



Course Name: SCI-118 General Astronomy

Date Updated: 4/2022

Credit Hours/week: Lec 3, Lab 1 hrs./wk. – 4 cr.

BEGINNING: SPRING 2022

Catalog Description: This course is a scientific exploration of the human place in the universe. Studied are the origin and history of the Universe and the formation of the Earth and solar system. The Earth's properties are compared with those of the other planets. Also covered are exciting contemporary topics such as global warming, black holes and dark matter. Although largely descriptive, the course occasionally requires the use of algebra and geometry-level mathematics.

Prerequisite: MAT-016 or MAT-120 or equivalent

Text: ASTR03, Backman and Seeds

General Astronomy Lab Manual 3rd Edition — Staver

Supplementary Material: Laboratory facilities equipped with computers.

Syllabus:

Topics
The Astronomer's Sky
The Solar System
The Stars
The Universe of Galaxies and Life

Students are expected to adhere to the policies of the County College of Morris. These can be accessed at: (insert link here)

Statement of Expected Course LEARNING OUTCOMES

- Name and describe the theory that explains the beginnings of our universe and describe the evidence that supports this theory
- Analyze experimental data and derive conclusions based on the experiment
- List the units that are commonly used in the "mks" and "fps" measurement systems
- Name the unit of measurement that is commonly used when describing the distance between celestial objects and use this unit of measurement in cataloging major visible celestial objects
- Name the planets that are in our solar system and compare and contrast their physical features
- Differentiate between planets, comets, meteors and moons and provide specific examples in our solar system
- List the major categories of star types and provide the characteristics of each
- Describe the scientific method

Statement of Relation to Curriculum(s):

- Not a required course in any particular curriculum, but serves as a general education laboratory science course.