

BIOL 4900

Credit Hours 0-3-1

SENIOR SEMINAR

Department of Biology

Instructor: Dr. Timothy J. Fort

Phone: 229-249-2643

Office Hours: Tuesday 3.00pm-5.00pm or by scheduled appointment

Office: BC 1100

Email: tjfort@valdosta.edu

Senior Seminar: Thursday 1.30pm 3.20pm BC 1202

Science Seminar Series: Thursday 4.00pm 4.50pm TBA

Course Description BIOL 4900:

The capstone course in biology. Students are required to attend outside lectures chosen by the instructor. This course assesses students' ability to research independently topics in biology, assimilate the information, and disseminate the information in an organized and understandable fashion in both written and oral forms. Besides demonstrating comprehension of their topic and competence in communication skills, students take the ETS Major Field test in biology and complete the departmental Senior Exit Questionnaire for successful completion of the course.

Pre- or Co-requisites:

Completion of all required courses in the senior curriculum for the biology major. Grade: Satisfactory (S) or Unsatisfactory (U).

Educational Outcomes:

This course supports the Department of Biology Educational Outcome #1 and the Valdosta State University General Educational Outcomes #4 and #7.

Specific Course Requirements:

- 1) **Research paper.**
- 2) **Oral presentation.**
- 3) **Successful completion of ETS Major Field test in Biology (140 or higher).**
- 4) **Attendance of all scheduled class meetings.**
- 5) **Attendance and evaluation of at least eight science seminars.**
- 6) **Completion of Biology Exam and Senior Exit Questionnaire.**

Major Field Test:

The ETS Major Field test is a comprehensive, standardized test designed to evaluate knowledge in the sub-disciplines of Biology. Successful completion of the ETS Major Field test is a course requirement. Students who fail to complete the ETS Major Field test will receive a grade of unsatisfactory (U) for the course. Each student is responsible for contacting the VSU Testing office (Powell Hall-East, first floor, room 1131, telephone 229-245-3878) to arrange a time to take the ETS Major Field Test in Biology. A fee is assessed to take the Major Field Test. The Biology Department will pay the fee for each student to take the test once. Students who fail to score at least 140 on the test must re-take it until a score of 140 is achieved. Th(tude1 0 3(-30

to all students at the beginnin

Outline of Research Paper:

You are required to submit a detailed outline of your paper by 7th February 2013. Your outline should include a potential title for your paper and a detailed outline of the general sections and subsections within the paper with detailed notes. A correctly formatted reference section should be included. Copies of abstracts from all primary research articles included in the reference section should also be included.

Research Paper:

You are required to write a paper on your selected topic. The paper must be submitted to the instructor in two formats (paper hardcopy and electronic) by 14th March. Copies of all cited primary research articles and signed plagiarism policy must be submitted to the instructor in an organized manner as an attachment to the hardcopy and emailed to the instructor via email as an attachment.

Failure to do so will result in an unsatisfactory grade for the course.

Overall Format of Research Paper:

1) Title Page:

Title of the paper
Student name
Course title
Instructor name
Submission date.

2) Abstract:

Abstracts should be on a separate page and be a maximum of 300 words in length.

3) Main body of the research paper consisting of:

i) Introduction: An opening to the paper that provides the reader with a general introduction to the research topic.

ii) Discussion: A detailed discussion of specific scientific studies on the selected topic with references cited where appropriate. Subheadings for different sections within the discussion should be used as appropriate.

iii) Conclusion: A summary of the information in the paper.

4) Literature cited

The literature cited must contain at least 10 primary research articles. Students may also cite no more than 3 review articles and no more than 2 textbooks. No web based references will be accepted unless they are from an online peer reviewed journal. All references included must be cited at least once in the body of the paper using the proper format. For this course we will adhere to the format specified in the instructions to authors for the Journal of Neurophysiology published by the American physiological society.

(www.the-aps.org/publications/authorinfo/elements).

5) Figures:

All included figures must be numbered and have an accompanying legend.

6) Appendix 1:

Include complete copies of all primary research articles cited.

7) Appendix 2:

Include a signed copy of the Department of Biology Plagiarism Policy

Specific Formatting of research paper

Course Theme: The Neural Basis of Behavior