

Harriet Alexander, PhD

Biology Department
Woods Hole Oceanographic Institution
266 Woods Hole Rd., MS# 51
Woods Hole, MA 02543
Phone: (508)289-3565
E-mail: halexander@whoi.edu

PROFESSIONAL PREPARATION

Wellesley College	Wellesley, MA	Biological Sciences	B.A., 2010
MIT/Woods Hole Oceanographic Institution	Woods Hole, MA	Biological Oceanography	Ph.D. 2016
Lamont-Doherty Earth Observatory	Palisades, NY	Biological Oceanography	Postdoc 2016
University of California, Davis	Davis, CA	Computational Biology	Postdoc 2016-2018

APPOINTMENTS

2018–present **Assistant Scientist**, Biology Department, Woods Hole Oceanographic Institution, Woods Hole, MA

PUBLICATIONS

Closely related publications

1. **Alexander H**, Johnson LK, Brown CT. (2018). Keeping it light: (Re)analyzing community-wide datasets without major infrastructure. *GigaScience*. doi:10.1093/gigascience/giy159.
2. Hu SK, Liu Z, **Alexander H**, Campbell V, Connell PE, Dyhrman ST, Heidelberg KB, Caron DA. (2018). Shifting metabolic priorities among key protistan taxa within and below the euphotic zone. *Environmental Microbiology*. doi:10.1111/1462-2920.14259.
3. **Alexander H**, Rouco M, Haley ST, Wilson ST, Karl DM, Dyhrman ST. (2015). Functional group-specific traits drive phytoplankton dynamics in the oligotrophic ocean. *Proceedings of the National Academy of Sciences* 112:E5972–E5979. doi:10.1073/pnas.1518165112.
4. **Alexander H**, Jenkins BD, Rynearson TA, Dyhrman ST. (2015). Metatranscriptome analyses indicate resource partitioning between diatoms in the field. *Proceedings of the National Academy of Sciences* 112:E2182–E2190. doi:10.1073/pnas.1421993112.
5. **Alexander H**, Jenkins BD, Rynearson TA, Saito MA, Mercier ML, Dyhrman ST. (2012). Identifying reference genes with stable expression from high throughput sequence data. *Frontiers in Microbiology* 3:385. doi:10.3389/fmicb.2012.00385.

Other relevant publications

1. Johnson LK, **Alexander H**, Brown CT. (2018). Re-assembly, quality evaluation, and annotation of 678 microbial eukaryotic reference transcriptomes. *GigaScience*. doi:10.1093/gigascience/giy158.

2. Haley ST, **Alexander H**, Juhl AR, Dyhrman ST. (2017). Transcriptional response of the harmful raphidophyte *Heterosigma akashiwo* to nitrate and phosphate stress. *Harmful Algae* 68:258–270. doi:10.1016/j.hal.2017.07.001.
3. Harke MJ, Juhl AR, Haley ST, **Alexander H**, Dyhrman ST. (2017). Conserved transcriptional responses to nutrient stress in bloom-forming algae. *Frontiers in Microbiology* 8. doi:10.3389/fmicb.2017.01279.
4. Moniruzzaman M, Wurch LL, **Alexander H**, Dyhrman ST, Gobler CJ, Wilhelm SW. (2017). Virus-host relationships of marine single-celled eukaryotes resolved from metatranscriptomics. *Nature Communications* 8:16054. doi:10.1038/ncomms16054.
5. Dyhrman ST, Jenkins BD, Ryneerson TA, Saito MA, Mercier ML, **Alexander H**, Whitney LP, Drzewianowski A, Bulygin VV, Bertrand EM, Wu Z, Benitez-Nelson C, Heithoff A. (2012). The transcriptome and proteome of the diatom *Thalassiosira pseudonana* reveal a diverse phosphorus stress response. *PloS one* 7:e33768. doi:10.1371/journal.pone.0033768.

SYNERGISTIC ACTIVITIES

1. **Teaching / Outreach:** Lead instructor for Software Carpentry Workshops at WHOI (2015) and McMurdo Station (2018); Instructor and co-developer of Environmental Metagenomics Workshops held at UCSD (2016), UCD (2017), UCSC (2017), and Centro de Investigación Científica y de Educación Superior de Ensenada (2017); Mentor for ASLO Multicultural Program (2017)
2. **Fellowship Awards:** National Defense Science and Engineering Fellowship (2011-2014); National Science Foundation Graduate Research Fellowship (*declined*)
3. **Session Chair:** ASLO Aquatic Sciences Meeting (Honolulu, HI, 2017); SciPy (Scientific Python Computing) Meeting (Austin, TX, 2016)
4. **Reviewer:** NSF Career Award, NSF GRFP, NDSEG Fellowship, ISME Journal, Limnology and Oceanography, Journal of Phycology, Journal of Heredity, Environmental Microbiology, Moore Foundation
5. **Participation in Competitive Professional Development Programs:** UNOLS Chief Scientist Training Cruise (2019); NSF Antarctic Biology Training Program (2018); National Academy Keck Futures Initiative (NAKFI): Discovering the Deep Blue Sea (2016); Ecological Dissertations in the Aquatic Sciences (2016)