NOAA Milford Lab Renews Commitment to Microalgal Starter Cultures

Last year, the NOAA Fisheries Lab in Milford, Connecticut, hired a highly qualified permanent curator to maintain the microalgal culture collection, renewing its long term commitment to providing high quality microalgal cultures to industry and training on their use. The lab will continue this free service to the shellfish aquaculture industry following the retirement of Jennifer Alix, who maintained the culture for 25 years.



Culture Curator Lisa Guy joined the Milford Lab in September 2018 after ten years with the Horn Point Oyster Hatchery in Cambridge, MD, where she served as head algologist for the last four years. She holds degrees in biology and environmental science. Her role directly supports the shellfish aquaculture industry and research community: in 2018 alone, Milford sent out more than 375 starter cultures.

Lisa Guy, the new Curator of the Milford Microalgal Culture Collection. Taken by: George Sennefelder (NOAA Fisheries)

The Milford Microalgal Culture Collection is both a resource to

support shellfish research and an extension service. The lab provides starter cultures in vials with growing instructions to shellfish hatcheries, the commercial aquaculture industry, and the research community throughout the United States. The lab also convenes the Milford Microalgal Culture Workshop, which teaches participants to manage stock and production cultures, scale up cultures for feeding in the hatchery, and decide how much of each type of algae to produce to feed broodstock, larvae, and post-set shellfish. The workshop is free of charge, with participants responsible for their own travel. It has been on hiatus since Jennifer's retirement, but will resume in early 2020.

On her role, Lisa Guy said, "I'm excited for the opportunity to work closely with the aquaculture industry through providing quality starter cultures. I'm enjoying learning from and engaging with the Northeast shellfish community."

The Milford Microalgal Culture Collection, like the lab itself, has an illustrious history. The collection was first established by Dr. Robert R.L. Guillard in the mid-1950s and built by Dr. Ravenna Ukeles throughout the 1960s-1980s. Over 200 algal strains are currently archived, and the collection is kept in climate-controlled incubators and a "light room". Copies of all strains are perpetuated by periodic, serial subculture in three different media: enriched seawater, artificial seawater, and semi-solid media. This redundancy provides security in the event of equipment failures and other unforeseen challenges. The collection includes representatives from most of the major microalgal classes and essentially all strains used in aquaculture world-wide.

To learn more, please visit the Milford Lab's website: <u>https://</u> www.fisheries.noaa.gov/about/milford-laboratory

2019 NSA Student Research Awards

Congratulations to the student research awardees! These competitive grants provide \$1250 in support funding earmarked for student research projects as well as for the best student paper published in the *JSR*.

The George R. Abbe Award for student research recognizes a student's excellence in any research in the areas of crustacean biology and fisheries management. Winning this year was Jordanna Barley, Western Washington University, for his project entitled, "Exploring mechanisms underlying the range limit of a marine crab in a warming hotspot".





The **Melbourne R. Carriker Award** supports a student research project on any topic of shellfisheries. The 2019 Carriker Award was presented to Erin Roberts, University of Rhode Island, for her proposal entitled, "The role of apoptosis phenotype and gene expression in eastern oyster disease resistance".

The **Michael Castagna Award** for student research is an award devoted to the area of applied shellfisheries. Winning this year was Daniel Bowling, North Carolina State University, for his proposal entitled, "Research and extension in support of a stock assessment survey for oysters in North Carolina".





Judging of the **Sandra E. Shumway Award** for the Best Student Paper published in the *JSR* has specific selection and evaluation criteria: (1) The lead author must have been a student when the work was completed, (2) the paper must present the student's work, not that of a coauthor, (3) it will be evaluated on the quality of science and writing, and (4) the importance of

the work to the field of shellfish research. A panel of judges deliberated, and the award was presented to Daphne Cherel, University of Nante, for her manuscript:

Cherel, D. and Beninger, P. 2017. Oocyte atresia characteristics and effect on reproductive effort of Manila clam *Tapes philippinarum* (Adams and Reeve, 1850). *Journal of Shellfish Research*, 36(3): 549-557.

I wish to thank all the students for submitting their proposals as well as the reviewers for taking the time to evaluate each these proposals and student papers so thoughtfully.

Proposal are due annually by November 1st.

Start planning now! Details are available at www.shellfish.org.

Karolyn Hansen, Past-President

