Energy Engineering (M.S. or M.Eng.)

Accelerate your career and help design energy systems of the future with the world leader in energy-related research and education.

If you want to be on the forefront of one of the most exciting and growing engineering disciplines, a career in energy engineering might be right for you. As the world leader in energy-related research and education, you’ll benefit from one of the strongest programs you can find anywhere. If you want to maximize your professional opportunities, consider a Master of Science or Master of Engineering degree from UND.

Program Snapshot

Program type: Master's Degree
Format: On-campus or online
Est. time to complete: 1-2 years
Credit hours: 30

Why Study Energy Systems Engineering at UND?

Energy system expertise is what's needed to be able to effectively address some of today's hottest societal issues, such as climate change, rising energy costs and security issues. The future of sustainability and alternative energy relies on those with the education to solve a global shortage of energy.

UND is a world leader in energy-related research and education, so you'll benefit from a strong graduate program that will help you:

- Attain the design expertise today's global energy companies value, along with the ability to solve complex sustainable energy engineering problems.
- Become a proficient energy researcher, and participate in projects and experiential learning in areas of sustainable energy engineering.
- Get a broad-based education on integrating systems to allow the environmentally acceptable use of coal; renewable fuels and chemicals; the absorption and conversion of solar energy; the absorption and conversion of wind energy; geothermal energy conversion; hydrogen production, storage, distribution, and utilization; and other technologies.

M.S. vs. M.Eng.

UND offers both Energy Systems Master of Science (M.S.) and Master of Engineering (M.Eng.) degrees. It is recommended you connect with your advisor before making a final decision. However, in general, a M.Eng. program is more course-based, while the more popular M.S. program includes a thesis or research project/independant study.

Application Deadlines

FALL: Aug 1
SPRING: Dec 1
SUMMER: May 1

Program Highlights

- Develop a broad background in the technical, economic and societal factors needed to develop sustainable energy.
- Conduct research and development activities in sustainable energy fields, or pursue advanced studies in technologies that will provide sustainable sources of energy in the future.
- Participate in research conducted with the Institute for Energy Studies (IES) through our interdisciplinary Sustainable Energy Research, Infrastructure and Supporting Education (ND SUNRISE) research initiative, the Petroleum Research, Education and Entrepreneurship Center of Excellence (PREEC), or in collaboration with the Energy and Environmental Research Center.
- Customize your curriculum to meet your areas of interest, with an emphasis on sustainable energy engineering design.
- Gain the practical experience you need to succeed in a variety of energy-focused areas in top companies around the world.
- Flexible research experience allows online students to choose projects aligned with their company's needs.

Outcomes
Median salary for an energy engineer*

The top 25% in this field make a median salary of $77,000, not including potential bonuses, profit-sharing and commission benefits.

*U.S. Bureau of Labor Statistics

A Master of Science in Energy Engineering from UND can make you a very attractive candidate at today's biggest energy and energy-related companies in the world.

UND graduates can expect a range of job and occupations available to them. Many graduates have gone onto careers in top regional and global energy firms. Some typical jobs related to this degree include:

- Energy systems engineer
- Solar/renewable energy engineer
- Mechanical engineer (energy)
- Alternative energy system engineer
- Power systems engineer
- Energy management engineer