



CAREER PROFILE

Engineering Project Manager

JOB OUTLOOK³

Engineering project management is projected to remain a stable as a well-paying career option within the industry. Exciting opportunities in the industry include helping to bring technologies such as artificial intelligence, automation, and robotic technologies, so individuals may be particularly competitive in this field if they develop expertise in these areas.

SALARY RANGE³

\$54,000–\$99,000

WHO ARE THEY?¹

An engineering project manager is a professional with advanced understanding of the engineering and mechanics of building modern ships who also has a knack for organization and planning. Project management is the practice of managing the development of a new product or service. Project managers are the ones responsible for ensuring that the project is completed on the assigned time line, within a given budget, and according to all requirements or specifications. They are passionate about making change and bringing something new and innovative to life. Any project manager must not only understand the technical requirements of a project but also have a view of the entire process. If you have an acute attention to detail, excellent interpersonal communication skills, and are extremely well organized, project management might be a good career path for you—and if you are interested in our country's shipping industry, you should also consider shipbuilding project management.

WHAT DO THEY DO?^{2,3}

An engineering project manager is responsible for the entire workflow of an engineering project. A project may be the assembly of a portion of a ship, the installation of a state-of-the-art navigation system, or another specific project that contributes to the larger task of building a new vessel. According to the Project Management Institute, the tasks of project management fall into five steps: "initiation," or kicking off the project; "planning," which includes making decisions about the steps your team will take and other aspects like the time line and budget; "executing," or carrying out the plan you created; "monitoring and controlling," or supervising the process; and "closing," or completing the project. In all of these steps, organization and attention to detail are critical. An engineering project manager is the head of a team, and the ability to both work and communicate effectively with others is key to success in the position; the job may include working closely with suppliers, clients, and other teams and will likely include the responsibility of reporting on the team's progress to supervisors. For shipbuilding project managers, subject matter expertise in consumer shipping or naval operations and engineering experience are also important.



CAREER PROFILE

Engineering Project Manager (Continued)

EDUCATION/ TRAINING

- Bachelor's degree in engineering or a related STEM field.
- Master's degree in engineering or a related STEM field preferred.
- Project management and other industry-specific certifications a plus.
- Internships and/or on-the-job training to gain practical experience.

HOW DO I BECOME ONE?

Engineering project managers may need a bachelor of science in engineering, physics, or another physical science. Those aspiring to the field should build expertise in technical support and should build skills in mathematics, physical sciences, and engineering, beginning in high school. Students can build these skills by taking courses like algebra, calculus, statistics, physics, and computer science. Project managers also need strong problem solving and communication skills, excellent organization and time-management skills, and a keen attention to detail.

¹ "What is an Engineering Project Manager?" University of Central Florida.
<https://www.ucf.edu/online/engineering/news/what-is-an-engineering-project-manager>.

² "What is Project Management?" Project Management Institute.
<https://www.pmi.org/about/learn-about-pmi/what-is-project-management>.

³ "Occupational Employment Statistics." Bureau of Labor Statistics.
<https://www.bls.gov/oes/current/oes131198.htm>.