**Jackson Hoeke**

102 Chippendale Ct . – Los Gatos, CA 95032

(408) 396-3272 [jhoeke@mlml.calstate.edu](mailto:jhoeke@mlml.calstate.edu)

**Education**

**Moss Landing Marine Laboratories**

M.S. in Marine Science Expected graduation: 2023

**University of Oregon**

B.S.inMarine Biology Graduated June, 2020

GPA – 3.80 | Good Standing | Graduated *Cum laude*

Marine Biology Valedictorian 2020

Honors Thesis: Native and introduced hydroids (Cnidaria: Hydrozoa) from the marine and estuarine waters of Coos Bay, Oregon, Advisor: Dr. Craig Young

**Relevant Coursework**

**BI 408/508:** Biological Illustration, Oregon Institute of Marine Biology, University of Oregon. Taught by John Megahan (UM)

**BI 457/557:** Deep-Sea and Subtidal Ecology, Oregon Institute of Marine Biology, University of Oregon. Taught by Dr. Craig Young and Dr. Cynthia Trowbridge

**BI 457/557:** Biology of Fishes, Oregon Institute of Marine Biology, University of Oregon. Taught by Daryl Parkyn (UF)

**BI 451/551:** Invertebrate Zoology, Oregon Institute of Marine Biology, University of Oregon. Taught by Dr. Richard Emlet and Dr. Maya Watts

**BI 457/557:** Comparative Embryology and Larval Biology, Oregon Institute of Marine Biology, University of Oregon. Taught by Dr. Svetlana Maslakova

**BI 455/555:** Marine Birds and Mammals, Oregon Institute of Marine Biology, University of Oregon. Taught by Doug Warrick

**Research Experience**

**Summer 2020** – Worked with Amanda Kahn as a graduate researcher on the impact of CA Deepwater MPAs

* Use of R to perform blocked ANOVA and NMDS analyses on data from California MPA surveys

**Winter 2020** – Worked under Dr. Craig Young as an undergraduate researcher on the *R/V Atlantis* assisting with *HOV Alvin* specimen collection, processing, and preservation from Atlantic methane seeps

* Removed specimens from *Alvin* compartments and transferred to temporary aquaria where they were held
* Assisted in measuring, preparing, dissecting, and preserving specimens for research
* Sifted through sediment samples and used light microscopy to identify and remove larvae of interest

**Summer 2019** – Worked under Dr. Cynthia Trowbridge as an undergraduate researcher on ecological surveys at Lough Hyne, Ireland

* Completed several snorkel surveys along the edge of the Lough
* Surveyed for presence/absence of invertebrate species under rocks
* Measured *Musculus* commensal mussels for size difference between free-living and commensal

**Summer 2019** – Assisted Doug Warrick with the dissection of Pygmy Sperm Whale *Kogia breviceps* as part of the Birds and Mammals class at OIMB

**Spring – Summer 2019** – Hydroid collection for undergraduate thesis project under Dr. Craig Young.

* Specimens retrieved from intertidal field work and subtidal dredging on the *R/V Pluteus*
* Subsequent species identification using dichotomous keys.
* Photos taken using Flickr microscope camera and SEM microscopy.

**Spring 2019** – Experience rearing marine larvae through metamorphosis as part of the Comparative Embryology class at the Oregon Institute of Marine Biology

**Spring 2019** – Participated in the 2019 Bio Blitz collecting specimens at OIMB

* Specimens sorted and identified down to at least Family status using dichotomous keys

**Publications**

**J. Hoeke**. 2018. *Buccinum strigillatum* in Oregon Shelf Invertebrates\*

**J. Hoeke**. 2018. *Gorgonocephalus eucnemis* in Oregon Shelf Invertebrates\*

\*Oregon Shelf Invertebrates is an ongoing, in-house, reference publication for the Oregon Institute of Marine Biology. This will be a companion to the Oregon Estuarine Invertebrates (<http://researchguides.uoregon.edu/oei>).

**Skills**

**Illustration**

* Drawing organisms from life
* Mediums: Ink, Graphite, Watercolor

**Coding and Analyses in R**

* ANOVA and blocked ANOVA
* NMDS analyses

**Dissection**

* Invertebrates -i.e. crabs, worms, squid, mussels
* Vertebrates
  + Fish
  + Pygmy sperm whale

**Microscopy**

* Compound
* SEM

**At-Sea Experience**

* ROV
* Dredging
* Plankton tows
* Trawls
* Microscopy
* Temporary live specimen aquaria

**Other Lab/Field Work**

* Plankton identification and counting
* Otolith aging (break and burn method)
* Use of Dichotomous Keys
* Specimen preservation using formalin and EtOH series
* Use of Critical Point Dryer