

ANTH 212L: INTRODUCTION TO PHYSICAL ANTHROPOLOGY LAB

Citrus College Course Outline of Record

Heading	Value
Effective Term:	Fall 2022
Credits:	1
Total Contact Hours:	54
Lab Hours:	54
Hours Arranged:	0
Corequisite:	ANTH 212.
Strongly Recommended:	ENGL 101.
District General Education:	B3. Natural Sciences - Laboratory
Transferable to CSU:	Yes
Transferable to UC:	Yes - Approved
Grading Method:	Standard Letter, Pass/No Pass

Catalog Course Description

This course is the lab component for Introduction to Physical Anthropology 212. In the lab, students will have an expanded opportunity to work with anatomy, skeletal identification, taxonomy, and evolutionary trends through interactive lessons. Concurrent enrollment with ANTH 212 is required. College level reading is highly recommended for success in the course. 54 lab hours.

Course Objectives

- Demonstrate the application of scientific methods.
- Identify the outcomes of evolutionary processes.
- Compare and contrast the morphology of primates and early hominins applying physical anthropological terminology.
- Describe the function and structure of DNA and RNA.
- Demonstrate how human traits are inherited.
- Describe the biological and behavioral adaptations of the genus Homo.
- Identify the features of anatomically modern humans.

Major Course Content

1. Introduction to Physical Anthropology
 - a. Scientific method
 - b. Anthropological perspective
2. Evolution
 - a. History/development of biological evolutionary thought
 - b. Forces of evolution
 - c. Theories of evolution – Natural Selection, Lamarck, etc.
 - d. Taxonomy
 - e. Geology important to mammal, primate, and prehuman evolution

- a. Mendelian/molecular/population genetics
 - b. DNA/RNA inheritance
 - c. Cell structure
 - d. Meiosis/meiosos
 - e. Scientific revolution
 - f. Principles of evolution
4. Dating Methods
 - a. Relative types and techniques
 - b. Absolute types and techniques
 5. Primates
 - a. Living primates
 - b. Body size, diet, locomotion
 - c. Primate evolution
 - d. Fossil record
 - e. Bipedalism
 6. Human Evolution
 - a. Pre australopithecine hominids
 - b. Australopithecines
 - c. Homo habilis
 - d. Homo erectus
 - e. Neanderthals
 - f. Homo sapiens
 - g. The Multiregional hypothesis vs. Replacement hypothesis vs. Partial replacement hypothesis
 - h. Bio-cultural adaptations
 - i. Culture of hominids
 - j. Modern human variation
 - k. Ancestry (race) versus ethnicity

Lab Content

1. Introduction to Physical Anthropology
 - a. Scientific method
 - b. Anthropological perspective
2. Evolution
 - a. History/development of biological evolutionary thought
 - b. Forces of evolution

- c. Theories of evolution – Natural Selection, Lamarck, etc.
 - d. Taxonomy
 - e. Geology important to mammal, primate, and prehuman evolution
3. Basic Human Biology
- a. Mendelian/molecular/population genetics
 - b. DNA/RNA inheritance
 - c. Cell structure
 - d. Meiosis/meiosos
 - e. Scientific revolution
 - f. Principles of evolution
4. Dating Methods
- a. Relative types and techniques
 - b. Absolute types and techniques
5. Primates
- a. Living primates
 - b. Body size, diet, locomotion
 - c. Primate evolution
 - d. Fossil record
 - e. Bipedalism
6. Human Evolution
- a. Pre australopithecine hominids
 - b. Australopithecines
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 - f. Homo sapiens
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Suggested Reading Other Than Required Textbook

The anthropology course requires access to online research materials through databases such as EBSCO host, and the textbooks on reserve and/or available in ebook format for students who cannot afford books in any other form. The students can be supported through electronic

databases specifically to locate peer reviewed, anthropological, scientific journal articles related to human and primate evolution, DNA, inheritance, and other course topics.

Examples of Required Writing Assignments

Self-test answers based on the textbook readings provided in the assigned lab manual. Discussion board posts and responses to other students based on prompts from the instructor on the weekly topic covered in the course.

Examples of Outside Assignments

Reading the lab manual and answering self-test questions based on that reading in preparation for the lab activity to be completed in class. Exploring links to biological anthropology websites to participate in interactive lessons that support and reinforce the course content.

Instruction Type(s)

Lab, Online Education Lab

IGETC Area 4: Social and Behavioral Sciences

4A. Anthropology and Archaeology

IGETC Area 5: Physical and Biological Sciences

5C. Science Laboratory