

Master Syllabus

BIO 2222 - Evolution

Division: Science, Mathematics and Engineering

Department: Biology

Credit Hour Total: 3.0

Lecture Hrs: 3.0

Date Revised: July 2014

Course Description:

Emphasis on Charles Darwin, speciation, fossils, radiometric dating, natural selection, mutations, macroevolution, mass extinctions, coevolution, sexual reproduction, human evolution and religious issues.

General Education Outcomes:

- ▣ Oral Communication Competency
- ▣ Written Communication Competency
- ▣ Critical Thinking/Problem Solving Competency
- ▣ Computer Literacy Competency
- ▣ Information Literacy Competency

Course Outcomes:

Descent with Modification

Recognize that all organisms including humans have descended with modifications from ancestors through an unbroken chain of reproductive continuity extending back four billion years.

Assessment Method: Locally developed exams

Performance Criteria: Accumulate a minimum total of 60% of all available points in the course for quizzes and tests.

Humans as Responsible Stewards of the Earth

Discuss the role of humans in the sustainability of the Earth's resources.

Assessment Method: Locally developed exams

Performance Criteria: Accumulate a minimum total of 60% of the available points in the course for quizzes and tests.

Natural Selection

Explain how Charles Darwin's theory of natural selection has played a pivotal role in the evolution of life.

Assessment Method: Locally developed exams

Performance Criteria: Accumulate a minimum total of 60% of the available points in the course for quizzes and tests.

Outline:

Charles Darwin Speciation Fossils Radiometric dating Natural selection Mutations Macroevolution Mass extinctions Coevolution Sexual reproduction Human evolution Religious issues