

# Jane B. Weinstock

Falmouth, MA, USA 02540

978-413-7727  
jane.b.weinstock@gmail.com

---

<b>EDUCATION</b>	<b>MIT-WHOI Joint Program (PhD)</b> , Falmouth MA Biological Oceanography Advisor: Jesús Pineda  <b>Smith College (B.A.)</b> , Northampton MA Geoscience major, biology minor GPA: 3.95 of 4.00 Elected Phi Beta Kappa (2016) Dean's List (2013, 2014, and 2016)  <b>The University of Canterbury (Semester abroad)</b> , Christchurch NZ Frontiers Abroad: Geology of New Zealand	2019-Present  2012-2016  2014
<b>AWARDS AND FELLOWSHIPS</b>	NSF Graduate Research Fellowship U.S. Fulbright Student Fellowship Goldwater Scholarship Honorable Mention	2019 2016 2015
<b>PUBLICATIONS</b>	Weinstock, J.B., Morello, S.L., Conlon, L.M., Xue, H., and P.O. Yund. 2018. Tidal shifts in the vertical distribution of bivalve larvae: Vertical advection vs. active behavior. <i>Limnology and Oceanography</i> 63: 2681-2694. doi: 10.1002/lno.10968	
<b>RESEARCH EXPERIENCE</b>	<b>Visiting Scientist</b> at the University of Massachusetts in Lowell, MA with Dr. Rick Hochberg and Dr. Rachel Collin. Processed remaining field samples collected during Fulbright Fellowship; counted and isolated bivalve and gastropod veligers, crab and shrimp zoea, barnacle cyprids, and echinoderm plutei. From December 2017 to December 2018.  <b>U.S. Fulbright Student Fellow</b> at the Smithsonian Tropical Research Institute in Bocas del Toro, Panama with Dr. Rachel Collin. Designed and executed study of larval response to hypoxia in Almirante Bay, Panama. Collected and processed weekly boat-based field samples and water quality data at two depths in three field sites to compare the vertical distribution of marine invertebrate larvae with oceanographic factors, primarily dissolved oxygen content. Also conducted laboratory trials to evaluate the growth and mortality rates of select crab, urchin, and snail larvae when exposed to multiple combined sub-lethal stressors: salinity, temperature, and dissolved oxygen. Overall project included direct supervision of four interns and field/lab assistants. From November 2016 to September 2017.  <b>Research Assistant</b> at the Downeast Institute in Beals, ME with Dr. Phil Yund. Participated in multidisciplinary study of blue mussel <i>Mytilus edulis</i> population connectivity in the Gulf of Maine. Collected physiological and population data for adult and juvenile mussels. From May to October 2016 and from May to August 2014.  <b>Independent study</b> at Smith College in Northampton, MA with Dr. David Smith and Dr. Phil Yund. Collected boat-based field samples of larvae (summer of 2014) in self-designed project to	

study tidal and diel vertical migration in *Mytilus edulis* larvae. Processed field samples using a Scanning Electron Microscope (SEM) to identify larvae to a family or genus level based on shell and hinge teeth morphology. In 2016, extended project with a meta-analysis of existing larval bivalve vertical migration literature. From Sept. 2015 to Aug. 2016 and from Sept. to Dec. 2014.

**Introduction to Biological Microscopy course** at Smith College in Northampton, MA with Dr. Nathan Derr. Received training in the theory and practical use of: fluorescence, confocal, total internal reflection fluorescence (TIRF), transmission electron, and scanning electron microscopy to observe cellular- and molecular- scale biological structures. From Sept. to Dec. 2015.

**Research Assistant** at Smith College with Dr. Robert Newton. Carried out field surveys using Global Positioning System (GPS) and Total Station data to quantify the erosion of Popham Beach in Phippsburg, ME. From July to September 2015.

**Independent study** at the University of Canterbury in Christchurch, New Zealand with Dr. Kari Bassett. Evaluated the cause of burial of a subfossil forest to assess potential local tsunami risk. Sediment samples were collected and searched for microfossil evidence of deep-water inundation, and results were compared with stratigraphic and paleontological data. From Feb. to June 2015.

**Geology Field Camp and Field Focused Research Methods course** with the Frontiers Abroad: Geology of New Zealand program at the University of Canterbury. Participated in a 6-week field course and received training in orienteering, bedrock mapping, and natural hazards management. Took associated semester-long course that emphasized the skills behind conducting and presenting scientific research. From January to February 2015.

**Independent study** at Smith College with Dr. Sara Pruss. Carried out paleontological research to measure the ecological diversity of Cambrian Archaeocyathan sponge reefs. Rock samples were dissolved and searched for potential microfossils, which were imaged using a Scanning Electron Microscope. From September 2013 to May 2014.

**Research Experiences for Undergraduates (REU) program** of the Biology Department at the University of Massachusetts in Boston, MA with Dr. Ron Etter. Carried out methodological research on behavioral response of Atlantic Dog Whelk *Nucella lapillus* to various anti-fouling paints. Also assisted in ecological study that monitored intertidal communities in Gloucester and Maine. From June to August 2013.

**CONFERENCES** **Presentation** “Active Behavior or Vertical Advection? Tidal Shifts in the Vertical Distribution of Bivalve Larvae”, The Society for Integrative and Comparative Biology Annual Meeting in San Francisco, CA in January 2018.

**Poster** “Larval response to seasonal hypoxia in the Caribbean Sea, Bocas del Toro”, The Society for Integrative and Comparative Biology Annual Meeting in San Francisco, CA in January 2018 and The Annual Smithsonian Tropical Research Institute Fellows and Interns Symposium in Panama City, Panama in February 2017.

**Poster** “Vertical movement of *Mytilus edulis* larvae in the Eastern Gulf of Maine”, The Annual Benthic Ecology Meeting in Portland, ME in March 2016 and the Celebrating Collaborations Research Symposium at Smith College in April 2016.

**Presentation** “From Caves to Volcanoes: Six Weeks Across New Zealand in the Life of a Field Geologist”, The Annual “Smith in the World” Conference at Smith College in November 2015.

**Presentation** “Death of a Drowned Forest: Tsunami Risk on the Conway Coast, South Island, New Zealand”, The Annual Geologic Society of America Conf. in Baltimore, MD in Nov. 2015.

**Poster** “Did a tsunami drown the Conway Flats buried forest?”, The Frontiers Abroad Research Symposium at the University of Canterbury in June 2015.

**Poster** “Reconstruction of early Cambrian reef ecology from small sieve sizes from Southwestern Mongolia”, Pruss Lab Geobiology Research Symposium and Celebrating Collaborations at Smith College in April and February 2014.

**Poster** “Effectiveness of biocide-containing paints as an exclusion barrier for the intertidal snail *Nucella lapillus*”, The Summer Research Symposium at the University of Massachusetts in Boston in August 2013.

## **ADDITIONAL EXPERIENCE**

**Private Tutor** with Club Z! In-Home Tutoring in Central MA. Provided students aged 11 to 18 with personalized instruction in various school subjects (including middle and high school mathematics, high school and AP biology) as well as in preparation for college admissions tests (SAT and ACT all subjects). January 2018 to May 2019.

**Aquarium and Laboratory Assistant** in the Biology Department at Smith College. Maintained 400 gallon marine invertebrate display tank as well as 20 gallon marine, freshwater, and terrestrial tanks for Biology 261: Invertebrate Diversity Lab. Monitored tank appearance and animal health, fed animals every 2-3 days, and cleaned tanks biweekly. In the spring, also cleaned up weekly labs: Put away study organisms and glassware. From September 2015 to May 2016.

**Geology Club President** at Smith College. Organized club events and meetings, and worked with faculty to publicize geology department and major. Took on additional responsibilities of co-designing and selling club merchandise. From September 2014 to May 2016. Vice-president of the club from October to May 2014.

**Teaching Assistant** in the Mathematics Department at Smith College. Assisted students with course material for Logic 100: Valid and Invalid Reasoning. Graded weekly homework assignments, provided help sessions, and worked with professors and other teaching assistants to discuss class trajectory. From September to December 2013, 2014, and 2015.

**Teaching Assistant** in the Geology Department at Smith College. Assisted students with course material for Geology 108: Oceanography. Prepared materials for weekly laboratory and class sessions and offered students additional help with laboratory assignments, papers, and exam preparation. From January to May 2014.

## **SKILLS**

Scanning Electron Microscope  
Water quality sampling (EXO2 Sonde, YSI Probe, CastAway CTD sensor)  
GPS data collection (Leica Total Station, Trimble GPS unit)  
Software (Adobe Illustrator, ArcGIS, Microsoft Suite, GraphClick, ImageJ, RStudio)  
Open-water SCUBA Certified (NAUI)  
Six years of Spanish language courses