

## Special topics in Ecology: Arctic expedition exploration PCB 4932- Spring 2017

### CONTACT INFORMATION

**Instructor:** Dr. Kevin M. Boswell, MS 359, at BBC campus. Phone: (305) 919-4009;

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**Office hours:** Tuesday and Thursday 9:00-12:00PM or by appointment.

**Required Text:** None.

**Credit: 3 credits**

**Course description and learning outcome:** The Northwest Passage Project (NPP) will explore the changing Arctic environment during an innovative expedition that will engage diverse audiences through real time interactions from sea, an ultra-high definition 2-hour documentary, and related community events. Funded by the National Science Foundation, the NPP is a collaborative effort between the University of Rhode Island (URI) Inner Space Center (ISC) and Graduate School of Oceanography (GSO), the film company David Clark, Inc., and several other collaborators, including six U.S. Minority Serving Institutions (MSIs) and the tall ship SSV *Oliver Hazard Perry* (OHP). Two cohorts, each consisting of 18 students (six high school students, nine undergraduate students, and three graduate students), will sail on board the SSV *Oliver Hazard Perry* for 2-2.5 week legs.

This course is designed to provide a broad overview of the scientific and cultural aspects that students will encounter during the voyage. Given that there are only three spots available for FIU students, performance in this class during the semester will also serve as a selection process to determine which three students will sail aboard the OHP. The course will comprise a series of webinar exercises, hosted by the ISC, which will provide the context of the program mission. Activities will be structured around the materials presented in the webinars. Additional laboratory exercises will be required to ensure that students are able to carry out the science mission while onboard the OHP.

The main science component that FIU students will be responsible for will include an acoustic assessment of the biological community in addition to characterizing the forage base for large marine predators, principally marine mammals.

**Topics:** Introduction to acoustics, environmental constraints of sound propagation, principles of sound scattering, sail training, instrument operation and maintenance, calibration and historical and cultural background of the Arctic region.

Students will be graded on participation as well as exercises associated with the webinar and laboratory modules. A final exam is required.

Grade scale: A 90 – 100%; B 80 – 89%; C 70 – 79%; D 60 – 69%; F < 60%

**Participation- 50%**

**Exercises - 30%**

**Exam- 20%**

**Instructor Communication:** All instructor communication and announcements will be done by email. When I send emails to the class to make announcements etc., I will only use your FIU email address. If students do not use their FIU email account, use the easy to set up automatic mail forwarding option to the email account you are using regularly. All email from students should contain “ PCB 4932” in the subject to ensure a prompt response!

**Sexual harassment policy:** FIU is committed to eliminating sexual harassment. In accordance with the FIU Faculty Senate guidelines, this syllabus includes a warning that any misconduct will be reported. FIU’s sexual harassment policy is available at:

<http://www.fiu.edu/~eop/EOPSexH.pdf>

**Honor Code:** FIU is a community dedicated to generating and imparting knowledge through excellent teaching and research, the rigorous and respectful exchange of ideas, and community service. All students should respect the right of others to have an equitable opportunity to learn and honestly to demonstrate the quality of their learning. Therefore, all students are expected to adhere to a standard of academic conduct, which demonstrates respect for themselves, their fellow students, and the educational mission of the University. All students are deemed by the University to understand that if they are found responsible for academic misconduct, they will be subject to the Academic Misconduct procedures and sanctions, as outlined in the Student Handbook.

-Cheating and plagiarism are violations of the academic honesty section of the FIU student code of conduct and will be reported to Judicial Services