

School of Engineering Construction Engineering, B.S.Cn.E.

Broad Learning Goals

The undergraduate program in civil engineering will:

- I. Prepare our graduates for successful professional practice or advanced study in construction engineering.
- II. Provide our graduates with a broad education as a foundation for professional licensure and life-long learning.
- III. Produce graduates with an appreciation for social, economic and ethical issues related to civil engineering.

Student Learning Outcomes

Construction Engineering graduates will demonstrate:

- A. An ability to apply knowledge of mathematics, science and engineering.
- B. An ability to design and conduct experiments as well as to analyze and interpret data.
- C. An ability to design a system, component or process to meet desired needs within realistic constraints such as economic, environmental, social, political, ethical, health and safety, manufacturability and sustainability.
- D. An ability to function on multi-disciplinary teams.
- E. An ability to identify, formulate and solve engineering problems.
- F. An understanding of professional and ethical responsibility.
- G. An ability to communicate effectively.

- H. The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and societal context.
- I. A recognition of the need for and an ability to engage in lifelong learning.
- J. A knowledge of contemporary issues.
- K. An ability to use the techniques, skills and modern engineering tools necessary for engineering practice.