



RARGOM

REGIONAL ASSOCIATION FOR RESEARCH ON THE GULF OF MAINE

2012 RARGOM Annual Science Meeting

The Regional Association for Research on the Gulf of Maine (RARGOM)
is holding its annual science, the theme of the meeting is:

Will the Gulf of Maine yield more or less seafood in the future, ideas from the physical environment and lower trophic levels?

The 2012 RARGOM Annual Science Meeting will be a session where Gulf of Maine physical and biological oceanographers will be asked to interpret what they are seeing among the varied signals of physical forcing and lower trophic level response, and challenged to inform the community on how upper trophic level organisms have responded and may react in the future.

Tuesday, October 9, 2012

[Portsmouth Harbor Events & Conference Center](#)

100 Deer Street, Portsmouth, New Hampshire

The one day meeting will feature three keynote speakers:

William Cheung

University of British Columbia Fisheries Centre

Shrinking of Fishes Exacerbates Impacts of Global Ocean Changes on Marine Fisheries

Both theory and empirical observations suggest that warming and reduced oxygen will reduce maximum body size of marine fishes and invertebrates. However, the extent to which such changes would exacerbate the impacts of climate and ocean changes on global fisheries remains unexplored. Here, using models that integrate ocean biogeochemistry and biological responses to environmental changes, I suggest that warming and ocean deoxygenation are expected to lead to decreases in maximum body size and changes in other life history characteristics of exploited fishes at both individual and community levels. Changes in body size interacts with expected changes in species distribution and ocean productivity, exacerbating the effects of climate change on fisheries resources. These highlight the need to consider body size changes in assessing and managing climate change impacts on fisheries.

Jon Hare

Northeast Fisheries Science Center, National Oceanographic and Atmospheric Administration

Pursuing Hypotheses and the Future of Fisheries Oceanography

Fisheries oceanography is largely an applied discipline with a major goal of improving fisheries management and marine conservation. Hjort's critical period hypothesis, and its decedents, remain a dominant theme and focuses on early life stage survival as mediated by prey availability and feeding. A second hypothesis focuses on the sequential transfer of energy from primary productivity to fishery productivity. Three recent hypotheses challenge these traditional bottom-up hypotheses: predation of early life stages, maternal condition, and shifting migration pathways. Regional support for these hypotheses will be reviewed and their implications to fisheries management and marine conservation will be described. It is important that these recent hypotheses continued to be pursued and tested. The results must then be integrated into current and future assessments and management decisions.

Andy Pershing

University of Maine School of Marine Sciences and the Gulf of Maine Research Institute

**Using Climate Variability to Diagnose How
Marine Ecosystems Work and How They Will Change**

Ecological experiments are notoriously difficult to perform on planktonic communities due to the large scale and open nature of the ocean. However, climate variability alters the physical environment on scales large enough to affect multiple ecosystems simultaneously. By comparing how similar ecosystems respond to similar forcing, we can begin to diagnose how physical and biological processes interact to structure these systems. Relationships between plankton community changes and stratification provide a clear indication of how these communities will respond to a warmer and fresher North Atlantic.

The meeting is intended to be of general interest to a broad range of researchers, managers and stakeholders in the Gulf of Maine region.

If interested in presenting a contributed talk or poster on new, old or developing research, please follow the format requirement attached and submit to Lynn.rutter321@gmail.org by Wednesday, September 5th

The format for submitting an abstract is below (pg2)

The Registration period (for the October 9th meeting) is:
August 15th – September 30th

Registration fees are \$45 for participants from RARGOM member institutions and \$60 for non-members. Student registration is \$30
Lunch will be provided

Abstract Submission Format

The Regional Association for Research in the Gulf of Maine (RARGOM)

Dates:

- September 5th Deadline for Abstracts to be received
The e mail subject line should read First initial, Last name, RARGOM abstract
An e mail confirmation will be sent when the abstract is received.
Please follow the format requirements below to avoid further editing and resubmitting.
- September 14th Notification of paper or poster acceptance
- September 30th Last day to register
- October 9th Talk or Poster presentation RARGOM annual science meeting

Please include the following in this order:

First Name, Last name
Affiliation
E mail address

Please specify oral / poster / either

Submission Title
Authors
New Times Roman, 12 font, 400 words maximum,
Save and send as a Word doc

E mail:

Subject line: First initial, Last name, RARGOM abstract
Send: Word file to: lynn.rutter321@gmail.org