Ed Lorenz Postdoctoral Fellows in the Mathematics of Climate

The Mathematics and Climate Research Network is a nation-wide NSF funded initiative. Our goal is to define, develop and solve mathematical problems that arise in climate science. A number of postdoctoral positions will be available starting in Summer or Fall, 2011. The successful applicants will be known as Ed Lorenz Postdoctoral Fellows in the Mathematics of Climate and will have an affiliation with one of the network nodes. The topics of research will range from sea-ice processes to paleoclimate studies and data assimilation in climate models. The network has twelve funded nodes and a number of other collaborating institutions. For more details, see www.mathclimate.org.

The postdoctoral fellows will be based at the nodes indicated below. There will be considerable interaction possible with other network members through weekly web-based seminars and working groups. The network encourages and will support extended visits by postdocs to other nodes

All interested recent PhDs are encouraged to apply. There are two steps necessary for a complete application: (1) posting materials to mathjobs.org (research statement, cover letter and 3 letters of recommendation), and (2) completing a short questionnaire to be found at: jobs.mathclimate.org.

The specific positions with areas of focus, primary locations and postdoctoral mentors as well as institution relevant information are given below. Salaries will be competitive. The postdocs are multi-year and starting times will all be sometime Summer or Fall, 2011. Teaching one course per year will be an option in most positions.

Arizona State University (School of Mathematical and Statistical Sciences), Data assimilation and large complex models of the atmosphere. Mentors: Eric Kostelich and Alex Mahalov

Bowdoin College (Department of Mathematics), Dynamical systems in climate process models and paleoclimate. Mentors: Mary-Lou Zeeman and Dick McGehee (Minnesota)

University of Chicago (Department of Geosciences), Modeling and analysis of climate processes such as water vapor and cloud feedback, atmospheric circulation, land and sea ice including applications to past climate, and modeling of carbon cycle fluctuations on varying time scales. Mentors: Pam Martin, Ray Pierrehumbert, Dorian Abbott and Mary Silber (Northwestern)

University of Utah (Department of Mathematics), Analysis of sea ice through modeling, computation, and methods of applied mathematics and physics. Field trips to the Arctic or Antarctic potentially part of postdoctoral work. Mentor: Ken Golden

University of Vermont (Department of Mathematics and Statistics), Development of data assimilation methods and implementation on climate models, both conceptual and global. Mentors: Chris Danforth and Chris Jones (UNC-CH)

University of Washington (Department of Applied Mathematics), Analysis of historical climate data using linear and nonlinear time series techniques. Mentors: Ka-Kit Tung and Dave Camp (Calpoly-SLO)

Each of the universities involved is an Affirmative Action/Equal Opportunity employer and welcomes applications from women, underrepresented ethnic, racial and cultural groups, and from people with disabilities. Reviewing of applications will begin on Jan 20, 2011 but applications will continue to be accepted until the positions are filled.