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Department of Marine Sciences
Presents a Seminar by

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Data Constraints on Glacial Atlantic Water Mass Geometry and Properties

The chemical composition of benthic foraminifera from marine sediment cores provide critical information on how glacial subsurface water properties differed from modern, but it is difficult to separate the influence of changes in the origin and properties of waters to the ocean's interior from changes in subsurface flows and mixing. Spatial gaps in the coverage of glacial data add to the uncertainty. New glacial data from cores collected from the western tropical North Atlantic, including several cores within the modern tropical phosphate maximum at Antarctic Intermediate Water (AAIW) depths, suggest lower phosphate within the phosphate maximum than modern despite similar carbon isotope values, implying less accumulation of respired nutrients and carbon, and reduced air-sea gas exchange in the source waters to the region. Modern and glacial data inversions help explain why these changes occurred.

Host: David Lund
Time & Date: 11:00 am, Friday, May 3, 2019
Place: Marine Sciences Building, Seminar Room 103

If you are an individual with a disability and need accommodations, please contact 860-405-9152, 860-405-9087, or marinesciencesseminars@uconn.edu.