

NANOSCIENCE & NANOTECHNOLOGY MODULE FOR PRE-COLLEGE CLASSROOMS

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The NU-NSEC is dedicated to reaching out to students of all ages who might be inspired to become engineers or scientists. As part of this effort, the NU-NSEC initiated the development of a module in 2001 to introduce nanoscience and nanotechnology to pre-college students. The NU-NSEC was able to leverage the infrastructure established through the Materials World Module (MWM) program established in 1993 at Northwestern University.

The nanoscience module will supplement existing science and math curricula. It will utilize unique design challenges and a collaborative team approach, thus enabling students to make important connections between scientific theory and real-world applications. This new module will begin with a teacher demonstration to pique the interest of the students, followed by a series of activities and collaborative design projects. The module will meet goals consistent with the national standards for science education, help students develop inquiry skills, conduct a quantitative, hands-on laboratory investigation, and learn the societal impact of science and technology.



Visiting Boy Scouts from Troop #309 had opportunities to learn fundamentals of nanotechnology by testing hands-on activities of the NU-NSEC *Nanoscience & Nanotechnology Module*. The module is expected to be completed in 2006.