GEO 105 - PHYSICAL GEOGRAPHY

Course Description

Physical geography studies selected elements of the physical environment: weather and climate, landforms, soil and vegetation. Particular emphasis is placed upon the nature and distribution of physical features throughout Michigan with respect to humankind. The lab includes field trips and emphasizes the application of physical principles through hands-on study of minerals, rocks, and soils; in conjunction with map and aerial photo interpretation. Group 1 course.

Credit Hours

3

Contact Hours

3

Lecture Hours

3

Corequisites

GEO 105L

Recommended Prerequisites or Skills Competencies

MTH 23, students scoring below ENG 111 on the placement test should plan on additional study time.

General Education Outcomes supported by this course

Quantitative Reasoning

Course Learning Outcomes

Knowledge:

- Identify numerous physical processes responsible for the varied environments found on our planet through a spatial science perspective.
- Describe how atmospheric components influence weather and climate.
- Describe how endogenic and exogenic processes create various landforms.

Application:

- Use spatial data to construct a basic map, and interpret information from United States Geological Survey topographic maps.
- Identify the impact human activity has on the natural environment.
- Interpret information from aerial photography/satellite images.
- Use field methods to identify various landforms and sediment types.
- Calculate solar energy received and atmospheric moistures content.

Integration:

- Apply scientific observation skills in real-life applications.
- Judge how landforms and sediments influence property development potential.

Human Dimension:

- Make education decisions regarding their personal use, or misuse, of our planets resources.
- Evaluate the environmental impacts, both benefits and costs, associated with resource extraction and use.

Caring - Civic Learning:

- Appreciate the physical environment acknowledging how the earths major systems work together to sustain life on this planet.

Learning How to Learn:

- Learn to describe natural events such as earthquakes, volcanic eruptions, tsunami, ect., covered in media, scientific journals and articles.
- Apply scientific literacy skills in everyday life.