

Civil Engineering

B.S. Program

The Civil Engineering (B.S.) is accredited by the Engineering Accreditation Commission of [ABET](#), under the commission's General Criteria and Program Criteria for Civil and Similarly Named Engineering Programs.

[Academic Program Information](#)

Program Educational Objectives (PEOs)

The Program Educational Objectives (PEOs) of the Civil Engineering (B.S.) are broad statements describing the expected accomplishments of graduates within a few years after graduation. These objectives are that graduates will:

1. Solves highly complex problems in civil engineering projects, utilizing cutting-edge technology in processes and procedures, while ensuring the appropriate application of regulations.
2. Manages innovation and scientific or technological entrepreneurship initiatives that generate value and improve their environment.
3. Stays updated on new trends or technologies to adapt to change.
4. Acts ethically and with social responsibility in the development of the community, promoting sustainability and generating social, economic, and environmental value.
5. Is a leader in a national or international environment, working with multidisciplinary or multicultural teams.

Student Outcomes (SOs)

By the time of graduation, students of the program will be able to demonstrate:

1. An ability to identify, formulate, and solve complex engineering problems by applying principles of engineering, science, and mathematics.
2. An ability to 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. An ability to communicate effectively with a range of audiences.
4. An ability to 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. An ability to function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives.
6. An ability to develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions.
7. An ability to acquire and apply new knowledge as needed, using appropriate learning strategies.