SUMMER RESEARCH OPPORTUNITIES FOR UNDERGRADUATE WOMEN

APPLICATION DEADLINE: March 1, 2016

The Department of Anthropology is pleased to offer the following research project for the summer of 2016. 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: Quantitative variation in human pigmentary traits and associated genetic loci

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Project Description
Pigmentation of the skin, hair, and eyes shows remarkable levels of variation across the human species. The characterization of the genetic loci that underlie variation in these externally visible characteristics (EVCs) will contribute to advancements in the fields of anthropology, forensic science, and evolutionary biology. The Norton lab is engaged in a multi-year project with two primary goals: 1) to quantitatively assess skin, hair, and iris pigmentation in individuals of diverse backgrounds, with an emphasis on under-studied populations (including African Americans and Hispanics); 2) to use DNA samples collected from these individuals and high-density SNP microarrays to identify genetic variants that explain quantitative differences in skin, hair, and iris pigmentation. The WISE student working on this project could explore various aspects of this research, with the primary focus being on either the collection and analyses of phenotypic data or on the testing of associations between pigmentation phenotype and genotype in a particular population.