Syllabus for

EHI 487 Research in Ecosystems and Human Impact

Time, frequency and location is flexible and is decided between faculty mentor and student

Instructor: Varies depending on the specific area of research
Office: Depends on faculty mentor
Phone: Depends on faculty mentor
Email: Depends on faculty mentor
Office Hours: Not applicable
Blackboard: blackboard.stonybrook.edu

Course Description: Qualified advanced undergraduates may carry out individual research projects under the direct supervision of a faculty member. May be repeated.

Prerequisites: Permission of instructor

1-6 credits, S/U grading

Additional Course Information: As Einstein once said: “If we knew what it was we were doing, it would not be called research, would it?” As such, this course must be very flexible and is essentially student experiential learning via exploration of a chosen topic, with the support and guidance of a mentor familiar with the subject. Regardless of topic, this beyond-the-classroom experience contains some common elements – a question with some guiding hypotheses/ideas, a planned approach to gathering data, analysis and interpretation with summary/conclusions, and written and oral communication.

Learning Objectives:

- Learn how to conceive of and write a well-stated research question to pursue.
- Demonstrate the necessary literature searching and information gathering skills to inform and evolve your question into specific testable hypotheses.
- Know how to devise an appropriate experimental design to test your hypotheses.
- Acquire a knowledge of the appropriate methods needed to test your hypotheses.
- Learn how to write a research proposal that includes some literature review, your question and hypotheses, your proposed experimental design and methods, and an estimated time line.
- Experience the planning, execution, and data management of doing research.
- Be able to conduct appropriate graphical and statistical analyses of your data.
- Learn how to write a manuscript of your work in the standard scientific style.
- Be able to communicate your results both orally as a PowerPoint presentation and as a poster.

Required Text:
None, appropriate topic and method-specific readings will be provided to the student by the mentor as needed.
Course Requirements:

Commitment: On average, students need to commit to about four hours per credit hour per week. However, students also need to be flexible since the nature of research may require considerably more time some weeks, and less so in other weeks.

Proposal: An approximately five-page proposal (excluding references) that describes the topic and appropriate background, states the overall question and hypotheses, proposed experimental design and methods, supplies and equipment needed, and approximate timeline.

Written Final Report: This provides a comprehensive reporting of what you did and found. It will follow the standard scientific manuscript format: Introduction, Materials and Methods (with embedded graphs and tables), Results, Discussion, Literature Cited, and Appendices.

Oral Presentation: The student will give a PowerPoint presentation in the format of scientific meeting (approximately 10 minutes in length with follow up Q&A).

Poster Presentation: The student will prepare a poster of their project and results in the format of what is required at scientific meetings.

Grading:
Proposal, written final report, oral and poster presentations will be weighted equally toward overall assessment of grade.

Basis for grading:

S = adequate completion of all the course requirements.
U = insufficient or missing course requirements.

Tentative Meeting Schedule:
As needed - flexible and variable depending on the stage the research is in, but generally weekly.

Blackboard: You can access class information, documents, and assignments on-line at:
http://blackboard.stonybrook.edu If you used Blackboard during the previous semester, your login information (NetID and Password) has not changed. If you have never used Stony Brook's Blackboard system: for help or more information see:
http://it.stonybrook.edu/services/blackboard For problems logging in, go to the helpdesk in the Main Library SINC Site or the Union SINC Site, you can also call: 631-632-9602 or e-mail: helpme@ic.sunysb.edu

Student’s Responsibility: Students are required to use their Stony Brook University e-mail for all official communications. Ensure you have entered a working email account in your Black Board account. Access your BB account and make sure that you have access to this class, send yourself a test email using the email option within BB. Adhere to deadlines for term paper and other assignments. Adhere to the formatting instructions for the term paper. Seek help from instructor when problems arise. Should you have a disability, follow the regulations
spelled out below so that it can be evaluated as soon as possible.

**Cell Phone and Electronic Devices:** Use of cell phones, blackberries, laptop computers, iPods, MP3 players, and other audio and telecommunications devices is strictly prohibited during class. The only exceptions are through permission granted by the instructor for special purposes. Clickers are excluded from this prohibition, if required for the class. During regular class sessions, cell phones must be either in ‘vibrate mode’ or turned off. Calls cannot be answered. Text messaging is not allowed during class. Cell phones must be turned off and enclosed in a case, book bag, briefcase, or the like during tests and exams. YOU are responsible for ensuring this policy is followed. Students MAY NOT have cell phones, electronic dictionaries, calculators, pagers or other “information rich” devices (anything that can receive and/or store many pages of text) in their possession during tests and exams.

**Academic Dishonesty Policy:** Academic dishonesty is a serious offense and a breach of academic integrity that may result in failure of the course or failure for the individual paper or assignment. The “Code of Student Conduct” states that all forms of academic dishonesty, including the following are prohibited (see student handbook):

- Plagiarism – the intentional use of ideas or words of another as one’s own paper or other academic assignments. If you are unsure of what constitutes Plagiarism visit this document [http://www.wpacouncil.org/positions/WPAPlagiarism.pdf](http://www.wpacouncil.org/positions/WPAPlagiarism.pdf) or ask the instructor.

- Cheating during examinations, whether by copying from a fellow student or by using information in the form of unauthorized aids brought to the examination.

- The submission of work for any assignment that has been prepared by another student.

**Academic Integrity Statement:**
Each student must pursue his or her academic goals honestly and be personally accountable for all submitted work. Representing another person's work as your own is always wrong. Faculty are required to report any suspected instances of academic dishonesty to the Academic Judiciary. Faculty in the Health Sciences Center (School of Health Technology & Management, Nursing, Social Welfare, Dental Medicine) and School of Medicine are required to follow their school-specific procedures. For more comprehensive information on academic integrity, including categories of academic dishonesty, please refer to the academic judiciary website at [http://www.stonybrook.edu/commcms/academic_integrity/index.html](http://www.stonybrook.edu/commcms/academic_integrity/index.html)

**Classroom Policy:** Students are expected to follow the Stony Brook Code of Conduct while in the classroom. If you are not familiar with the Code you can find it at: [http://studentaffairs.stonybrook.edu/sites/handbook/Code_1-22-03.pdf](http://studentaffairs.stonybrook.edu/sites/handbook/Code_1-22-03.pdf)

Behavior that is disruptive to the function of the class, other students, or the instructor will not be tolerated. Poor class behavior or violations to the Code of Conduct will lead to removal from the class, possible withdrawal, or suspension. Food is not permitted in class. Beverages are OK, but please bring a container the can be closed to reduce spills. If a spill occurs please clean it up immediately.
**Instructional Responsibilities:** The University's statement of *Minimal Instructional Responsibilities* and *Minimal Undergraduate Student Responsibilities* are protocols with which you may already be familiar. They were established by the University Senate in 1996. If you have not already done so, please review them carefully. Both statements may be found beginning on page 81 of the *Academic Policies and Regulations* section of the on-line *Undergraduate Bulletin:* http://www.stonybrook.edu/ugrdbulletin/current/index.shtml

**DISABILITY SUPPORT SERVICES (DSS) STATEMENT**

If you have a physical, psychological, medical or learning disability that may impact your coursework, please contact Disability Support Services, ECC (Educational Communications Center) Building, room128, (631) 632-6748. They will determine with you what accommodations, if any, are necessary and appropriate. All information and documentation is confidential.

Students who require assistance during emergency evacuation are encouraged to discuss their needs with their professors and Disability Support Services. For procedures and information go to the following website: [http://www.stonybrook.edu/ehs/fire/disabilities](http://www.stonybrook.edu/ehs/fire/disabilities]

**CRITICAL INCIDENT MANAGEMENT:**

Stony Brook University expects students to respect the rights, privileges, and property of other people. Faculty are required to report to the Office of Judicial Affairs any disruptive behavior that interrupts their ability to teach, compromises the safety of the learning environment, or inhibits students' ability to learn.

**Course Content:**

Course material accessed from Blackboard, SB Connect, SB Capture or a Stony Brook Course website is for the exclusive use of students who are currently enrolled in the course. Content from these systems cannot be reused or distributed without written permission of the instructor and/or the copyright holder.

Duplication of materials protected by copyright, without permission of the copyright holder is a violation of the Federal copyright law, as well as a violation of Stony Brook's Academic Integrity and Student Conduct Codes [http://www.stonybrook.edu/uaa/academicjudiciary/policies.shtml](http://www.stonybrook.edu/uaa/academicjudiciary/policies.shtml)

**Electronic Communication Statement**

Email and especially email sent via Blackboard ([http://blackboard.stonybrook.edu](http://blackboard.stonybrook.edu)) is one of the ways the faculty officially communicates with you for this course. It is your responsibility to make sure that you read your email in your official University email account. For most students that is Google Apps for Education ([http://www.stonybrook.edu/mycloud](http://www.stonybrook.edu/mycloud)), but you may verify your official Electronic Post Office (EPO) address at [http://it.stonybrook.edu/help/kb/checking-or-changing-your-mail-forwarding-address-in-the-epo](http://it.stonybrook.edu/help/kb/checking-or-changing-your-mail-forwarding-address-in-the-epo).
If you choose to forward your official University email to another off-campus account, faculty are not responsible for any undeliverable messages to your alternative personal accounts. You can set up Google Mail forwarding using these DoIT-provided instructions found at http://it.stonybrook.edu/help/kb/setting-up-mail-forwarding-in-google-mail.

If you need technical assistance, please contact Client Support at (631) 632-9800 or supportteam@stonybrook.edu.