# Syllabus for **BIO 456—Biomedical Ethics**3.0 Credit Hours Fall 2016

#### I. COURSE DESCRIPTION

A capstone course for junior and senior biology students. Deals with ethical aspects of current biological technologies and issues such as creation-evolution, genetic engineering, biomedical issues, human population control, and environmental ethics, from a Christian perspective. Prerequisite: 16 hours of biology.

#### II. COURSE GOALS

This course is designed to enable science majors to integrate their biological knowledge with their morals, ethics and Christian faith, and subsequently to address rationally contemporary issues in the biological sciences from a Christian perspective.

#### III. STUDENT LEARNING OUTCOMES FOR THIS COURSE

As a result of successfully completing the course, the student will be able to do the following:

- A. Distinguish science, pseudoscience and religion in written papers and oral presentations.
- B. Discuss the strengths and weaknesses of the various models of creation and evolution, and subsequently to develop one's own view of origin based on sound Biblical and scientific information.
- C. Address the current and potential ethical dilemmas presented by recombinant DNA and genetic engineering technology.
- D. Apply a Biblical-based approach to human population and world hunger problems.
- E. Apply Biblical-based principles to human's care, use, and abuse of the environment.
- F. State a personal Christian perspective on ethical challenges in medicine, most notably issues in reproductive and life support technologies.
- G. Write concise and informative essays, clearly expressing one's own views on a bioethical issue.

#### IV. TEXTBOOKS AND OTHER LEARNING RESOURCES

#### A. Textbooks

None. Must have access to ORU library for primary journal articles.

#### V. POLICIES AND PROCEDURES

## A. University Policies and Procedures

- 1. Attendance at each class or laboratory is mandatory at Oral Roberts University. Excessive absences can reduce a student's grade or deny credit for the course.
- 2. Students taking a late exam because of an unauthorized absence are charged a late exam fee.
- 3. Students and faculty at Oral Roberts University must adhere to all laws addressing the ethical use of others' materials, whether it is in the form of print, electronic, video, multimedia, or computer software. Plagiarism and other forms of cheating involve both lying and stealing and are violations of ORU's Honor Code: "I will not cheat or plagiarize; I will do my own academic work and will not inappropriately collaborate with other students on assignments." Plagiarism is usually defined as copying someone else's ideas, words, or sentence structure and submitting them as one's own. Other forms of academic dishonesty include (but are not limited to) the following:
  - a. Submitting another's work as one's own or colluding with someone else and submitting that work as though it were his or hers;
  - b. Failing to meet group assignment or project requirements while claiming to have done so;
  - c. Failing to cite sources used in a paper;
  - d. Creating results for experiments, observations, interviews, or projects that were not done:
  - e. Receiving or giving unauthorized help on assignments.

By submitting an assignment in any form, the student gives permission for the assignment to be checked for plagiarism, either by submitting the work for electronic verification or by other means. Penalties for any of the above infractions may result in disciplinary action including failing the assignment or failing the course or expulsion from the University, as determined by department and University guidelines.

- 4. Final exams cannot be given before their scheduled times. Students need to check the final exam schedule before planning return flights or other events at the end of the semester.
- 5. Students are to be in compliance with University, school, and departmental policies regarding the Whole Person Assessment requirements. Students should consult the Whole Person Assessment handbooks for requirements regarding general education and the students' majors.
  - a. The penalty for not submitting electronically or for incorrectly submitting an artifact is a zero for that assignment.
  - b. By submitting an assignment, the student gives permission for the assignment to be assessed electronically.

#### B. Course Policies and Procedures

- 1. Evaluation Procedures
  - a. Grades are based on **attendance**, **participation**, **team presentation**, **and written critiques** of each week's topic. There is one final comprehensive essay exam. Students are expected to be present each class period and participate in the discussion by asking thought-provoking questions and comments. Student teams will present informative, thought-provoking presentations on various bioethical topics. Each week students are required to write a critique or evaluate a

problem-solver based on the assigned readings and presentation for those topics that he or she is **NOT** involved in a team presentation. Each student is required to complete a total of 10 critiques or problem solvers. These written reports are due each class period following the prior week's discussion. **Late reports will be penalized 10% for each day late** 

b. The grade in this course is based upon the following criteria:

2 major papers 200
1 presentation 100
Participation 100
Bioethics roundtable 50
Online discussions 50

\*Note: Missing class will also lower a student's grade on their participation and critique. **Also, every 2 tardies is equal to 1 absence**.

c. Final Course Grading Scale:

A>90%; B = 80-89%; C = 70-79%; D = 60-69% ~ F < 59%

- 2. Whole Person Assessment Requirements
  A critique will be used to satisfy outcome 4 for the departmental Whole Person
  Assessment.
- 3. Class Format
  - a. The course is a discussion seminar format in which students and faculty present, discuss, and debate different positions of an issue. Class meets for one 2-hour period per week. The class will be divided into small teams (2-3 students) and assigned to research at least three different topics that will be presented to the class. Teams representing differing viewpoints of an issue will present a topic each class period.
  - b. Each team is expected to thoroughly research their topic and lead the class during an entire 50-minute period. The team must provide a reading assignment for the class one week prior to their presentation. Each class member is expected to read this article and be ready to discuss it. On the day of their presentation the team must provide an outline with pertinent references. Each presentation should creatively communicate their topic. Possible formats could be debate, dramatic skit, hypothetical scenario, PTA meeting, senate hearing or court session. The team not only presents information, but also is responsible for stimulating class discussion. The rest of the class and faculty are encouraged to ask questions. Faculty presentations are presented during the first three weeks of class and at the beginning of certain topics to clarify issues and various viewpoints.

# VI. COURSE CALENDAR

(May be modified based on time and student interest.)

Week	Topic and Subtopics
1	Orientation and Approaches to Bioethics
2	Introduction to Dilemmas in Clinical Ethics: Case Studies/Physician- Patient Relationship
3	A Moral Framework for End of Life Decision-Making
4	Euthanasia/Physician Assisted Suicide
5	Introduction to Research Ethics, International Research Ethics
6	Issues in Organ Donation, Transplantation, and Defining "Death"
7	Reproductive Ethics and Eugenics
8	Reproductive Ethics Introduction to Stem Cell Research
9	Issues in Cloning and Stem Cell Research
10	Public Health Ethics, Allocation of Resources, and Health Disparities
11	Issues in Genetic Screening/Testing
12	Pre-natal and Neo-natal ethics issues
13	Man's Stewardship of Environment
14	Environmental Ethics: Climate Change Debate
15	Environmental Ethics: Sustainable Development, Natural Resource Issues

# **Course Inventory for ORU's Student Learning Outcomes**

## Biomedical Ethics – BIO 456 Fall 2016

This course contributes to the ORU student learning outcomes as indicated below:

**Significant Contribution** – Addresses the outcome directly and includes targeted assessment.

**Moderate Contribution** – Addresses the outcome directly or indirectly and includes some assessment.

Minimal Contribution – Addresses the outcome indirectly and includes little or no assessment.

**No Contribution** – Does not address the outcome.

The Student Learning Glossary at <a href="http://ir.oru.edu/doc/glossary.pdf">http://ir.oru.edu/doc/glossary.pdf</a> defines each outcome and each of the proficiencies/capacities.

OUTCOMES & Proficiencies/Capacities		Significant	Moderate	Minimal	No	
		Contribution	Contribution	Contribution	Contribution	
1	Outcome #1 – Spiritually Alive					
	Proficiencies/Capacities					
1A	Biblical knowledge		X			
1B	Sensitivity to the Holy Spirit		X			
1C	Evangelistic capability		X			
1D	Ethical behavior	X				
2	Outcome #2 – Intellectually Alert	_				
	Proficiencies/Capacities					
2A	Critical thinking	X				
2B	Information literacy	X				
2C	Global & historical perspectives	X				
2D	Aesthetic appreciation				X	
2E	Intellectual creativity	X				
		•				
3	Outcome #3 – Physically Disciplined Proficiencies/Capacities					
3A	Healthy lifestyle				X	
3B	Physically disciplined lifestyle				X	
		•		•	•	
4	Outcome #4 – Socially Adept Proficiencies/Capacities					
4A	Communication skills	X				
4B	Interpersonal skills	X				
4C	Appreciation of cultural & linguistic differences		X			
4D	Responsible citizenship	X				
4E	Leadership capacity	X				
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