

Course Title: Marine Environmental

Science (Lecture)

Course Number: ENV115

Term: **Fall 2022**Course Credits: **3**

Class Meeting Times: Tues & Thur

2:30-3:50

Class Location: **TBD**



Instructor Name: Dr. Lupita Ruiz-Jones

You can call me Dr. Lupita or Professor Lupita Email: guadalupe.ruiz-jones@chaminade.edu

Office Location: Wesselkamper 104

Cell Phone (welcome to text, lmk who you are): 505.603.1985

Office Hours: Tues 11:00-1:00 / Wed 12:30-1:30 & 2:30-3:30 / Thur 11:30-1:00 in-person or

zoom (zoom link in Canvas - text me to lmk you want to zoom)

Course description from University catalog

This course introduces students to the scientific causes and consequences of the current major marine environmental issues. Topics include: effects of global warming on ocean ecosystems, marine pollution, marine debris, oil spills, fisheries exploitation, fisheries by-catch, marine alien species and coral reef degradation. The course focuses on making students aware of the material causes and consequences of each issue as well as the role of science in devising sustainable solutions to each issue. Course must be taken concurrently with ENV 115L.

Course overview

The learning goals of this class are two-fold. First to engage you in learning the foundational concepts of marine science by reading through two course texts (Ocean by Syvlia Earle and Extreme Life of the Sea by Palumbi and Palumbi) and supplemental material. As you acquire this knowledge you will develop and practice skills used in data analysis and critique of scientific concepts presented in different types of sources. You will also think critically about how humans are altering the oceans and the challenges humanity faces to ensure the wellbeing of all beings everywhere. Throughout the course I will expose you to different types of stakeholders, including active scientists and conservationists, guest lectures and through course material. My intention is to highlight to you the many voices involved in marine challenges. The

course consists of five primary themes: Ocean Origins, Ocean Physical Characteristics, Marine Microbes and Primary Producers, Marine Animals, and Marine Ecosystems. This course satisfies the General Education Learning Outcome for Quantitative Reasoning: students will analyze and interpret quantitative data.

Service learning requirement

Through participation in organized service learning activities you will discover the many disciplines and techniques involved in ameliorating marine environmental challenges; and see how we put our skills and our Marianist and Pacific Island values into action for the good of the community.

A place to look for service learning opportunities: http://www.conservationconnections.org/

Classroom etiquette (in the time of COVID)

If and when it is deemed safe for us to unite in the same physical classroom, our primary goal will be to keep each other safe. No eating during class. Keep physical space between you, your peers and me. And if you have any COVID symptoms, be responsible and stay home, and let me know your situation.

Alignment of Natural Sciences Courses with Marianist and Hawaiian values

The Natural Sciences Division provides integrative course content taught by experienced, dedicated, and well-educated instructors. We educate in the family spirit – every classroom is an Ohana (family) and you can expect to be respected yet challenged in an environment that is supportive and inclusive by instructors who take the time to personally get to know and care for you. We educate for service, justice and peace, because many of the most pressing global issues (climate change, health inequity, poverty, justice) are those which science and technology investigate, establish ethical parameters for, and offer solutions to. We educate for adaptation and change. In science and technology, the only constant is change. Data, techniques, technologies, questions, interpretations, and ethical landscapes are constantly evolving, and we teach students to thrive on this dynamic uncertainty.

The study of science and technology is formative: exploring human creativity and potential in the development of technologies and scientific solutions; engaging in the stewardship of the natural world; and, promoting social justice. We provide opportunities to engage with the problems that face Hawai'i and the Pacific region through the Natural Sciences curriculum, in particular, those centered around severe challenges in health, poverty, environmental resilience, and erosion of traditional culture. The Marianist Educational Values relate to Native Hawaiian ideas of mana (spiritual energy of power and strength), na'auao (wisdom, enlightenment), ohana, aloha (love, affection, generosity, speaking from the heart, patience, and listening) and aina (love for the land and its people). We intend for our Natural Sciences programs to be culturally-sustaining, rooted in our Hawaiian place, and centered on core values of Maiau, be

neat, prepared, careful in all we do; *Makawalu*, demonstrate foresight and planning; `Ai, sustain mind and body; *Pa`a Na`au*, learn deeply.

Course Learning Outcomes and their evaluation

By the end of the course, you will be able to:

- 1. Describe specific characteristics related to: Ocean Origins, Ocean Physical Characteristics, Marine Microbes and Primary Producers, Marine Animals, and Marine Ecosystems.
 - a. Evaluated via in class discussions and quizzes. These quizzes will cover the assigned readings in the two course texts (Ocean by Syvlia Earle and Extreme Life of the Sea by Palumbi and Palumbi) and assigned scientific and popular science articles.
- 2. Analyze data figures from scientific articles.
 - a. Evaluated during class discussions.
 - b. Satisfies General Education Learning Outcome for Quantitative Reasoning.
- 3. Explain the major marine environmental issues and analyze connections to wellbeing.
 - a. Evaluated via quizzes and class discussions.
- 4. Think critically about a particular marine ecosystem.
 - a. Evaluated via an engaging presentation you create (Ecosystem Analysis Project).
- 5. Understand the complexity of how different stakeholders are involved in all marine issues.
 - a. Evaluated via class discussions and reflections post guest lectures.

Marine Ecosystem Analysis Project

You will be responsible for teaching your peers about a specific marine ecosystem. You will narrow down on a particular ecosystem, learn about it, and create an engaging presentation describing the key characteristics of that ecosystem and demonstrating your analytical skills. I will describe this project in more detail in class when I introduce the assignment prompt and grading rubric.

See Canvas Modules for the tentative schedule.

Grading breakdown

* The grade listed in Canvas is NOT accurate because it does not include all components of your grade, including Participation. If you are ever curious about your grade ASK ME:)

28% = Participation

- We have 29 class sessions together
- Starting with our 2nd class session each class = 1% (28 graded classes)
- For each graded class you will earn 0-1% of your final grade
- We will have a discussion in class about what is necessary to get full points
- Participation = engaged participation with peers, me, and guests

• Requires arriving to class on time and prepared, which requires reading the course books and assigned reading

15% = Canvas discussions/posts to complete in preparation for class discussion and activities

32% = quizzes (multiple throughout the semester)

20% = Marine ecosystem analysis project

5% = Service learning (minimum of 4 hours) ~ I will provide you with 2 opportunities and if you are unable to attend you will need to find an organized event.

Late work policy

If something happens and you know you need an extension on an assignment, contact me. If we do not make a prior arrangement, 10% of the assignment points will be deducted for each day after the assignment due date- does not apply to canvas discussion posts.

A = Outstanding scholarship and an unusual degree of intellectual initiative

B = Superior work done in a consistent and intellectual manner

C = Average grade indicating a competent grasp of subject matter

D = Inferior work of the lowest passing grade

F = Failed to grasp the minimum subject matter; no credit given

Extra credit opportunities

Throughout the course I will notify you of opportunities to engage with ideas and scholars outside of Chaminade. Due to the pandemic, most of these opportunities will be webinars. You are also welcome to attend any other webinar you find on your own that is related to course material. I will give you up 3 extra credit points (depends on the quality of your reflection) for each webinar you participate in. There are specific criteria for your reflection on Canvas in the Extra Credit Discussion Assignment.

Workload expectations

Students are expected to devote a minimum of 2 hours of focused work out of class for each 1 hour of class time per week. Let's round it to 3 hours of lecture per week, that is a minimum of 6 hours of outside focused work per week just for lecture.

Attendance and your grade

As an enrolled student in the course, I expect that you will attend every class unless you are sick or have a COVID-related situation. If you have more than two unexcused absences your grade will be negatively impacted. An important aspect of learning is active engagement. There is no substitute for being in class when it comes to understanding and thinking critically about the material. Due to the COVID-19 pandemic, it is essential that you stay home if you have any symptoms -- your absence will be excused. Unexcused absences occur when playing hooky to go surfing, to sleep, to cram for an exam in another class, etc.

Course website

We will use Canvas and google drive.

Required course textbook ~ both are available in Bookstore and online

Earle, Syliva. Ocean: A Global Odyssey. National Geographic. 2021. [ISBN-10: **1426221924**] [ISBN-13: **978-1426221927**]

Palumbi, Stephen & Palumbi, Anthony. The Extreme Life of the Sea. Princeton University Press. 2014. [ISBN-10: 9780691169811] [ISBN-13: 978-0691169811]

Classroom atmosphere

Learning through discussion

In class and online discussions provide an excellent opportunity to learn from classmates; to formulate and rethink your own understanding of the material; to practice thinking on your feet; and to critically evaluate evidence.

Over the semester, you will develop your skills in:

- Engaging substantively with different types of sources in critical and productive ways
- ♦ Posing thought provoking questions and collaborating with peers
- * Effectively communicating your ideas, both orally and in writing

Expectations of students in class

You have the responsibility to commit yourself to your academic work in ways that will increase your learning. In this course, following the guidelines below will give you the best chance of growing as a critical thinking learner:

<u>Arrive</u> to every class on time, which means settled in your seat by the start time. If it is a zoom class, this means being in a place where you can focus, take notes, and engage (i.e., not driving, etc.)

<u>Approach</u> the work of the course with the habits of mind critical for success at the university level: intellectual curiosity, critical engagement, and creativity.

<u>Prepare</u> by doing all the required reading and assignments before class. Feel free to bring printed copies of articles or notes you took while reading to guide you during discussions.

<u>Listen</u> actively and with respect to your peers. We listen to each other with dignity by thoughtfully grappling with the ideas of others and using non-verbal cues to show we are paying attention to them. Active listening is essential to engaged participation.

<u>Speak</u> up and challenge yourself to share your thoughts and ideas with your classmates in skillful and respectful ways. Being critical of your peers is essential for proper academic

discourse, but we strive to do so respectfully. Since you are thinking on your feet, you are not expected to speak with perfect clarity. Class discussion is a cooperative enterprise, not a competition. A quality contribution is one that helps stimulate our learning. A thoughtful response to another student's comment leads to a much richer learning experience than a long and well-researched but disconnected comment.

<u>Inquire</u> by asking questions—this is a key aspect of learning. Ask yourself questions as you engage with the course material. Engage with your peers by asking questions. Often there is not a single "right" answer.

Expectations you can have of me

I will continually strive to be an engaging, thoughtful, and critical teacher. One of my primary goals is to create a learning environment where everyone feels included. You can expect me to make space for you to share your thoughts and questions. You can also expect me to listen to your feedback on how the class is going -- please share your observations and ideas with me.

Technical Assistance for Canvas

- Search for help on specific topics or get tips in <u>Canvas Students</u>
- **♦** Live chat with Canvas Support for students
- ❖ Canvas Support Hotline for students: +1-833-209-6111
- Watch this video to get you started
- ♦ Online tutorials: click on "Students" role to access tutorials
- Contact the Chaminade IT Helpdesk for technical issues: helpdesk@chaminade.edu or call (808) 735-4855

Tutoring and Writing Services

Chaminade is proud to offer free, one-on-one tutoring and writing assistance to all students. Tutoring and writing help is available on campus at Kōkua 'Ike: Center for Student Learning in a variety of subjects (including, but are not limited to: biology, chemistry, math, nursing, English, etc.) from trained Peer and Professional Tutors. Please check Kōkua 'Ike's website (https://chaminade.edu/advising/kokua-ike/) for the latest times, list of drop-in hours, and information on scheduling an appointment. Free online tutoring is also available via Smarthinking. Smarthinking can be accessed 24/7 from your Canvas account. Simply click Account – Notifications – Smarthinking. For more information, please contact Kōkua 'Ike at tutoring@chaminade.edu or 808-739-8305.

Course Policies

Communication with me

I'm always happy to address your questions. I generally answer emails within 24 hours on weekdays and by the following weekday if sent on a weekend or holiday. Please do not wait until the last minute to ask questions. I expect you to communicate with me about any issues related

to the course. Clear and timely communication can anticipate many standard problems that arise during a course. I am also super happy to just chat with you about topics you find interesting or you are curious about.

Grades of "Incomplete"

You may negotiate an incomplete grade with me when there are specific justifying circumstances, but it is necessary that you have at least completed 70% of the required assignments. When submitting a grade the "I" will be accompanied by the alternative grade that will automatically be assigned after 90 days. These include IB, IC, ID, and IF. If only an "I" is submitted the default grade is F. The completion of the work, evaluation, and reporting of the final grade is due within 90 days after the end of the semester or term; this may not be extended.

Cell phones, tablets, and laptops

Out of consideration for your classmates, please set your cell phone to silent mode during class. Students are encouraged to bring laptops or tablets to class as I will at times assign online activities and readings that will require the use of a laptop or tablet. It is well known that these devices can be extremely distracting to your learning as well as the learning experience of your peers. When you are in class I expect that you are focused on the material and not multitasking by checking email, social media, or unrelated material on your device.

Disability Access

If you need individual accommodations to meet course outcomes because of a documented disability, please speak with me to discuss your needs as soon as possible so that we can ensure your full participation in class and fair assessment of your work. Students with special needs who meet criteria for the Americans with Disabilities Act (ADA) provisions must provide written documentation of the need for accommodations from the Counseling Center by the end of week three of the class, in order for instructors to plan accordingly. If a student would like to determine if they meet the criteria for accommodations, they should contact the Kōkua 'Ike Coordinator at (808) 739-8305 for further information (ada@chaminade.edu).

The <u>Counseling Center website</u> is updated with current resource information. Inquiries and questions can always be referred to counselingcenter@chaminade.edu.

Title IX Compliance

Chaminade University of Honolulu recognizes the inherent dignity of all individuals and promotes respect for all people. Sexual misconduct, physical and/or psychological abuse will NOT be tolerated at CUH. If you have been the victim of sexual misconduct, physical and/or psychological abuse, we encourage you to report this matter promptly. As a faculty member, I am interested in promoting a safe and healthy environment, and should I learn of any sexual misconduct, physical and/or psychological abuse, I must report the matter to the Title IX Coordinator. If you or someone you know has been harassed or assaulted, you can find the appropriate resources by visiting Campus Ministry, the Dean of Students Office, the Counseling Center, or the Office for Compliance and Personnel Services.

Attendance Policy

For the University wide attendance policies please the 2020-2021 Academic Catalog.

You are expected to regularly attend all courses for which you are registered. You should notify me when illness or other extenuating circumstances prevent you from attending class and make arrangements to complete missed assignments. Notification may be done by emailing me. It is my prerogative to modify deadlines of course requirements accordingly. Any student who stops attending a course without officially withdrawing may receive a failing grade.

Unexcused absences equivalent to more than a week of classes may lead to a grade reduction for the course. Any unexcused absence of two consecutive weeks or more may result in being withdrawn from the course, although I am not required to withdraw students in that scenario. Repeated absences put students at risk of failing grades.

Students with disabilities who have obtained accommodations from the Chaminade University of Honolulu ADA Coordinator may be considered for an exception when the accommodation does not materially alter the attainment of the learning outcomes.

Federal regulations require continued attendance for continuing payment of financial aid. When illness or personal reasons necessitate continued absence, you should communicate first with me to review the options. Anyone who stops attending a course without official withdrawal may receive a failing grade or be withdrawn at my discretion.

Academic Conduct Policy

Students should conduct themselves in a manner that reflects the ideals of the University. This includes knowing and respecting the intent of rules, regulations, and/or policies presented in the Student Handbook, and realizing that students are subject to the University's jurisdiction from the time of their admission until their enrollment has been formally terminated. Please refer to the Student Handbook for more details. A copy of the Student Handbook is available on the Chaminade website.

This syllabus and course schedule are living documents: they are free to change. I try to adhere as closely as possible, but there will be times in which we will take longer on a particular topic or add or delete a topic to enhance the course. I like to be able to react to you as the course proceeds and go with the flow a bit in order to make the course experience sort of custom fit to you!

You are responsible for all of the information in this document: not reading it does not make you exempt from knowing what's in it!

Use this syllabus to understand how your grade is determined \sim it is basically a contract between you and me.