

ENGINEERING MANAGEMENT - MASTER OF ENGINEERING (ME) ONLINE

The Master of Engineering in Engineering Management (ME-EM) degree hosted online through the Coursera platform is a fully accredited master's degree. ME-EM on Coursera students earn the same credentials as on-campus students. There are no online or Coursera designations on official CU transcripts and diplomas.

The ME-EM is an excellent alternative to an MBA for engineers, scientists and technical professionals who want to move into management. The ME-EM prepares individuals for leadership roles within technology-driven industries. This highly multidisciplinary program integrates contemporary concepts of authentic leadership, organizational management and quantitative analysis to provide students the specific tools and knowledge to succeed in today's rapidly evolving business environment.

The program's core curriculum builds foundational skills in technical communication, project management, finance and leadership. Students then have the opportunity to dive deeper into subject of interest through a variety of elective courses including product development, technology entrepreneurship, systems engineering, innovation management and more.

Program Policies

This CU Boulder on Coursera program does not align with standard campus policies. Please refer to the Online Programs (<https://catalog.colorado.edu/online/>) section of the catalog for more information.

Program Requirements

The ME-EM on Coursera utilizes performance-based admissions for enrollment. There is no traditional application for admission to the degree. Students do not need to take the GRE or submit letters of recommendation or proof of language proficiency. Neither a prior degree nor university transcripts are required for admission. Because this is a purely online program, students do not need to complete a background check to enroll.

A student desiring admission to the ME-EM on Coursera must complete four required protocols:

1. Take one of the following two pathway specializations for credit:

- a. **Finance for Technical Managers (3 credit)**

Product Cost & Investment Cash Flow Analysis (1 credit)

Project Valuation and the Capital Budgeting Process (1 credit)

Financial Forecasting and Reporting (1 credit)

- b. **Project Management (3 credits)**

Foundations and Initiation (1 credit)

Project Planning and Execution (1 credit)

Agile Project Management (1 credit)

2. Achieve a computed pathway specialization grade-point average (GPA) of at least 3.00.
3. Have a cumulative GPA of at least 3.00 for all for-credit courses taken to date.
4. Declare their intent to seek the degree via the enrollment form, which they can do before, during, or after any work in a pathway specialization.

Upon completion of these four steps, the student is admitted to the ME-EM on Coursera. Students may successfully complete a designated pathway specialization and declare intent at any point in their academic journey. Completion of a pathway specialization is not required for students to begin earning academic credit, only to earn the degree.

Nondegree seeking students may enroll in for-credit courses. All courses attempted and/or completed for credit will appear on an official CU Boulder transcript (unless dropped by the drop deadline) and will count toward the cumulative GPA.

Prerequisites & Assumed Background Knowledge

There are no course prerequisites or corequisites for EMP courses on Coursera. Nevertheless, it is important that students are prepared for individual courses. Course descriptions will advise students of assumed incoming knowledge, and students are strongly encouraged to take course sequences in the order they are presented on the Coursera platform. Students are also encouraged to take a non-credit version in some form before moving to the for-credit version to test whether they can succeed, especially if they are unsure whether they have the background knowledge required for a course.

Course Requirements

The ME-EM on Coursera is a non-thesis degree that requires 30 credit hours of coursework. Students must complete the following 12 credits of core coursework and 18 credits hours of elective courses (any EMEA course (<https://www.colorado.edu/emp/coursera/curriculum/>) counts). Please note, 9 elective credit hours can be accepted from the CU Boulder on Coursera graduate programs.

Code	Title	Credit Hours
Core Courses		12
EMEA 5016	Communication as a Technical Leader	
EMEA 5017	Technical Managerial Written Skills	
EMEA 5018	Speaking to a Technical Group	
EMEA 5021	Product Cost and Investment Cash Flow Analysis	
EMEA 5022	Project Valuation and the Capital Budgeting Process	
EMEA 5023	Financial Forecasting and Reporting	
EMEA 5031	Project Management: Foundations and Initiation	
EMEA 5032	Project Planning and Execution	
EMEA 5033	Agile Project Management	
EMEA 5051	Leading Oneself with Self-Knowledge	
EMEA 5052	Leading Oneself with Purpose and Meaning	

EMEA 5053 Leading Oneself with Personal
Excellence

Elective Courses **18**

Any EMEA course, along with up to 9 credits from the CU
Boulder on Coursera graduate programs.

Total Credit Hours **30**

Learning Outcomes

By the completion of the program, students will be able to:

- Identify, explain and use engineering management concepts and theories.
- Analyze personal leadership awareness.
- Communicate effectively to technical and non-technical professionals.
- Evaluate the ethical and environmental implications of engineering and management practices.
- Analyze and design complex systems using multiple tools and systems.
- Interpret quantitative and qualitative data to make sound engineering and managerial decisions.
- Manage complex projects with a systems-approach.
- Understand the financial implications of engineering decisions.