GEOG 60A: GEOGRAPHY FIELD STUDIES: PHYSICAL SYSTEMS

Foothill College Course Outline of Record

Heading	Value
Effective Term:	Fall 2026
Units:	1.5
Hours:	1 lecture, 1.5 laboratory per week (30 total per quarter) This course does not meet a full 12 weeks.
Advisory:	GEOG 1 and GEOG 2.
Degree & Credit Status:	Degree-Applicable Credit Course
Foothill GE:	Non-GE
Transferable:	CSU
Grade Type:	Letter Grade (Request for Pass/No Pass)
Repeatability:	Not Repeatable

Student Learning Outcomes

- Apply the major concepts of human and physical geography to study areas identifying patterns and processes
- Discuss human-environment relationships occurring at study areas
- Use tools of geography, including maps, graphs and/or Geographic Information Systems (GIS) to describe spatial patterns, to analyze and interpret data, and draw valid conclusions
- Synthesize collected data, interpret results, and communicate conclusions to a broad audience

Description

Explore the physical processes shaping regional environments, including climate patterns, geomorphology, and coastal dynamics. This course emphasizes how landforms, weather systems, and coastlines interact, while also examining how humans impact and adapt to these changing physical landscapes. Field studies involve using the tools and perspective of geography to observe, measure, and evaluate the landscape. This includes the ability to describe and interpret spatial patterns, the ability to collect and analyze spatial and non-spatial data, and the ability to draw valid conclusions as to the processes responsible for those patterns. This course will have elements of both human and physical geography and a focus on human-environment relations.

Course Objectives

The student will be able to:

1. Read topographic, thematic, and reference maps of the region
2. Use GPS and GIS technology for navigation and data collection
3. Identify physical geographic landscapes
4. Collect and document physical field data
5. Relate observations to physical processes

Course Content

1. Basic concepts and terms required for geographic studies
   a. Pattern and process, including spatial and temporal perspectives
      i. Describe the field of geography
      ii. Diffusion, distance, spatial interaction, and accessibility
      iii. Scale, boundaries, and borders
      iv. Interdependence and systems theory related to humans and the environment
      v. Quantitative and qualitative methodologies
   b. Spatial analysis related to reading and interpreting maps and graphs
      i. Identify locations using the geographic grid
      ii. Identify physical and cultural features using map symbols
      iii. Identify landforms using contour lines on a topographic quadrangle
      iv. Plot locations using GPS
      v. Use Geographic Information Systems (GIS) for mapping and basic spatial analysis
2. Basics of field methods, surveying, and data collection
   a. Collect and calculate weather or climate data, such as temperature, humidity, and/or wind
   b. Collect physical field samples, such as soil, rock, and/or mineral, to identify landforms and relate them to physical processes
   c. Collect and analyze water quality data, such as pH, temperature, or turbidity
   d. Use compass readings or bearings to document the location and direction of sampling sites
3. Analyze data and storytelling related to human-environment phenomena
   a. Conduct research on a topic related to humans and their environment
   b. Use of library and internet resources
   c. Use of ArcGIS, QGIS, Excel, and/or other data analysis tools
   d. Development and implementation of project design
   e. Synthesis and presentation of information for public or classroom display
   f. Peer critiques of research presentations

Lab Content

Students will perform data collection, such as surveying and field methods, using geographic techniques. Students will analyze their data and create a small project on their chosen topic related to course content. Lab field trips will focus on physical systems.

Special Facilities and/or Equipment

Students need internet access to access the course's Learning Management System and computers to use data analysis software, such as GIS or Excel.

Method(s) of Evaluation

Methods of Evaluation may include but are not limited to the following:

Completion of fieldwork
Field records or journals

Projects or reports

Method(s) of Instruction

Methods of Instruction may include but are not limited to the following:

Lecture
Discussion
Field work
Oral presentations
Demonstrations
Field trips

Representative Text(s) and Other Materials

Selby, William. Rediscovering The Golden State. 2018.

Although this text is older than five years, it remains relevant to the field, as it covers both the physical and human geography of California and connects the two. No equivalent text is available for California.

Types and/or Examples of Required Reading, Writing, and Outside of Class Assignments

1. Students will keep a field journal and engage in data collection and analysis.
2. Students will be required to complete background reading assignments related to laboratory topics.
3. Students will create a short presentation on a geographic topic of their choice and share their research with the class.

Discipline(s)

Geography