water Sustainability Graduate Research Fellows: Call for Proposals

The NSF EPSCoR innovative Urban Transitions and Arid-region Hydro-sustainability (iUTAH) program announces a 2012-2013 call for proposals for Graduate Research Fellows to be located at the University of Utah. Only students currently enrolled in a Ph.D. program (or in the terminal graduate degree for their field) at the University of Utah, Utah State University, and BYU as of August 2012 and conducting research in an area broadly pertaining to water sustainability in the Wasatch Front are eligible to apply. This program is intended to fund interdisciplinary research that helps to address the questions:

- *What is the current water balance of the Wasatch region, and how vulnerable are water resources to changing climate and urbanization?*
- *What is the current structure of land use and water management, and how can these systems best adapt to future constraints on water resources?*
- *What are the key linkages between the biophysical and human components of the water system, and how do these linkages structure adaptation to water resource changes?*
- *How can we present and visualize model and data products to enhance communication, learning, and experimentation among faculty, students and stakeholders?*

Applicants must submit a proposal that addresses a specific aspect of these questions. The selection committee at each university will give preference to proposed interdisciplinary activities involving two or more faculty in different disciplines, departments, and/or campuses (UU, USU, BYU). Fellowships will provide one, two, or three semesters of full support (stipend and tuition if required), depending on the scope of the proposed work. The proposal must describe which semester(s) of stipend support are being requested. Students may propose research projects or planning/communications activities that will contribute to the development of iUTAH's facilities, networks, and programs. iUTAH will increase the state's capacity for research and education by instrumenting local watersheds, collecting relevant socio-economic data, constructing green infrastructure experimental facilities, enhancing cyberinfrastructure, and developing new modeling platforms and data visualization tools pertaining to water resources and sustainability. For more information visit <http://utepscor.org>.

Fellows will be required to participate in 1) the iUTAH Summer Institute, which engages high school students, middle and high school teachers, and university undergraduates, graduate students, and faculty; 2) pre-Institute training in near-peer mentoring and expected learning outcomes; 3) an annual, statewide iUTAH meeting in which fellows will be asked to present their results; 4) appropriate iUTAH team watershed/CI cyberinfrastructure planning meetings; and 5) meetings with visiting NSF and the External Advisory Board representatives as they occur.

Fellowships are \$8,500 per semester plus tuition waivers and medical insurance.

A preliminary report of activities and results will be due March 1, 2013. A final report will be required Aug. 1, 2013 regardless of the number of semesters a student is supported.

Applications should consist of:

1) A proposal that includes:

- A cover page, listing: (a) applicant's name, (b) academic department, (c) university, (d) telephone contact information, (e) email contact information, (f) name of student's graduate committee advisor, (g) title of proposed project, abstract of no more than 50 words, and (h) names and affiliations of the two or more faculty who constitute the interdisciplinary advisors for this stipend support.
- Scope of problem, its importance, and its relevance to iUTAH (1 page max)
- Details of the proposed activity. For research activities, state the hypotheses, methods, location, and timeline. For planning activities, specify the iUTAH program or facility of interest, the nature and scope of the planning activity, and the methods and timeline. (3 pages max)
- Description of the interdisciplinary and novel aspects of the proposed activity and how it will contribute to the overall dissertation, student training, and career goals. List the two or more interdisciplinary faculty who will supervise the student during the 2012-2013 academic year, as well as the current members of the graduate committee (1 page max)
- Budget to include stipend (indicating one, two, or three semesters of proposed support) and justification; for University of Utah students, a tuition waiver and insurance are provided (1 page max)
- References Cited (2 pages max)
- Proposals are to be submitted as a PDF document with sections arranged as described above. The single-spaced text (font size 11 or 12) should have 1 inch margins and include page numbers at the bottom of each page. Any figures and/or tables must fit within the above page constraints.

2) A current c.v.

3) Three letters of recommendation submitted according to the directions below, including one from the student's primary graduate program advisor.

Completed proposal applications and any proposal-preparation questions should be addressed to the following individuals. Applicants should also arrange for their references to send letters of recommendation directly to these individuals.

- **University of Utah applicants**, Diane Pataki, diane.pataki@utah.edu
- **Utah State applicants**, Todd Crowl, facrowl@gmail.com
- **BYU applicants**, Zachary Aanderud, zachary_aanderud@byu.edu

For more information about iUTAH,

- Visit <http://utepscor.org>
- A copy of the iUTAH proposal is available upon request to anyone of the three individuals above.

Deadline: July 15, 2012