



Sponsoring Scholars in Science Awards

Seedling Research Funding

Propose your ideas for engaging and inspiring students to pursue science, technology, engineering and mathematics (STEM). Funding will be provided for compelling K-12, higher ed and educational research initiatives designed to build student interest and awareness in the STEM disciplines.

Code 30

Topic: Incorporating Energy Efficiency Into Curricula Through Hands-On Experimentation

Objective: To develop and implement an energy efficiency plan for a school (or community building) as a challenge experiment that can be aligned to a physical sciences curriculum

Description: Energy efficiency is critical from both a fiscal and environmental standpoint. For the U.S. Navy and Marine Corps, power and energy requirements can create fiscal, logistical, system and program challenges.

Under this Sponsoring Scholars in Science Awards program, educators at the K-12 or undergraduate level would use the development and implementation of an energy efficiency plan for a school or community building to support learning objectives across the domains of physics, engineering, biological and behavioral sciences. Engaging students in STEM fields is often most effective with hands-on projects that produce observable changes. As part of an energy efficiency curriculum, students would establish baseline energy consumption for their schools, and develop and implement energy use reduction plans.

Curricula can be developed around measurement, energy, complex systems and behavioral (use) factors that impact use and risk mitigation. Exploring approaches to improving energy efficiencies will provide opportunities for addressing emergent technologies, risk/benefit analyses and biological and physical science and technology. Implementation of energy efficiency measures can supplement engineering, biology, physics and behavioral science curricula.

POC:

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