## February 2017 Brings Two Atmospheric Research Cruises in the Southern Hemisphere

## Punta Arenas, Chile (February 11, 2017)

Dr. Vernon Morris and a team of 11 colleagues and students from the US and Senegal departed from the southern tip of Chile for a unique research mission. The endeavor will be conducted in partnership with eight other scientists from the National Oceanic and Atmospheric Administration (NOAA); scientists from the Atlantic Oceanic and Meteorological Laboratory (AOML); as well as scientists from the National Environmental Satellite Data and Information Service (NESDIS). Dr. Morris will lead two separate research efforts. The first is a short research cruise starting in Punta Arenas, Chile and ending in Montevideo, Uruguay.

The shorter campaign is a pilot study to investigate the atmospheric microbiome – the microscopic biological components of the gaseous envelope surrounding the Earth. The cruise path will initially travel through the Drake Passage, and then move northwards from the Southern into the Atlantic Ocean; while searching for evidence of airborne invasive species and characterize the exchange of pollutants to regions designated as <u>marine protected</u> areas (MPAs), within the ocean regions surrounding the southern tip of South America.

The second leg, also in the Southern Hemisphere, is the annual <u>AEROSE</u> cruise; a 41- day effort beginning on February 18 departing from Montevideo, Uruguay and ending in Charleston, SC on March 27.

The AERosols and Ocean Science Expeditions (AEROSE) are a series of research campaigns designed to explore the influence of African air masses on climate, weather, and environmental health over the tropical Atlantic Ocean and in the Americas. These research campaigns began in 2004, and have been conducted annually since 2006 aboard various research vessels.

Over 50 students have participated in these missions – many experiencing the open ocean for the first time. The Chief Scientist of AEROSE is Howard tenured Professor, Dr. Vernon Morris, and Director of the Atmospheric Sciences program. AEROSE is sponsored by NOAA and conducted in collaboration with NOAA scientists, as well as faculty from a variety of US and international academic institutions.

Both legs of this year's research cruise will involve a contingent of Howard University graduate students, undergraduate from multiple institutions, postdoctoral fellows, and HU alumni. Dr. Morris is committed to ensuring that the next generation of scientists addressing global environmental challenges includes African American, Native American, and Latino students.