

**Genetics and Demography of Small Populations
FW 586**

Credit hours: 3

Term offered: Fall, alternate years, 08, 10.

Instructor: Susan Haig

Course objectives: To understand genetic and demographic factors that lead to species endangerment or extinction; and to become comfortable with population viability analyses, pedigree analyses, and other models used to assess species' status and recovery objectives.

Course content: The instructor will introduce topics via lecture. Presentations of labs, case studies, and debates will follow. A major emphasis will be placed on student participation in all discussions.

Prerequisites: Ecology, genetics.

Text: None

Term papers: None

Testing: Grades will be based on the following criteria (100 pts. total).

46 pts. You will be responsible for preparation and presentation of one side of *two* debates related to a lecture topic. This presentation will be prepared in collaboration with a team of classmates and debated against another team of classmates. We will discuss the format during the organizational meeting

50 pts. Computer projects: you will be asked to complete two computer analyses related to evaluating genetic and demographic factors in small populations (25 pts. each). There will be homework sheets and essays associated with these labs that need to be turned in the week after the lab is run. Details will follow prior to each lab.

Students for whom the course is intended: Graduate students in wildlife, forestry, or other related disciplines.