

**Department of Biological Sciences  
COLLEGE OF ARTS AND SCIENCES**

**SUMMER RESEARCH OPPORTUNITIES  
FOR UNDERGRADUATE WOMEN**

**APPLICATION DEADLINE: March 1, 2014**

*The Department of Biological Sciences is pleased to offer the following research project for the summer of 2014. Interested students are urged to contact the faculty member(s) directing the project that most interests them. By contacting the faculty member, you can discover more about the project, learn what your responsibilities will be and, if possible, develop a timetable for the twelve-week research period.*

**PROJECT TITLE:**

**Optimizing Restoration-Rescue Practices for Populations of Endangered Plant Species**

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**Project Description**

**Stephan Pelikan (Mathematical Sciences) and Steven Rogstad (Biological Sciences) are engaged in computer modeling research aimed at optimizing restoration-rescue efforts for endangered plant species. Potential projects include: 1) Exploring how different patterns of founding of restoration populations of the endangered American chestnut affect population growth and the preservation of genetic diversity; and 2. Computer modeling of how different seed bank and/or offspring immigration characteristics affect population stability and genetic diversity in rare plants. This is an opportunity to add to your basic knowledge of population genetics theory and plant population biology, and to develop computer programming and statistical analysis skills.**