

Professional Aspects of Civil and Environmental Engineering

CIVILEN 2090

Credit Hours:

1.00 - 1.00

Course Levels:

Undergraduate (1000-5000 level)

Course Components:

Lecture

Course Description:

Topics in Civil and Environmental Engineering ethics and practice. Must be taken as soon as possible upon entering the major.

Prerequisites and Co-requisites:

Prereq: Enrollment in CivilEn or EnvEng major.

Course Goals / Objectives:

- Be well informed on major option areas, advising procedures, how to find an engineering job, undergraduate professional organizations, university Minor programs, and graduate school opportunities
- Recognize the importance of professional licensure by taking the FE exam in their senior year. Students will be familiar with exam coverage and OSU-CE results
- Be aware of general guidance given by the profession on a wide range of topics in engineering ethics
- Be familiar with terminology used and general guidance given by the profession on a wide range of professional practice topics

Course Topics:

- Introduction; term paper and reference sources; major options, program deadlines; graduate school, graduate assistantships; job search, ECS services; FE exam coverage, OSU-CEE results; ethics diagnostic exam; NCEES model rules; ASCE Code of Ethics.
- FE ethics review (codes of ethics; enforcement; whistleblowing; sustainable development; environmental ethics; competency; ASCE Policy 465)
- FE ethics review (competitive bidding; charging for services; resume/qualifications padding; advertising; criticism of other engineers; activity outside of work;
- FE Ethics Review (plan stamping; public comment; conflict of interest; receiving gifts; confidentiality; patents; moonlighting; duty to firm; political donation.)
- FE Ethics Review (professional development; liability; practice in a foreign country, and; dealing with suppliers; Alumni Ethics Survey results; diversity issues.)
- Qualifications-based-selection (QBS); competitive bidding for construction contracts; charging for services; project delivery systems; salary and grade descriptions, and; employment intangibles

Designation:

Required