Since 2001, the American Meteorological Society (AMS) has initiated course implementation at minority-serving institutions (MSIs) through NSF-supported Geoscience Diversity/National Dissemination Projects. Most recently, AMS received funding to introduce and enhance geoscience and/or sustainability-focused course components at MSIs through the AMS Climate Studies Diversity Project. Success with this Project led to collaborations with other institutions/organizations, allowing AMS to bring geoscience course work to more students, strengthening the pathway towards advanced geoscience study and careers.

AMS CLIMATE STUDIES DIVERSITY PROJECT

- NSF-funded for 5 years (2011-2016)
- Introduced/enhanced geoscience and/or sustainability focused course components at MSIs that are signatories to the American College & University Presidents’ Climate Commitment (ACUPCC) and/or members of the Louis Stokes Alliances for Minority Participation (LSAMP)
- Partnered with Second Nature to recruit signatories
- Introduced AMS Climate Studies to 101 faculty representing 90 MSIs
- Via a NSF no-cost extension, a 5th course implementation workshop will be held in May 2017

AMS CLIMATE STUDIES COURSE MATERIALS

- Course materials include: (e)textbook, (e)Investigations Manual, RealTime Portal, faculty website, and faculty resources
  - Textbook: covers the fundamental science
  - Investigations Manual (IM): demonstrates textbook concepts using real-world data
  - RealTime Portal: offers weekly news and activities with data for contextual learning; scholarship and career information for students
  - Faculty website: provides a secure location for answer keys that integrate with course management systems
  - Faculty resource materials: includes PowerPoint presentations for each chapter, textbook image files, test bank questions and answers, and a faculty manual with learning objectives and a guide to offering the course
- Textbook and IM offered in new webBook format
- Draws heavily from recent IPCC and National Climate Assessment reports
- Can be taught in traditional lecture/lab setting, completely online, or anywhere in between

MSI-REaCH

Reconstructing Earth’s Climate History

- NSF-funded for 3 years (2015-2018)
- Collaboration with Consortium for Ocean Leadership and 7 other institutions/organizations
- Provides substantive professional development for MSI faculty and serves to enhance research-type experiences for students at participating institutions
- Focuses on paleoclimate data gained through ocean sediment cores

SCHOOL OF ICE

- Lockheed Martin-funded
- Partnered with the U.S. Ice Drilling Program Office (IDPO) at Dartmouth College
- Focuses on paleoclimate study through examination of the ice core record