THE GEOPRISMS PROGRAM

is a community-driven effort to carry out interdisciplinary investigations of continental margins around the world. Scientists from different disciplines work together, combining field operations with numerical, experimental, and analytical studies to develop an integrated understanding of the fundamental controls on continental margin evolution. These include deformation of the crust and mantle, generation, transport and storage of magma, chemical and material fluxes, fluid flow, and surface processes. GeoPRISMS investigations have practical applications for sustainability in the face of climate change and sea level variation, resource management and availability, and hazard mitigation.

PROGRAM HIGHLIGHTS

Conferences & Workshops GeoPRISMS sponsors scientific workshops each year to plan and advance research.

() Event Response

A rapid response strategy for earthquakes, volcanic eruptions, and other natural events allows scientists to collect data on active systems.

() Data Management

All data collected under the GeoPRISMS Program are made available via an open, integrated data management system. http://www.marine-geo.org/portals/geoprisms/

Education & Public Outreach

GeoPRISMS offers several programs to engage the public and students, including the Distinguished Lectureship Program and the Annual Student Prize for best presentation at AGU. MARGINS mini-lessons are available for undergraduate classes. http://serc.carleton.edu/margins/index.html



DISTINGUISHED **ECTURESHIP** PROGRAM

PRISMS

Geo

2016 - 2017

An opportunity for US colleges, universities, museums, and other institutions to host lectures by outstanding geoscientists.

http://geoprisms.org/education/distinguished-lectureship-program/

The GeoPRISMS Program is driven by input from, and interaction with, the Earth science community. GeoPRISMS is funded by the National Science Foundation



DISTINGUISHED LECTURESHIP PROGRAM



Distinguished scientists involved with GeoPRISMS science and planning are available to visit US colleges, universities, museums, schools, and other institutions. The distinguished speakers will present technical and public lectures on subjects related to the two GeoPRISMS science initiatives:

SUBDUCTION CYCLES AND DEFORMATION • RIFT INITIATION AND EVOLUTION



ESTEBAN GAZEL

Dr. Esteban Gazel is an Assistant Professor at the Department of Geosciences at Virginia Tech. He uses geochemical and petrological tools to understand intraplate magmatism, subduction zone processes, and deep Earth geochemical cycles. Ongoing projects include the evolution of mantle plumes (from Large Igneous Provinces to

modern hotspots), the role of island arcs in the generation of continental crust, and volatile budgets in the mantle. His research approach integrates a combination of field, lab, statistical, and theoretical methods with interdisciplinary collaboration with other fields in Earth Science.

Public Lecture: *The rocks that joined the Americas: Is there a connection with climate and evolution of life?*

Technical Lecture: Making young continents in arcs



You Tube

HEATHER SAVAGE

Dr. Heather Savage is an Associate Research Professor at Lamont-Doherty Earth Observatory. Using both laboratory experiments and field studies, her research focuses on understanding the strength and stability of faults in order to improve our ability to assess when and where large earthquakes occur. Heather is particularly

interested in identifying seismic signatures of ancient earthquakes in the rock record that provide windows into the processes that occur during earthquakes. She has worked in a variety of geologic settings, studying faults in California, Nevada, Oklahoma, Vermont, Alaska, Wyoming, Japan, and Italy.

Public Lecture: The science and pseudoscience of earthquake prediction

Technical Lecture: Understanding deformation in fault zones over multiple seismic cycles



BEATRICE MAGNANI

Dr. Beatrice Magnani is a seismologist at Southern Methodist University whose overarching research theme is the formation, evolution of continents, and continental dynamics. Dr. Magnani employs controlled-source seismology to image continents at a wide range of scales and resolutions, from the lithosphere to the near surface. Her research

interests include the Eastern North American passive margin structure and evolution (ENAM Community Seismic Experiment Project), seismic oceanography, and glacial isostatic adjustment (GIA) investigations in the Patagonian Andes.

Public Lecture: *The legacy of ancient plate boundaries in continental intraplate deformation*

Technical Lecture: Short- and long-lived deformation in the Central US and implications for discriminating between natural and induced seismicity



BRANDON SCHMANDT

Dr. Brandon Schmandt is an Assistant Professor in the Earth and Planetary Science Department at the University of New Mexico. His research primarily uses observational seismology to investigate tectonic and magmatic processes operating near plate boundaries and beneath plate interiors. Recently he is involved in a collaborative project

to investigate melt generation, melt transport, and crustal evolution in the Cascades arc at Mount St. Helens. The seismic component of the project uses a multi-scale combination of seismic arrays, including two weeks of continuous recording with a 900-geophone array concentrated within about 12 km of Mount St. Helens.

Public Lecture: Exploring the roots of volcanoes with seismology

Technical Lecture: *Investigation of Mount St. Helens earthquakes and magma plumbing with a hybrid natural and controlled source seismic survey*

Interested in hosting a GeoPRISMS Distinguished speaker? Apply before July 1, 2016!

Any US institution interested in inviting a DLP speaker may apply via the GeoPRISMS website:

http://geoprisms.org/education/distinguished-lectureship-program/

Applications are due by July 1, 2016 for speakers visiting in Academic Year 2016 - 2017 (Fall 2016 - Spring 2017). Please note that spots are limited as speakers are only available to visit approximately four institutions apiece. Institutions catering to the general public or not currently involved with GeoPRISMS research are strongly encouraged to apply, including those granting undergraduate or masters degrees, as well as those with PhD programs. Institutions may request a technical and/or public lecture. Public lectures outside of established geoscience departments (including libraries and museums) are encouraged to apply, with help from the GeoPRISMS Office to coordinate. The GeoPRISMS Office will cover airfare for speakers' travel and will coordinate travel and off-site logistics. Host institutions are responsible for the speaker's local expenses (i.e. hotel and meals) for the duration of the visit.

GeoPRISMS Office, University of Michigan 2534 C.C. Little Building | 1100 North University, Ann Arbor, MI, 48109-1005 May 2016, Academic Year 2016-2017 The Distinguished Lectureship Program is funded by the National Science Foundation