

Dr. Jonathan Greenberg and the Global Environmental Analysis and Remote Sensing (GEARS) Laboratory are now inviting applications for Doctoral or Master's work that will start in Fall 2015 for students interested in the following topics:

Landscape Level Plant-Climate Interactions: Students should be interested in applying remote sensing, GIS, and modeling to the following questions at local to global scales:

- How do plants respond to their climate at multiple scales?
- What will be the future state of vegetated ecosystems under climate change?
- How do non-climate factors impact the distribution of plants?

Students interested in this topic are encouraged to apply to either the Department of Geography and GIScience <<http://www.geog.illinois.edu/grad/>> and/or the Program in Ecology, Evolution and Conservation Biology (PEEC) <<http://sib.illinois.edu/peec/>>. A degree or background in biogeography, environmental science, ecology, and/or biology is encouraged for applicants, as well as previous experience in remote sensing and GIS.

Remote Sensing Science : Students should be interested in developing advanced remote sensing algorithms, particularly those that leverage high performance computing and machine learning algorithms, as well as unmanned aerial vehicles (UAVs). GEARS is interested in the following general topics:

- Computer vision techniques applied to high spatial resolution remote sensing imagery
- The development of UAV-based technologies as it relates to the remote sensing of vegetation
- Advanced techniques in hyperspectral, hyperspatial, multitemporal, thermal, and Lidar data processing

Students interested in this topic are encouraged to apply to the Department of Geography and GIScience <<http://www.geog.illinois.edu/grad/>>. Previous programming experience and a background in remote sensing and GIS is highly recommended.

Prospective graduate students will be expected to develop their own research goals, and should have curiosity, motivation, and independence. Prospective students are encouraged to review the research topics on the lab website (<http://www.geog.illinois.edu/~jgrn/>), and email a short summary of their research interests as well as a CV to Dr. Greenberg jgrn@illinois.edu before applying to the program. Funding will be available from a variety of sources, including fellowships, research assistantships, and teaching assistantships.