**Chesapeake Student Recruitment, Early Advisement, Mentoring (StREAM) Program**

**Chesapeake Research Consortium**

**About**

The Chesapeake Research Consortium is a regional consortium of 7 institutions leading biological and marine related research across the Chesapeake Bay Watershed. The vision of the CRC is to fully enable its member institutions and the broader scientific community in the region to contribute effectively toward better understanding and management of Chesapeake Bay and its watershed.

Chesapeake Summer Research – Since 2018, the Chesapeake Research Consortium has encouraged students from groups traditionally underrepresented in the natural sciences, engineering and mathematics to pursue research careers in the academic, public and private sectors. The Chesapeake Student Recruitment Early Advisement and Mentoring (Chesapeake StREAM) Program is a fully paid summer internship that provides undergraduate/graduate students of diverse or underrepresented backgrounds with training, advisement and mentoring of the principles needed to prepare them to pursue competitive applications to biological, scientific and environmental science related PhD programs or move into professional career settings of environmental policy/natural resource management or non-profit management.

Chesapeake StREAM Program offers closely mentored research, policy or non-profit experiences in the biology, ecology, environmental studies, marine biology, natural resource management, environmental policy and non-profit project implementation at the 7 CRC research institutions, EPA’s Chesapeake Bay Program Office and the partners under the Chesapeake Bay Program Partnership’s umbrella.

**Mission Statement**

The mission of the Chesapeake Student Recruitment Early Advisement and Mentoring Program is to develop underrepresented students into outstanding leaders and role models in the fields of natural sciences, engineering and mathematics, with an emphasis on environmental science, marine ecology and environmental policy.

Specific Aims

1. Engage faculty and administrators at universities and colleges throughout the region in helping our consortium institutions to identify and recruit the most promising candidates with aptitude and interests in advance study and research relevant to Chesapeake Bay ecosystem issues.
2. Develop a summer-based program where a cohort of student researchers work with graduate students, faculty mentors and full-time staff of the environmental agencies/organizations under the Chesapeake Bay Program Partnership to gain experience, mentorship and support students to pursue a career in ecosystem science or management.
3. Provide continuing opportunities to the cohort of student researchers for ongoing exposure to research and follow on programs of mentorship, networking and support toward their continuing education and professional careers.

**Vision Statement**

By 2025, the Chesapeake Research Consortium will establish the Chesapeake Student Recruitment, Early Advisement and Mentoring (CsTREAM) Program to build a regional internship program dedicated to increasing academic/professional diversity in environmental science academia, natural resource management and environmental policy.

**Methods and Approach**

To engage with universities and colleges across the region and nation to recruit students with an interest in Chesapeake Bay issues. To engage and recruit, the following must occur:

* 1. Identify institutional coordinators at feeder institutions who will serve as liaisons between the potential student recruits and the host research institutions. (The institutional coordinator will hold a role at the feeder institutions including but not limited to a tenured professor, academic Dean or Administrative leader at the university.)
  2. Visit potential feeder institutions to present to students within the Natural Science and engineering Departments.

The Chesapeake Student Recruitment, Early Advisement and Mentoring Program will be a summer program that provides students with the opportunity to work on an existing research or management topic or create their own project with supervision from a research mentor. The following program will include:

2.1 Spend 8-10 weeks at a Chesapeake StREAM Program institution conducting research based on Chesapeake Bay related issues. This will include receiving a stipend, travel and housing expenses from the research institution.

2.2 Work under the guidance of a faculty, research, state/federal employee or non-profit employee mentor.

2.3 Gain theoretical knowledge and/or practical training in academic research, scientific experimentation, administrative government, or non-profit program/project implementation.

2.4 Undergo preparation to apply for graduate-level research programs with the cohort (GRE preparation classes, resume building, career mapping and public speaking courses.)

2.5 Concluding the program, present oral or poster presentations at the Chesapeake Symposium and any existing symposiums at the host institution.

To retain leaders and future role models in the academic fields of environmental science, environmental engineering and environmental policy, the following must occur:

* 1. Identify research mentors at host institutions who will train, guide, support and oversee the success of the students during their summer at the host institutions. These research mentors will also provide support to the students following the completion of the summer research program, with insight to identifying the most appropriate graduate school program.
  2. Allow students to gain access to ongoing resources to support their chosen career path.
  3. Provide students with mentor and peer networks.
  4. Ask that students who complete the Chesapeake StREAM Program to return to their home institutions prepared to recruit the next emerging leaders to participate in the following summer program.

**Potential Fields of Research**

Agriculture

Biology

Climate Change

Climate Resiliency

Ecology

Environmental Policy

Environmental Justice

Estuarine Ecology

GIS/Modeling

Habitat Management

Marine Biology

Marine Ecology

Natural Resource Management

Non-Profit Project Implementation/Program Management

Science Communications

**Broader impacts**

Goal 1-4

Goal 1: Develop a Prepared Talent Pool for the 21st Century Workforce

Goal 2: Expand the Cadre of New Doctoral Scholars within Environmental Science

Goal 3: Sustain Institutional Commitment to Diversity

Goal 4: Advance the Visibility and Reputation of the Consortium