

NUCLEAR ENGINEERING, B.S.

Begin Campus: Any Penn State Campus

End Campus: University Park

Program Educational Objectives

Accordingly, we will endeavor to maintain and provide a curriculum that prepares our graduates such that:

- Within two to three years of graduation, we expect the majority of our B.S. graduates to:
 - be working in industry, especially related to nuclear power engineering,
 - be working in government agencies or national laboratories,
 - be pursuing advanced degrees.
- We expect that our students will continue to develop professionally and establish themselves in their careers and in this way may take the opportunity to further their education and training by attending graduate school or by pursuing other professional development.

Student Outcomes

Student outcomes describe what students are expected to know and be able to do by the time of graduation. The Nuclear Engineering program is designed to enable students to:

1. Identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics
2. Apply engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as well as global, cultural, social, environmental, and economic factors
3. Communicate effectively with a range of audiences
4. Recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts
5. Function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives
6. Develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions
7. Acquire and apply new knowledge as needed, using appropriate learning strategies.