Civil and Environmental Engineering

Solve Complex Global Challenges.

Course 1-ENG

Bachelor of Science in Civil and Environmental Engineering

Civil and environmental engineers strive to solve complex global challenges and improve the world in which we live. Their intellectual focus is on the human-built environment and the complex infrastructure systems that it entails, as well as the man-made effect on the natural world.

Civil and environmental engineers work to develop and apply pioneering approaches that range from basic scientific principles to complex engineering design, with a focus on translating these fundamental advances into real-world impact. They focus on five strategic areas: ecological systems, resources, structure and design, urban systems, and global systems.

Civil and environmental engineers design the structures we live and work in, protect our natural resources, the roads we drive on, develop new materials, and work to combat climate change.

DEGREE STRUCTURE

Course 1 provides students with a rigorous academic curriculum from renowned MIT faculty. The ABET accredited undergraduate program prepares students for careers in a range of sectors from non-profit, government, to private and technology startups.

The degree requirements are designed to allow students to explore the civil and environmental engineering discipline area that excites them the most. In addition to mastering the fundamentals, students can delve into one of three emerging core areas within civil and environmental engineering—Environment, Mechanics & Materials, or Energy, Transportation & Societal Systems—each offering specialized tracks for deeper exploration, along with hands-on labs and fieldwork classes.

Careers in CEE

With a degree in Course 1, students pursue careers in diverse fields such as energy and environment, engineering systems design, law, medicine, and public health.

Mechanics & Materials

- Leading Large Scale Projects
- Infrastructure Engineering
- Geomechanical Engineering
- Structural Engineering and Design Consulting
- Engineering Sustainable Materials and Structure

Environment

- Stormwater Management
- Air Quality Engineering
- Water Resources Engineering
- Conservation and Environmental Protection
- Sustainable Development
- Environmental Consulting

Energy, Transportation, and Societal Systems

- Supply Chains and Logistics
- Transportation Engineering
- Data Science and Analytics
- Autonomous Robotics
- Service Optimization
- Engineering Consulting
- Government or Corporate Research and Development

Learn more

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