



UNIVERSITY of HAWAII®
WINDWARD
COMMUNITY COLLEGE

OCN 201L, Science of the Sea Laboratory

1 credit (CRN 64422)

Thursdays 1:00 – 3:45 pm (Room: Hale ʻImiloa 117)

INSTRUCTOR: Pavica Srsen, MSc.

OFFICE: Hale ʻImiloa 119

OFFICE HOURS (times students may drop in for help): Tue 1:30-3:30 pm and Thr 3:45-4:45 pm
or email me to set an appointment

TELEPHONE: 236-9257

EMAIL: pavica@hawaii.edu

EFFECTIVE DATE: Fall 2018

WINDWARD COMMUNITY COLLEGE MISSION STATEMENT

Windward Community College offers innovative programs in the arts and sciences and opportunities to gain knowledge and understanding of Hawaiʻi and its unique heritage. With a special commitment to support the access and educational needs of Native Hawaiians, we provide the Koʻolau region of Oʻahu and beyond with liberal arts, career and lifelong learning in a supportive and challenging environment — inspiring students to excellence.

CATALOG DESCRIPTION

Experiments, computer exercises and field trips demonstrating the geological, physical, chemical and biological principles, and equipment, of earth and ocean sciences. (3 hours laboratory) DY

Activities Required at Scheduled Times Other Than Class Times:

On occasion, student may be required to complete laboratory exercises as homework. Otherwise academic activities will be constrained to the times at which the course meets, barring perhaps travel time to and from remote sites.

PREREQUISITE: Credit for or registration in OCN 201 or equivalent preparation or consent of instructor.

RECOMMENDED PREPARATION: High school algebra and chemistry; ability to use a computer.

STUDENT LEARNING OUTCOMES

As a result of taking this course, students can expect to attain the following outcomes:

1. Develop a practical understanding of the principals of oceanography.
2. Use the methodology of marine biology and oceanography to define and solve problems independently and collaboratively.
3. Use a wide variety of laboratory and field techniques with accuracy, precision and safety.
4. Accurately interpret biological and oceanographic information.

5. Demonstrate proficient library, mathematical and computer skills in data gathering and analysis.
6. Apply scientific concepts to environmental and societal issues.
7. Apply their learning in an off-campus professional setting.

REQUIREMENTS THIS COURSE SATISFIES:

Partially fulfills Windward Community College's Liberal Arts degree Natural Science requirements as a physical science laboratory course.

COURSE TASKS

READINGS: Before attending class you are expected to have read that week's assigned reading, if applicable. Readings will be posted on Lulima.

PRE-LAB INTRODUCTION: At the beginning of each lab, there will be a 10-15 minute presentation by the instructor introducing that day's lab. The information covered in these presentations will also supplement the OCN 201 class lecture.

ATTENDANCE: Attendance to all lab sessions is mandatory. Missing a lab will result in a 0 score for that week's quiz and lab report. Missing more than 1 lab is grounds for an automatic F. This is the only OCN 201L lab at WCC this semester thus impossible to make-up.

PARTICIPATION: This includes participating in laboratory and field activities, and working cooperatively within your group. You are also responsible for assisting in loading equipment, caring for equipment and cleaning after the lab or a field activity.

LABORATORY REPORT (worksheet): Each week's lab and most field trips will have a written report (worksheet). The worksheet will be completed each week in lab or in the field and submitted at that time. No late labs will be accepted and failure to hand in a lab at the end of each lab/field session will result in a score of zero '0' for that lab. No exceptions or make-ups will be given. While working in groups is encouraged in each lab, each student is required to fill out his/her individual lab worksheet. Copying another student's worksheet is considered academic dishonesty. Your lowest worksheet score for the semester will be dropped; however if you missed a lab you will receive a 0 score for that week's worksheet and that worksheet will be dropped as lowest.

QUIZZES: Quizzes (2-5 questions each) will be given on occasion and administered in class (up to 5 quizzes total). These quizzes are designed to test your understanding of the lab material. The quizzes will primarily focus on the material for the present week's lab. Preparation for the quizzes should include understanding the concepts from the previous week's lab and completing the assigned reading for the present week's lab. Either the lowest quiz score or a missed quiz will be dropped and not counted towards the final grade. No make-up quizzes will be given.

ASSESSMENT TASKS AND GRADING

In summary, grading will be based upon:

Participation	10 %
Quizzes	15%
Lab reports	75 %
TOTAL	100 %

Letter grades will be assigned as follows:

A	90% or above in total points.
B	80-89.9% of total points.
C	65-79.9% of total points.
D	55-64.9% of total points.
F	Below 55% of total points or informal or incomplete official withdrawal from course.
I	Incomplete; given at the INSTRUCTOR'S OPTION when student is unable to complete a small part of the course because of circumstances beyond his or her control. It is the STUDENT'S responsibility to make up incomplete work. Failure to satisfactorily make up incomplete work within the appropriate time period will result in a grade change for "I" to the contingency grade identified by the instructor (see catalog).
CR	65% or above in total points; the student must indicate the intent to take the course as CR/NC in writing by the end of the 10th week of classes (see catalog).
NC	Below 65% of total points; this grade only available under the CR/NC option (see above and see catalog).
N	NOT GIVEN EXCEPT UNDER EXTREMELY RARE CIRCUMSTANCES (e.g., documented serious illness or emergency that prevents the student from officially withdrawing from the course); never used as an alternative for an "F" grade.
W	Official withdrawal from the course after the third week and prior to the end of the 10th week of classes (see catalog).

Waiver of minimum requirements for specific grades may be given only in unique situations at the instructor's discretion.

LEARNING RESOURCES

Essentials of Oceanography (any edition) by Tom Garrison (optional).

Materials and equipment for laboratory and field exercises will be provided, as much as possible.

STUDENT RESPONSIBILITIES:

Students must review the attached sheets detailing inherently dangerous activities of this course both in the laboratory and field, then sign the appropriate U.H. *Assumption of Risk and Release forms*.

Students are expected to participate in laboratory and field activities, and complete course assignments on time.

Students are expected to be prepared when they arrive in class. Being prepared includes the following: having already read materials assigned for that day's activities, bringing any required work materials, and having completed any assigned pre-lab tasks; it also includes appropriate dress and protection from sun, weather, or other potential dangers during field activities (e.g., during as beach studies, boat trips, shallow-water surveys, etc.).

Changes in the course schedule, such as with course modifications, field site changes, weather problems, deadlines, etc., will be announced ahead of time in class, whenever possible, otherwise through Lulima.

It is the student's responsibility to be informed about deadlines critical to making registration changes (e.g., last day of erase period and last day for making an official withdrawal).

MySuccess: Students may be referred for extra help or advising through MySuccess. Students can also explore resources at MySuccess.Hawaii.edu and windward.hawaii.edu/MySuccess

DISABILITIES ACCOMMODATIONS

If you have a physical, sensory, health, cognitive, or mental health disability that could limit your ability to fully participate in this class, you are encouraged to contact the Disability Specialist Counselor to discuss reasonable accommodations that will help you succeed in this class. Ann Lemke can be reached at 235-7448, lemke@hawaii.edu, or you may stop by Hale 'Ākoakoa 213 for more information.

TITLE IX

Title IX prohibits discrimination on the basis of sex in education programs and activities that receive federal financial assistance. Specifically, Title IX prohibits sex discrimination; sexual harassment and gender-based harassment, including harassment based on actual or perceived sex, gender, sexual orientation, gender identity, or gender expression; sexual assault; sexual exploitation; domestic violence; dating violence; and stalking. For more information regarding your rights under Title IX, please visit: https://windward.hawaii.edu/Title_IX/.

Windward Community College is committed to the pursuit of equal education. If you or someone you know has experienced sex discrimination or gender-based violence, Windward CC has resources to support you. To speak with someone confidentially, contact Karla Silva-Park, Mental Health Counselor, at 808-235- 7468 or karlas@hawaii.edu or Kaahu Alo, Designated Confidential Advocate for Students, at 808-235- 7354 or kaahualo@hawaii.edu. To make a formal report, contact the Title IX Coordinator at 808-235-7393 or wccitix@hawaii.edu.

ACADEMIC INTEGRITY

Work submitted by a student must be the student's own work. The work of others should be explicitly marked, such as through use of quotes or summarizing with reference to the original author.

Students can upload papers to <http://www.TurnItIn.com> to have papers checked for authenticity, highlighting where the paper potentially fails to appropriately reference sources.

In this class, students who commit academic dishonesty, cheating or plagiarism will have the following consequence(s):

Students will receive a failing grade for plagiarized assignments.

All cases of academic dishonesty are referred to the Vice Chancellor for Student Affairs.

ALTERNATE CONTACT INFORMATION

If you are unable to contact the instructor, have questions that your instructor cannot answer, or for any other issues, please contact the Academic Affairs Office:

Location: Alakai 121

Phone: 808-235-7422

Email: wccaa@hawaii.edu

APPENDIX

OCN 201L LABORATORY AND FIELD ACTIVITIES

Students enrolled in OCN 201L are advised that certain required course activities are inherently dangerous and may require normal physical abilities. Students are therefore required to read about the inherently dangerous activities described below. In addition, students must read and demonstrate knowledge of their responsibilities while engaged in these activities.

Some students may have physical conditions that restrict their participation in certain laboratory activities. Respiratory ailments, certain allergies, and pregnancy may be among these conditions. Students exhibiting any of these conditions, or any other condition that may be impacted adversely by participation in the activity, should consult a physician.

INHERENTLY DANGEROUS ACTIVITIES

Students in the science laboratory may be exposed to chemicals (e.g., formaldehyde, organic solvents, acids, and other caustic chemicals), chemical fumes, laboratory equipment and supplies (e.g., scalpels, razor blades, glass slides, cover slips, and electrical equipment), toxic or irritating properties of living and dead animals and other materials necessary to laboratory activities of this or other laboratory classes. Other possible hazards include broken glass on the floor or counters, combustible materials (e.g., bunsen burner gas), and slippery spills.

During field activities students face risks such as accidents while in route to and from field destinations, falling out of boats, slipping on wet surfaces, stepping on sharp objects, large waves, strong currents, and dangerous marine life.

RESPONSIBILITIES OF STUDENTS IN THE LABORATORY:

1. Students should be familiar with safety procedures and take appropriate precautions at all times to insure the safety of every student in the lab.
2. Students should follow instructions carefully, especially when hazardous conditions occur or hazardous materials are being used.
3. Students should locate the placement of safety equipment and supplies in the laboratory: safety shower, eye wash station, fire extinguisher, and first aid kit. Students should understand the use of this equipment. Also note the locations of exits.
4. Anyone injured in the lab, should inform the instructor immediately and take immediate action to reduce the risk of further injury.
5. Students should familiarize themselves with the fire procedures. Extinguish small fires, but leave the building immediately should a major fire occur. Notify the appropriate authorities -- don't assume someone else remembered to do it. Meet with other students and your instructor outside the building before leaving so that an accurate headcount may be made.

6. Students should dress appropriately in the lab. Students may elect to supply their own gloves and protective aprons or laboratory coats. Some lab activities may require protective eyewear (provided for the activity by WCC).
7. Students should report all hazardous conditions to the instructor immediately.
8. Chemicals may be poisonous, corrosive, or flammable. No chemicals, even chemicals known to be safe, should be ingested, inhaled, or touched unless specifically directed to do so by your instructor.
9. All organisms, living or dead, should be treated with care and respect. Avoid direct handling when possible.
10. The safe use of specific equipment and tools (e.g., microscopes, slides, scalpels, and pipettes) will be demonstrated by the instructor during the laboratory sessions. Students should be sure they understand this usage.
11. Students should clean up any supplies used and should return materials where they belong as instructed. Any material spilled should be cleaned appropriately. Report any hazardous spills or breakages.
12. Broken glass and sharp metal waste should be placed only in those receptacles marked for such disposal -- do not put these materials in normal trash receptacles.
13. Some chemical wastes may not be dumped into laboratory sinks. In such circumstances an appropriate container will be provided for this waste in the lab.
14. Organic waste resulting from animal dissection activities should be disposed of in the appropriate receptacle, not the ordinary trash receptacles.
15. After completing laboratory activities and clean up, students should wash their hands in the restroom to avoid spreading contamination and hazardous chemicals.
17. The laboratory is a place for learning. Therefore, eating, drinking, and playing around is prohibited during the laboratory session. Students exhibiting unsafe or inappropriate behavior in the lab may be asked to leave and may be given an "F" grade for the course.

RESPONSIBILITIES OF STUDENTS IN THE FIELD:

1. Field excursions may involve carpooling to field destinations. Drivers are expected to have valid Hawaii driver's licenses, drive safely, and follow all traffic laws. Passengers should not disturb drivers.
2. When in the field, students should use the buddy system. Partners should have comparable physical skills and should keep track of each other at all times.
3. Students should wear clothing appropriate for the activity and should anticipate all possible weather conditions. Land/shoreline activities require loose-fitting clothing that protects the extremities from sunlight and abrasions (note that this clothing may get wet). Footwear

should allow stable walking on rough and/or slippery surfaces (slippers are not acceptable footwear). A hat and sunglasses are also highly recommended. For water activities, a wet suit, or long pants and sleeves, worn over swim suits, are recommended. Gloves and protective footwear are essential. Students should apply sunscreen to all exposed skin areas.

4. When looking under rocks or ledges, students should be prepared for encounters with dangerous marine animals, such as eels, lionfish, and sea urchins. Unless specifically instructed to do so, students should not touch any marine organism.
5. Students should familiarize themselves with potential hazards in an area before beginning an activity. Watch for large waves and dangerous currents. If conditions should become dangerous after the activity starts (e.g., waves pick up or dangerous marine life enters the area), the student should leave the area immediately. Students should inform the instructor immediately when dangerous conditions arise. A student should never feel compelled to do an activity that seems hazardous. A student should refuse to carry out an activity that exceeds his or her physical capabilities.
6. Anyone injured in the field, should inform the instructor immediately and take immediate action to reduce the risk of further injury. Before an activity begins, students will be informed of the location of the first aid kit (which will be taken on every excursion).
7. No one should operate a power boat without specific training. While in power boats, students should remain seated at all times. No power boat should be used without proper safety gear (i.e., first aid kit, life vests, oars, anchor, flares and other essential gear).
8. Consumption of alcoholic beverages or non-prescription drugs is prohibited during all class activities, including field activities.