

CUMBERLAND COUNTY COLLEGE

Course: PI 106 Principles of Science I

Credits: 3

Prerequisites: EN 060 and MA 091

Description:

Introduces the nonscience major to selected topics in geology, astronomy, physics, and chemistry. Among the topics discussed will be atoms, molecules, chemical change, the solar system, the planet earth, igneous rocks, sedimentary rocks and metamorphic rocks.

Learning Outcomes:

Upon successful completion of this course, students will be able to:

- Apply the laws of motion to simple real life problems
- Distinguish compounds and mixtures
- Recognize planets and distinguish them from stars
- Discuss the Earth's structure and its formation
- Describe a chemical reaction and its distinction from a nuclear reaction
- Identify the geological processes sculpturing the Earth

Topical Outline:

The topics discussed in this course includes but not limited to the following:

- Motion, and laws of motion
- Energy, momentum, and conservation laws
- Atoms and molecules
- Chemical compounds, mixtures, and alloys
- Earth and the moon
- Inner and Outer Planets
- Asteroids, Meteors, Comets
- Birth and Death of stars
- Structure of the Earth
- Plate tectonics
- The Dynamic Earth

Text:

Conceptual Physical Science, Third Edition by Hewitt, Suchocki, and Hewitt. Pearson

Student Assessment:

Assessment is based on Mid-semester examinations, Final examination and weekly homework assignments as follows:

Three exams .....	60%
Final Exam .....	30%
Homework .....	10%

Academic Integrity:

Plagiarism is cheating. Plagiarism is presenting in written work, in public speaking, and in oral reports the ideas or exact words of someone else without proper documentation.

Whether the act of plagiarism is deliberate or accidental [ignorance of the proper rules for handling material is no excuse], plagiarism is, indeed, a “criminal” offense.

As such, a plagiarized paper or report automatically receives a grade of **ZERO** and the student may receive a grade of **F** for the semester at the discretion of the instructor.

Tutoring & Project Assist:

If you are having difficulty with work in this class tutoring is available through the Center for Academic & Student Success. If you think that you might have a learning disability, contact Project Assist at 856.691.8600 x 1282 for information on assistance that can be provided to eligible students.

**Before Withdrawing From This Course:**

If a student experiences adverse circumstances while enrolled in this course and considers withdrawing, s/he should see an advisor (division or advisement center) BEFORE withdrawing from the class. A withdrawal may cause harmful repercussions to completion rate standards and overall GPA, which can limit or eliminate future financial aid in addition to causing academic suspension.