IB 362—Marine Biology Fall 2023 3 credits, CRN 70371 Lecture, Tues & Thurs, 9:30 - 10:50 am, 2020 NHB

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Webpage: Moodle - <u>https://learn.illinois.edu/</u>

**Overview:** This course is an introduction to marine systems. We will discuss the physics and chemistry of oceans as well as the biology of the organisms that inhabit these systems. We will also discuss how humans use marine systems.

Learning Goals: By the end of this course, students should be able to:

Explain the inter-relationships of physics, chemistry and biology in marine systems Summarize the diversity of marine organisms and their roles in marine systems Evaluate data related to current stressors on marine systems

Accommodations: To obtain disability-related academic adjustments and/or auxiliary aids, students should contact both the instructor and the Disability Resources and Educational Services (DRES) as soon as possible. You can contact DRES at 1207 S. Oak Street, Champaign, (217) 333-1970, or via email at disability@illinois.edu.

Attendance & Participation: Active participation is vital to your success in this course. You will be asked during each class time to engage in discussions and other interactive learning environments that invite your active participation and involvement with other students and your instructor.

Late Submission Policy: If you are unable to meet a particular deadline, it is your responsibility to make prior arrangements with me. Work submitted later than the exact time of the deadline will receive a 10% grade deduction per day. Work submitted later than 3 days will not be considered for grading unless consent has been given by the instructor.

#### **Instructor Responses**

Instructor Feedback Turnaround Time

Assignments will be reviewed and graded by the course instructor within 7 business days. Exams, essays, and term papers will be graded within 7 business days. If your instructor is unable to meet this timeline, students will be notified.

Responding to E-mails and Phone Calls

I will respond to e-mail messages and phone calls within 24 hours of receiving them unless I notify you ahead of time of an inability to do so. When sending e-mail, include a subject line that identifies the course number and nature of your question. I may not respond to questions that should be posted in the Q & A Forum. Please don't be offended if you are asked to forward your question to this location. If you leave a voicemail message with me, please check your e-mail for a response.

# **Academic Integrity**

Academic dishonesty will not be tolerated. Examples of academic dishonesty include the following:

Cheating Fabrication Facilitating infractions of academic integrity Plagiarism (intentional or unintentional) Working as a group when not permitted Bribes, favors, and threats Academic interference Impersonation or examination by proxy Grade tampering Non-original works (Including using AI to generate answers)

Should an incident arise in which a student is thought to have violated academic integrity, the student will be processed under the disciplinary policy set forth in the Illinois Academic Integrity Policy. If you do not understand relevant definitions of academic infractions, contact me for an explanation within the first week of class.

Any violation of academic integrity on an exam or on the semester project will result in a score of zero for that assignment. Communication with other students during an exam is a violation of academic integrity. Using any unauthorized material during an exam is a violation of academic integrity. Posting any part of an exam to any social media site or website is a violation of academic integrity.

# Copyright

Student Content

Participants in University of Illinois courses retain the copyright of all assignments and posts they complete; however, all materials may be used for educational purposes within the given course. In group projects, only the portion of the work completed by a particular individual is copyrighted by that individual. The University of Illinois may request that students' materials be shared with future courses, but such sharing will only be done with the students' consent. The information that students submit during a course may, however, be used for the purposes of

administrative data collection and research. No personal information is retained without the students' consent.

#### Non-Student Content

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These materials may not be mirrored or reproduced on non-University of Illinois websites without the express written permission of the University of Illinois Board of Trustees. To request permission, please contact the academic unit for the program.

#### **Student Behavior**

Student Conduct

Students are expected to behave in accordance with the penal and civil statutes of all applicable local, state, and federal governments, with the rules and regulations of the Board of Regents, and with University regulations and administrative rules.

### **In-Class Etiquette**

The Golden Rule: Treat others as you would like to be treated. Refer to your instructors and classmates with their preferred form of address. Be attentive when others are speaking. Process their suggestions before responding. Use electronic devices only for coursework.

### Netiquette

In any social interaction, certain rules of etiquette are expected and contribute to more enjoyable and productive communication. The following are tips for interacting online via e-mail or discussion board messages, adapted from guidelines originally compiled by Chuq Von Rospach and Gene Spafford (1995):

Remember that the person receiving your message is someone like you, deserving and appreciating courtesy and respect.

Be brief; succinct, thoughtful messages have the greatest effect.

Your messages reflect on you personally; take time to make sure that you are proud of their form and content.

Use descriptive subject headings in your e-mails.

Think about your audience and the relevance of your messages.

Be careful when you use humor and sarcasm; absent the voice inflections and body language that aid face-to-face communication, Internet messages are easy to misinterpret.

When making follow-up comments, summarize the parts of the message to which you are responding.

Avoid repeating what has already been said; needless repetition is ineffective communication. Cite appropriate references whenever using someone else's ideas, thoughts, or words.

## Communications

**Course Questions** 

Questions pertaining to the course should be posted in our Q & A Forum discussion forum. You can get to this forum from the course home page. Posting questions here allows everyone to benefit from the answers. If you have a question, someone is probably wondering the same thing. Excellent topics to post would be questions you had that were not asked in class or questions that you did not think about until after class. Anyone submitting a question via e-mail will be directed to resubmit the question to the Q & A discussion forum. Also, participants should not hesitate to answer questions posed by peers if they know the answers and the instructor has not yet responded. This not only expedites the process but also encourages peer interaction and support. Personal and Grade-related Questions

Questions of a personal nature should first be sent to the instructor's e-mail address (listed on the Instructor Information page). When sending e-mail, include a subject that identifies the course number and nature of your question. Emergencies

If you have an emergency that will keep you from participating in the course, please notify your instructor by using the instructor's e-mail address (listed on the Instructor Information page). Provide callback information in your e-mail (if necessary). You should also notify your program director of any emergencies. Announcements

The Announcements forum serves as a way for your instructor and University of Illinois administrators to make announcements within our online learning environment. Announcements posted here will also be sent to your Illinois e-mail address, so be sure to check your e-mail or the Announcements forum at least once a day to see whether any new announcements have been made.

### Value of Student Diversity

In this course, students from every background are valued and will be treated with respect. Contributions from international students, students with disabilities, non-traditional students, and students from underrepresented groups are important to course discourse. Sexual Misconduct Policy and Reporting The University of Illinois is committed to combating sexual misconduct. Faculty and staff members are required to report any instances of sexual misconduct to the University's Title IX and Disability Office. In turn, an individual with the Title IX and Disability Office will provide information about rights and options, including accommodations, support services, the campus disciplinary process, and law enforcement options.

A list of the designated University employees who, as counselors, confidential advisors, and medical professionals, do not have this reporting responsibility and can maintain confidentiality, can be found in the Confidential Resources section. Other information about resources and reporting is available at wecare.illinois.edu.

### Grading:

| (500 points)                                    |          |
|---|----------|
| 1 <sup>st</sup> In class exam                   | 100 pts. |
| 2 <sup>nd</sup> In class exam                   | 100 pts. |
| 3 <sup>rd</sup> In class exam                   | 100 pts. |
| In class work and related pre-class assignments | 100 pts. |
| Semester Project on Stressors                   | 100 pts. |

## **Grading Scale**

| 500 total points |    |         |    |
|------------------|----|---------|----|
| 495-500          | A+ | 385-399 | C+ |
| 465-494          | А  | 365-384 | С  |
| 450-464          | A- | 350-364 | C- |
| 435-449          | B+ | 335-349 | D+ |
| 415-434          | В  | 315-334 | D  |
| 400-414          | B- | 300-314 | D- |

### Lecture Topics (order may change)

| Date      | Topic   |
|-----------|---|
| August 22 | Introduction - What is Marine Biology?                      |
| August 24 | Structure of Marine Environments and ionic content of water |
|           |   |
| August 29 | Light, heat, and zones of the ocean                         |
| August 31 | Oxygen and Carbon   |

| September 5  | Patterns and causes of ocean circulation |
|--------------|--|
| September 7  | Movement (continued)                     |
| September 12 | Climate Change and Oceans                |
| September 14 | Climate Change and Oceans                |
| September 19 | Exam #1                                  |
| September 21 | Marine Microbes                          |
|              |  |
| September 26 | Marine Microbes                          |
| September 28 | Plankton                                 |
|              |  |
| October 3    | Corals                                   |
| October 5    | Corals II – Image J lab                  |
|              |  |
| October 10   | Other Invertebrates                      |
| October 12   | Reproduction and Life Cycles             |
|              |  |
| October 17   | Exam #2                                  |
| October 19   | Chordates                                |
|              |  |
| October 24   | Chordates II                             |

| October 26                          | Conservation I  |
|-------------------------------------|---|
| October 31<br>November 2<br>Systems | Conservation II<br>Invasive Species & Disease in Marine |
| November 7                          | Op-ed and poster workshop Part I                        |
| November 9                          | Harmful Algal blooms                                    |
| November 14                         | Harmful Algal blooms                                    |
| November 16                         | Op-ed and poster workshop Part II                       |

November 21 & 23 Thanksgiving Break

- November 28 Life in extreme environments
- November 30 *Poster Presentations*

# December 5 Exam #3

Our Final Exam slot is December 8 at 1:30-4:30. Your op-ed is your final exam. You must have it uploaded no later than the end of the final exam time. You can spend as much time as you need to complete this final assignment and you can upload it as soon as you complete it.