

Brenna Rothman (she/her)

Curriculum Vitae

Seattle, WA – (559) 589-5319 – brenroth@uw.edu

EDUCATION

- Present **University of Washington, M.S. in Aquatic and Fishery Sciences**
Advisor: Dr. Corey Garza
- 2023 **Oregon State University, Geographic Information Science Certificate**
Honors: *magna cum laude*; GPA: 3.75/4.0
- 2019 – 2022 **Oregon State University, B.S. in Biology**
Option in Marine Biology, Minor in Chemistry
Honors: *cum laude*; GPA: 3.53/4.0

RESEARCH INTERESTS

Community and Landscape Ecology. Geospatial Analysis.
Coastal Ocean, Kelp Forest, and Intertidal Ecosystems.

RESEARCH EXPERIENCE

- Present **University of Washington, School of Aquatic and Fishery Sciences.**
Graduate Fellow. Member of the Marine Landscape Ecology Lab.
- 2024 **Partnership for Interdisciplinary Studies of Coastal Oceans.**
Faculty Research Assistant. Responsible for managing an NSF funded project on mussel mortality in Oregon. Planning and conducting fieldwork, as well as managing data and personnel. Mentored undergraduate students with projects related to mussel mortality.
- 2023 **Partnership for Interdisciplinary Studies of Coastal Oceans.**
Seasonal Research Assistant. Assisted professors, technicians, post-doctoral fellows, student workers, and graduate students in research on ecosystem dynamics of rocky reef and near shore communities along the U.S. West Coast.
- 2022 **Lubchenco-Menge Lab. Undergraduate Research Fellow.** Served as a full-time aid to field technicians and faculty in Oregon and Central California and conducted a research project on sunflower sea stars.
- 2022 ***Pycnopodia Recovery Working Group. Shore Support.*** Primary safety contact for dive collections of *Pycnopodia helianthoides* in Holmes Harbor, WA to assess the overall health of the population.

2021 – 2022 **Lubchenco-Menge Lab. Volunteer.** Assisted in processing biomass samples, conducting sea star arm dissections, and helped install and monitor field operations and experiments.

PUBLICATIONS

In prep

Menge et al. LTREB: Testing tipping points in a model rocky intertidal meta-ecosystem: Climate-change, increasing variances, and response mechanisms.

Menge & Rothman. A subtle epidemic: unique mortality of *Mytilus californianus* on the Oregon coast.

RESEARCH PROJECTS AND PRESENTATIONS

Oral Presentations

Rothman B., Dickens, J., Garza, C., Morgan, S., Gravem, S. 2023. The interaction of *Pisaster* predators and environmental stressors driving prey distributions in a rocky intertidal boulder field. Western Society of Naturalists 2023 in Monterey, CA.

Rothman B., Collins K., Traiger S., Gavenus K., Francis F., Kocian J., Gehman A., Crandall G. and Gravem S. 2022. Evaluating the reproductive timing of sunflower sea stars to inform species recovery. Western Society of Naturalists 2022 in Oxnard, CA.

Poster Presentations

Rothman B., Collins K., Traiger S., Gavenus K., Francis F., Kocian J. and Gravem S. 2022. Evaluating the reproductive timing of sunflower sea stars to inform species recovery. State of the Coast – Oregon Sea Grant in Newport, OR.

Virtual Presentations

Rothman B., Collins K., Traiger S., Gavenus K., Francis F., and Gravem S. 2022. Evaluating the growth and reproduction of an endangered sea star to inform species recovery. Oregon State University Summer Undergraduate Research Symposium (SURS) in Corvallis, OR.

Rothman B., Rice L., Scrafford D. 2022. Assessing understory community diversity of *Egregia menziesii*, *Hedophyllum sessile*, and *Phyllospadix scouleri*. BI 450: Marine Biology and Ecology Research Symposium in Newport, OR.

SCIENCE COMMUNICATION

2024 **Lubchenco-Menge Lab. Social Media Manager.**
Created and organized lab Instagram account. Featured new students and staff, posted fieldwork content, and shared pertinent posts from related organizations.

2023 **Cape Perpetua Collaborative. Young WaveMaker.**

The Rocky Shores of the Oregon Coast: Highlighting OSU's Menge Lab.
Cape Perpetua Collaborative Young WaveMakers Webinar Series.
<https://www.youtube.com/watch?v=LEeD-TBeGvk>

MENTORING

2024

Tyler Jacoby, Oregon State SURE Summer Scholarship Awardee.
Project Title: Determining drivers of an unexplained mortality event of an intertidal foundational species.

Auggie Tveit, Oregon State University URSA Engage Awardee.
Project Title: Exploration of the effect of seasonality on *Mytilus californianus* disturbances along the Oregon Coast.

Kaia Dukart-Stading, Oregon State University URSA Engage Awardee.
Project Title: Mussel Disturbances Across a Geographical Gradient.

TEACHING EXPERIENCE

2021

Instructor. Designed and implemented a week-long marine biology course for the Precollege Programs Department at Oregon State University.

RELEVANT COURSEWORK

Marine Science: Aquatic Microbiology, Biological Oceanography, Marine Biology and Ecology
Geospatial Science: Remote Sensing, Introduction to Geospatial Technologies, Cartography
Programming & Quantitative Analysis: Advanced R Programming, Statistical Inference in Applied Research, Population Biology, Foundations of Biological Data Sciences
Science and Society: Climate Justice, Sustainability for the Common Good, Philosophy of Biology, Oceans in Peril

EXTRACURRICULARS

Present

Fisheries Interdisciplinary Network of Students. *Merchandise Coordinator*.

2020 – 2022

Sigma Delta Omega. *Board of Directors*. Chief judicial officer, member of the board of directors, and former recruitment lead for a non-profit organization dedicated to uplifting collegiate women in STEM.

2020 – 2022

Order of Omega Honor Society. *Member*. Recognized as an outstanding leader in the fraternity and sorority community on the Oregon State campus.

2019 – 2022

Ocean 11 Marine Club. *Member*.

SKILLS & CERTIFICATIONS

Skills

Technical Skills: RStudio, Python, JMP, PAST4, ArcGIS Products, Microsoft and Google Suites

Soft Skills: Leadership, adaptability, teamwork, communication, management

Certifications

2024	Wilderness First Aid & Basic CPR
2025	FAA Remote Pilot License