



## Letter from the President

Dear SENEME Members,

It's finally here...SUMMER!!! Spring was mostly a no-go, so I'm super excited for summer weather and the return of everything that comes with it - beach days, ice cream, and all the animals that are returning to Long Island Sound for the summer.

All sorts of critters return from warmer climates. Striped bass, porgies, and ospreys are just a few examples of animals that migrate back to our shores in the spring. These annual migrations mean something special to me as I watch nature's ebb and flow in the seasons.

Speaking of migrating, you might have noticed that our annual conference keeps migrating, and there's a good reason for that. To better serve our members, we have been moving the conference to different venues to encompass the entirety of the area SENEME covers. This year our annual conference will be at the University of Rhode Island: Narragansett Bay Campus. We hope to see all you there! See more details about it in this newsletter.

I hope you all have a productive and fun summer

Thanks!  
Meg



## Call for Nominations

The SENEME Nominating Committee is seeking candidates for the following SENEME Board positions: Recording Secretary, Membership Secretary and Chapter Representative. The Nominating Committee invites SENEME members to submit qualified names for consideration. All positions are for 2-year terms beginning in October 2019.

Please contact Andrea Gingras, Nominating Committee Chair, at [agingras@uri.edu](mailto:agingras@uri.edu) for more detailed information about each position and to submit nominations.

<b>In this Edition:</b>	
SENEME Board/Nauplius Notations.....	2
Fall Conference - Save the Date .....	3
Science Fair Winners .....	3
NMEA 2019 .....	4
Quahog Bowl .....	5
Sound Notes from the Water Column ..	6
General Announcements.....	8
SENEME Awards, Dates, Organizations.	9

## SENEME Board of Directors & Committee Members 2018-2019

### President

Megan Strand, New England Science & Sailing

### Vice President

Donna Dione, Children's Museum of SECT

### Chapter Representative

Valerie Cournoyer, Amity High School

### Treasurer

Julie Ainsworth, Bauer Park

### Membership Secretary

Donna Dione, Children's Museum of SECT

### Recording Secretary

Amy Gollenberg, Mystic Aquarium

### Members-At-Large

Katrina Barrett, Mystic Aquarium  
 Amy Ferland, Marine Science Magnet High School  
 Andrea Gingras, URI Inner Space Center  
 Amy O'Neal, JASON Learning  
 Diana Payne, Connecticut Sea Grant  
 Nina Quaratella, NAMEPA  
 Nicki Rosenfeld, The Maritime Aquarium at Norwalk  
 Maryann Scholl, URI Office of Marine Programs

### Webmasters

Donna Dione  
 Megan Strand

### Newsletter Editor

Donna Dione

### Editorial Assistants

Julie Ainsworth  
 Katrina Barrett

### Development Committee

Andrea Gingras, Chair  
 Maryann Scholl

### Membership & Public Relations Committee

Maryann Scholl, Chair  
 Julie Ainsworth  
 Donna Dione

### Nominating Committee

Andrea Gingras, Chair  
 Katrina Barrett

### Scholarships & Awards Committee

Amy Ferland, Chair

## SENEME LIFE MEMBERS

*2003 Mickey Weiss*  
*2004 Thaxter Tewksbury*  
*2005 Ralph Yulo*  
*2006 Elizabeth Gibbs*  
*2010 Katrina Barrett*

## MARINE EDUCATOR OF THE YEAR

*2005 Lance Arnold*  
*2006 Matt Schardt*  
*2010 Vicky Sawyer*  
*2011 Joseph Hage*  
*2012 MaryEllen Mateleska*  
*2012 David Bednarz*  
*2014 Michael O'Connor*

## **Nauplius Notations**

*By Donna Dione, Editor*

I have a confession to make. While I know some of our SENEME friends had teams competing in the Regional SeaPerch Competition in CT this spring, I was actually rooting for a team from the Southern Berkshires. My cousin was competing on that team, and they ended up placing third! For me, they truly represent why I still enjoy being an informal educator. If my cousin, who lives on a dairy farm many miles from the ocean and attends a regional school in rural America, can take advantage of the opportunity to participate in a competition where they build an ROV, and proceed to place 3<sup>rd</sup> out of 50 teams, then I feel we really are making a difference with our youth in this country. Often the bureaucracy may seem overwhelming these days, but every little step forward we take really is having an impact somewhere - even on a farm in Sheffield, MA!



**SAVE THE DATE!**

**SENEME Fall Conference &  
Annual Meeting**

**Saturday, October 19, 2019**

University of Rhode Island  
Narragansett Bay Campus

Panel discussion, workshops, field trips,  
silent auction and more!

*Interested in presenting? Submit a session at*  
<https://tinyurl.com/SENEME2019>.



## **WINNERS OF SENEME SCIENCE FAIR AWARDS**



This spring, SENEME presented awards to students at the Connecticut and Rhode Island State Science Fairs. There were two winners from each state with all four receiving a prize of \$100, a SENEME T-shirt and a one-year SENEME membership for them and their science teachers. The Connecticut winners were Julianna Milidantri of Sacred Heart Academy who won the Senior Award for her exhibit, "The Effect of Sucrose on Inhibiting Photosynthetic Pigments Found in Invasive Arctic Ice Algae," and Nell Grant from Amity Middle School who won the Junior Award for the project entitled, "Purifying Grey Water Using a Constructed Wetland." In Rhode Island, Sinead Monaghan from Barrington High School won the Senior Award for the exhibit, "How Environment Impacts Physical Characteristics of Deep Sea Fish," and Daniel Vittoria from Our Lady of Mount Carmel in Bristol, RI won the Junior Award for his project, "It All Goes Down the Drain." The SENEME Board thanks Becky Hirsch and Julie Ainsworth for judging in Connecticut and the RI Science Fair Awards Committee for providing judging in Rhode Island.

**Congratulations to all the winners!!**

## NMEA 2019 Annual Conference JULY 21-25, 2019 • DURHAM, NH Learning from Yesterday, Adapting for Tomorrow



The NMEA 2019 Conference Committee is excited to host NMEA members at our annual conference at the University of New Hampshire in July. We have a fantastic venue to host the conference; UNH was just ranked the second coolest school in the country by the Sierra Club! This recognition celebrates UNH's national leadership in sustainability and its commitment to protecting the environment, addressing climate issues, and encouraging environmental responsibility.

As you've come to expect, this NMEA conference will offer a variety of opportunities. During the day, attend a full program highlighting the latest trends and research in marine education. Learn about how, over the course of a decade, the Gulf of Maine warmed faster than 99% of the global ocean, and how local researchers and policy makers are addressing this. Then, in the evening, explore both Portsmouth, NH (one of the nation's oldest cities, filled with vibrant restaurants and shops to explore) and Rye, NH,

(home to the Seacoast Science Center, where we will be enjoying a full lobster bake).

Complete your conference experience by exploring the beauty of New Hampshire and Maine on one of our field trips. Anticipated trips include visits to Shoals Marine Laboratory, kayaking in our Great Bay, a whale watch cruise, tours of the Portsmouth Naval Shipyard (established in 1800 and still operational today), and sampling cuisine from the New England culinary scene.

### Help SENEME stand out at the NMEA 2019 Conference! SENEME Chapter Basket Donations Needed

Our Chapter Representative, Val Cournoyer, is headed to the NMEA Annual Conference in Durham, NH. As part of the fun, NMEA Chapters provide raffle baskets and ours will feature all things "SENEME." The idea is to showcase our members' organizations and feature products from Connecticut and Rhode Island. Feature your school or organization by donating some items. If you have a favorite product from CT or RI, please consider donating it for the basket. Items may be specialty foods, area wines, honey, maple syrup, teas or coffee, and ocean-themed items. If you think some area artists might like to showcase their products, ask them if they would donate an item and provide their business card. Please contact Valerie Cournoyer at [cournoyerdv@gmail.com](mailto:cournoyerdv@gmail.com) for drop off or mailing arrangements before June 30, 2019. Thank you in advance for your help!

# Science and Technology Magnet HS of SE CT Wins 2019 Quahog Bowl

*By Diana Payne, CT-RI Regional Coordinator (RC), Connecticut Sea Grant*

On Saturday, February 2, sixteen teams from Connecticut and Rhode Island participated in the 2019 Quahog Bowl at the University of Connecticut's Avery Point campus in Groton. The Quahog Bowl is one of more than 20 regional competitions of the National Ocean Sciences Bowl (NOSB) taking place across the country each winter. The inaugural NOSB was held in 1998 in conjunction with the International Year of the Ocean. The competition is intended to increase knowledge and awareness of ocean and aquatic systems for high school students, their teachers and parents. The NOSB also strives to raise the visibility and public understanding of the national investment in ocean-related research. The competition is a round-robin/single- or double-elimination format for teams of high school students consisting of four students, one alternate and a coach. The format involves a timed competition of multiple-choice, short-answer and team challenge questions within the broad category of the oceans/water. Questions are drawn from the scientific disciplines (e.g., physics, chemistry, geology, atmospheric science, biology) as well as technology, economics, history and policy as related to ocean/water topics.

High schools participating in the 2019 Quahog Bowl included Bacon Academy, Bridgeport Regional Vocational Aquaculture, Coginchaug Regional (RD #13), Cranston East, E. O. Smith, Glastonbury, Ledyard, Marianapolis Prep, Narragansett, Norwich Free Academy, Science and Technology Magnet, Waterford, and Woodstock Academy. Following nine rounds of exciting competition, Science and Technology Magnet defeated Glastonbury High School. Prizes were awarded for Sportsmanship (Coginchaug) and performance in the Team Challenge Questions (E. O. Smith). Congratulations to all teams on an outstanding day, and a special thank you to our amazing volunteers, sponsors, and donors!

As a result of their Quahog Bowl victory, Coach Chuck Mulligan and the Science and Technology Magnet team represented the CT-RI region at the national competition in Washington, D. C. from April 11-14. The first day, the team, coach, and RC enjoyed a tour of the U.S. Capitol, scheduled via Senator Christopher Murphy's office. The team also participated in field trips and other finals related activities before focusing on the competition. After the round-robin matches, Science and Technology Magnet stood in 14th place of the 16 teams moving on to double elimination. Following some exhilarating matchups, the team finished in 8th place! Please join me in congratulating them on an outstanding performance in their first national competition!

In order for a regional or national competition to run smoothly, considerable preparation and support is necessary. More than 100 volunteers are needed to serve as moderators, science judges, rules judges, timekeepers, scorekeepers, and runners. Donations are solicited from many entities and include food services, chocolate quahog pops, pens, pencils, bags, and monetary support. At the conclusion of the competition, awards are presented, coaches receive gifts, and items are raffled off to participating team members. Donations to help defray the cost of the competition are ALWAYS welcome.

The 2020 CT-RI regional will take place on Saturday, February 1. The event is sponsored by Connecticut Sea Grant with significant support from the Consortium for Ocean Leadership and the University of Connecticut-Avery Point. Additional sponsors have included Rhode Island Sea Grant, UConn Bookstore, UConn Admissions, Mystic Aquarium, Mystic Seaport - the Museum of America and the Sea, Williams-Mystic Program, Sea Education Association, URI Graduate School of Oceanography, URI Office of Marine Programs, URI Inner Space Center, Audubon Society of Rhode Island, Connecticut Science Center, UConn Jorgensen Center, Bushnell Center for Performing Arts, Dave and Buster's, Leave only Bubbles, Rose Farm Inn, Interstate Navigation Company, Mystic Whaler, Sweenor's Chocolates, New England Science and Sailing Foundation, SENEME, NMEA, Big Y, Save the Bay, Project Oceanology, Sky Zone, and Quester's Way. To participate as a coach/team, as a volunteer, or contribute in-kind or monetary donations, please contact Diana Payne at [diana.payne@uconn.edu](mailto:diana.payne@uconn.edu).



The Science and Technology Magnet High School team at the National Ocean Sciences Bowl, left to right, was comprised of Aidan Desjardins, Derek Raymond, Christopher Bowens, Alex Matthews and Coach Charles Mulligan.  
*Photo courtesy of Charles Mulligan*

\*\*\*\*\*

## SOUND NOTES FROM THE WATER COLUMN

*By Joseph Hage, Bacon Academy*

Teaching has become easier.

I have had the opportunity to experience teaching over three decades, and much about the profession has evolved in that time. The craft of teaching is the same: Connecting with students, knowing the content, and conveying curricular concepts has not changed. However, we have gradebook programs that calculate grades, and post progress for parents and students as quickly as we can enter them. Communication is accomplished with the greatest of ease due to embedded messaging in the grading programs, as well as emails. Phone numbers, profiles, demographics and “stranger dangers” are readily accessible on attendance spreadsheets. Students and parents have instantaneous access to every aspect of their educational development, including 504 plans and special ed IEPs. Teachers can employ websites, Google classroom, Wiki, Weebly, Edmodo, Blackboard, and a myriad of online tools to relate, communicate, and delineate. We can post assignments, review guides, syllabi, ancillary tools and supplementals from the text. For every subject, there is a website of teaching tutorials and resources such as Khan Academy, Bozeman, Handley, and Wolfram, as well as instructional YouTube teaching videos. There are even programs that will check student work for plagiarism or copying, not to mention Word and Google Docs’ ability to mark for spelling, punctuation, font, and margin foibles. There are numerous worksheets, labs, video guides, entire course syllabi, and just about anything that you would print, tape or otherwise hand to a student. There is so much that teachers no longer must perform to accomplish the task at hand.

Gone are the days of hand writing or using a typewriter to craft a worksheet, run on the “Spiritmaster” and handed out to students, still wet and fuming of aromatic hydrocarbons.

Gone are the days of grades laboriously scribed by hand into a ledger, calculated, weighed statistically, and analyzed for mean, median, and mode.

Gone are the days—and nights—of hours prepping for a lecture.

Gone are the days of collecting bugs, algae, and all the flora and fauna that you could stuff into a jar of formaldehyde.

Gone are the days of scratching on a blackboard with chalk, only for the etchings to be erased and drawn again the next period...seven times a day.

## SOUND NOTES FROM THE WATER COLUMN-Continued

Gone are the days of placing slides in order, right side up, and facing the correct direction into the slide projector tray, and no more writing on the overhead projector with dry erase markers and wiping away only to fill the screen again.

Gone are the days of using reel to reel movies that had to be threaded through the projector, or the little film projector with the plastic can of 35mm film that had to be coordinated with the recording on a tape machine...BEEP!... another slide to be advanced.

Gone are the days taking pictures of students working on their projects, waiting a week for the pictures to develop and then driving to the photoshop to pick them up and making a slideshow or poster presentation.

Gone: Punch card multiple choice correction tools.

Gone: Hand-scripted letters of recommendation.

Laboratory reports, research papers and essays would take weeks to correct, edit for grammar, spelling, punctuation, as well as content, before returning for revisions that would be corrected again. Two reports a quarter would be typically the goal, sometimes taking months of combined effort to complete the editing process. Many times, the process dragged, and the end of the quarter would approach. Students who did not perform well or did not hand in the report would receive a grade that caused their quarter average to plummet. With the advent of online grading programs and instantaneous grade access, teachers are pressured to complete the correcting and editing process at dizzying speeds. If one is not careful, an encumbered slot in the digital ledger would scream “incompleteness by the teacher,” demanding immediate attention. The old style of editing, returning the draft, correcting again, and then entering the final grade becomes untenable. As a result, assignments become “chunked” and smaller. Feedback is truncated, editing occurs in snippets, and fast feedback (followed by lightning-quick grade entries) is encouraged. Students take less time to cut and paste reports than it does for teachers to assess them.

Flipped classes, modeling techniques, Design Thinking, Self-Learning, Personal Learning, Project-Based Learning, Place-Based Education, Formative Assessment, Maker Education, Gamification, Social Media, all are suggested better techniques supplanting what is now called “direct instruction.” Many of these “new” techniques are based upon good teaching practices of old – however, with new jargon assigned. Miniscule changes and slight nuances as added descriptors supposedly make these techniques earth shattering improvements, ones that warrant new educationese vocabulary to describe them.

No longer “Sages on the Stage,” we are now defined as “Guides on the Side.”

Flipped classrooms involve videotaping yourself performing a lecture or assigning a Khan academy lecture or the equivalent, and then monitoring the classroom to observe students’ progress and to toss out tips like orts of manna from heaven.

So why do I feel like I have so little time?

How was I able to do all those things back in the day, and still had time to be creative?

No mystery here: We are dumped upon by state and local administrations to develop all of our convoluted lesson plans by connecting them to school initiatives, curriculum director initiatives, town mission statements, state and national common core mandates—all with their own formats, language, and directives (none of which has any impact on the actual lesson to be taught). Each then must be demonstrated through contrived data collection. Data. Data. Data is the culprit. The attempt to quantify, justify, clarify, and plot student growth. So, what was once time spent creating hands-on, minds-on lesson planning has now been taken up by creative writing prompts in justifying the assessment of the assessment. I have become the master of fiction writing.

With all the “advances” in teaching, students beg me to “teach” them. At first, I was puzzled; what did they think I was doing? After a bit of digging I discovered that they were asking for what is called direct instruction. Stand and deliver a body of information, without PowerPoints, nor wiz nor bang of technology...just *teach*.

The irony can be that lecturing, when performed correctly, is harder.



## Horseshoe Crab Citizen Science Walks! June 15 from 6-9pm

Head to the beach and witness these “living fossils” gather during our nighttime Family Horseshoe Crab Watch. You can also help Mystic Aquarium and Denison Pequotsepos Nature Center staff count the animals for annual data collection and learn about the role they play in our local ecosystem. Be prepared to get wet feet and hike between 3-4 miles on along the beach. Cost is \$5 per person. Advanced registration is required, and all event links can be found here. <http://www.mysticaquarium.org/events/>

Saturday, June 15, 6:00pm-9:00pm; Bluff Point State Park, Groton, CT  
Click here to register - <https://horseshoecrabwalk.eventbrite.com>



## Climate Change in the Classroom Professional Development Workshop

August 8, 2019, 9:00am-3:30pm at The Maritime Aquarium

Teachers in grades 6-12 (Free to all, stipends to some)

Join Aquarium educators and regional experts for a comprehensive workshop on teaching the #1 environmental challenge of our time: Climate change! Dive into the latest climate science and learn how climate change fits into the NGSS. Plus, discover best practices for engaging with skepticism, teaching climate through lenses of environmental justice and resilience, and handling emotional responses to this challenging topic. You'll come away armed with activities, data visualizations, local contacts and more resources for building or enriching your curriculum. Workshop support is provided by NOAA's Environmental Literacy Program and registration is free to all 6th-12 grade teachers. Teachers in Norwalk, Bridgeport, Greenwich, Fairfield, New Canaan, Stamford, Darien, Westport, Wilton, Weston, and Stratford receive a \$100 stipend for participation. For more information or to register, contact [abunge@maritimeaquarium.org](mailto:abunge@maritimeaquarium.org).

## From Roots to STEM: Science, Technology, Engineering, & Math for Early Childhood Professionals - August 9, 2019, 8:30 - 3:30 at The Maritime Aquarium at Norwalk

*"Participation in STEM activities helps students to develop problem-solving, inquiry and critical-thinking skills. In this workshop, preschool teachers will discover how to use the natural world to incorporate early STEM concepts into their curriculum. Teachers will get hands-on training in critical areas including STEM teaching techniques for early childhood, how to integrate STEM with other subjects, and the key STEM standards that every preschool teacher should know. Since 2016, The Maritime Aquarium has been a founding partner in the Maritime Odyssey Preschool, a marine-themed, STEM-oriented full-day preschool serving more than 200 children in South Norwalk. This workshop will be based on the curriculum our educators have implemented and the lessons we've learned over the past three years."*

Register Here: [From Roots to STEM](#)

## NOMINATIONS SOUGHT FOR SENEME AWARDS

Would you like to recognize a fellow SENEME member for their contribution to marine and aquatic science education? Nominations are being accepted for the awards below. Further information can be found at: [SENEME.org](http://SENEME.org) > Grants & Awards. Submission Deadline for both categories is September 1, 2019.

**SENEME Marine Educator of the Year:** For effective and innovative teaching, and/or distinguished performance by either a classroom teacher or professionals who are not classroom teachers. This nomination requires completion of a nomination form and a letter of recommendation from at least one active SENEME member. Recipient receives one-year membership to SENEME and registration to the annual Fall Conference.

**SENEME Life Member:** Life membership is the highest recognition the Association offers and is reserved for those individuals who have demonstrated a distinguished career in teaching, research or service in marine education. This nomination requires completion of a nomination form and letters of recommendation from at least three active SENEME members. The Awards Committee will present its recommendation to the SENEME Board for consideration. Upon endorsement by the majority of the Board, the successful nominee shall be declared a Life Member and will receive lifetime membership in SENEME.

## SENEME Dates to Remember

June 2019 - Board Meeting, URI, Narragansett Bay Campus, 4:00-5:30 p.m. Date TBD

July 21-25, 2019 - NMEA Conference, Durham, NH

October 19, 2019 - SENEME Fall Conference & Annual Meeting, URI, Narragansett Bay Campus

Please contact SENEME President, Megan Strand, at [mstrand@nessf.org](mailto:mstrand@nessf.org) or Vice President, Donna Dione, at [donnadione@comcast.net](mailto:donnadione@comcast.net) to confirm finalized event times and locations or to obtain the phone number for conference calls.



## THANK YOU TO OUR SENEME ORGANIZATIONAL MEMBERS FOR THEIR SUPPORT!!



MYSTIC  
AQUARIUM



*The Nautilus* is the newsletter of the Southeastern New England Marine Educators Association Inc. (SENEME). Submissions including (but not limited to) articles, activities to share, student projects, pictures of SENEME members in action, recipes, and other organization's announcements are welcome for all issues. The opinions expressed by authors published in this newsletter do not necessarily reflect the views of SENEME and all its Board members. SENEME is not responsible for any typographical errors that may occur within this publication. Permission is granted by SENEME for readers to make copies of newsletter items for their own, non-commercial use.