

Construction Manager

At a Glance

Construction managers plan and oversee the building of all kinds of structures. They make sure skyscrapers, houses, roads, and bridges are safe for us to use.

16 Career Clusters

Architecture & Construction

Business Management & Administration

Earnings

Earnings Range: 50K - 150K

Level of Education

- 2-Year College or Technical Training
- 4-Year College or University

Core Tasks

- Meet with clients, architects, and engineers to plan the build and create a schedule
- Calculate materials and labor needed
- Create a budget and then track spending
- Buy construction materials, arrange equipment rentals, and hire tradespeople
- Supervise the jobsite to ensure work is being done right and to keep everyone on schedule

Attributes & Abilities

- Problem-solving skills
- Detail-oriented and organized
- Work well as part of a team
- Communication skills
- An understanding of business

Workplace

- Work for large construction companies or self-employed
- Spend time outdoors at jobsites, in all weather conditions, and indoors in offices
- Local travel between offices and jobsites is common
- An average day may be 8 or 9 hours, though longer hours are sometimes required

Job Description

Construction managers help build all kinds of structures. They work on hospitals, schools, and houses. They also build roads, bridges, and sewers. They renovate and add to older structures. They plot out the entire build, and then turn the plan into a reality.

The work depends on the size of the project and the manager's level of seniority. Managers may be in charge of one part of a project, like making foundations. These people are known as project managers. On smaller projects, managers may oversee the whole process on their own. In this case, they are often called general contractors.

Projects need detailed designs, building permits, and a budget before they can begin. Managers work with clients in the early stages. When a design is set, they work out the details of the build. They often get help from architects and engineers at each stage.

Managers decide the order for each part of the project. They also work out a schedule and budget. Managers buy the materials they will need, such as bricks, lumber, windows, and pipes. They also arrange to rent equipment like bulldozers or cranes. For small jobs, they may take care of these items themselves. On large builds, junior managers look after these tasks.

Managers also hire subcontractors. These are experts in a certain area, such as electrical or plumbing. Subcontractors hire and organize the crew that will do the actual building. They may hire carpenters, drywallers, tilers, and other skilled tradespeople.

During a build, managers keep things organized and on schedule. They must deal with any problems that arise. For example, a machine might break or a worker may be unsafe. Managers find a solution and get the work back on track.

Construction managers are often found on construction sites. But they also do a lot of work in offices. They keep track of costs, such as building materials and employee payrolls. They also do a lot of paperwork. They deal with building codes and safety regulations. They may promote their services or present plans to potential clients as well.

Working Conditions

Construction managers usually work for engineering or construction firms. Some are self-employed.

Managers spend a lot of time outdoors visiting building sites. They must be able to deal with all kinds of weather. On site, they make sure employees and subcontractors are doing their jobs. They also keep track of safety. They make sure the build stays on schedule.

Managers also spend time indoors in offices. They make phone calls, complete paperwork, and plan builds. They often travel between offices and local job sites.

This job can be stressful. Managers have to coordinate many employees' and subcontractors' schedules. They also deal with clients and suppliers. Mistakes can cost time and money. Even worse, they can result in an unsafe building.

Managers' hours can vary quite a bit. An average day is 8 or 9 hours. But 10 to 12-hour days are not uncommon for large projects. Some managers may have little or no work when the economy is slow.

Earnings

Construction managers can work full time or on a contract basis. Most earn between \$54,000 and \$158,000 a year. The national median salary is \$89,000 a year.

Construction managers who work for large companies usually get an annual salary. Independent managers work on a contract basis. Their income depends on how many clients they have. Income also depends on their experience and seniority.

New project managers earn less than those with a lot of experience. Senior managers who oversee the entire construction process can make the most. Managers who reach top-level positions may be in charge of several sites. In some cases, they can make more than \$150,000 a year. It takes many years to work up to these jobs.

Full-time managers who work for large companies often get benefits as well. These include health insurance, paid sick leave, and vacation time. Self-employed managers must provide their own benefits.

Massachusetts Wages

Occupation: Construction Managers

Level of Experience

Hourly

Annual

Entry Wage	\$37.42	\$77,830
Median Wage	\$49.1	\$102,130
Experienced Wage	\$63.61	\$132,300

Source: U.S. Department of Labor, Bureau of Labor Statistics <http://www.bls.gov>

Massachusetts Outlook

Occupation: Construction Managers

Employment

2014	8,680
2024	9,170

Change

Number	490
Percentage	5.5

Annual Average Openings

Total	Growth	Replacement
170	--	--

Source: Projections Central <http://www.projectionscentral.com>

Education

To be a construction manager, you need a mix of formal training and experience on the job. Most people who enter this field have a background in engineering or construction.

Most jobs require you to have a bachelor's degree in civil engineering or a related field. You can also study construction science, building science, or construction management. This is especially true if you want to be in charge of large builds like skyscrapers and bridges. A bachelor's degree takes about 4 years to complete.

You can also learn a skilled trade. For example, you can train as a carpenter or an electrician. You start as an apprentice and work up to the manager level. Apprenticeship programs vary depending on the trade. See the education sections of the trades that interest you to learn more.

Many colleges offer 2-year programs in construction management and civil engineering technology. You can enter the field after you complete one of these programs. Then you have to work your way up to being a manager. Many people combine this type of program with experience on the job.

Related College Programs

- Building/Construction Site Management/Manager
- Construction Management
- Construction Trades, General
- Construction Engineering Technology/Technician
- Building Construction Technology

Other Suggested Qualifications

Construction managers should have the ability to solve problems quickly and efficiently. They need to be thorough, detail-oriented, highly organized, and able to work well with other people. Good oral and written communication skills are also important since managers need to communicate with engineers, architects, tradespeople, clients, and suppliers. Because they have to deal with financial and administrative challenges, as well as physical or structural ones, business training is very useful for construction managers.

Sample High School Program of Study

This Program of Study can serve as a guide, along with other career planning materials, as learners continue on a career path. Courses listed within this plan are only recommended coursework and should be individualized to meet each learner's educational and career goals.

Construction Architecture & Construction

Grade 9	Grade 10	Grade 11	Grade 12
English/Language Arts			
English/Language Arts I	English/Language Arts II	English/Language Arts III Technical Writing	English/Language Arts IV
Math			
Algebra I	Geometry	Algebra II	Construction Math Statistics
Science			
Earth or Life or Physical Science	Biology	Physics	Chemistry
Social Studies/Sciences			
State History Civics or World History	U.S. History	Economics Psychology	
Career & Technical Courses			

Grade 9	Grade 10	Grade 11	Grade 12
Introduction to the Built Environment	The Language of Architecture and Construction Information Technology Applications	Safety, Health and the Workplace Environment Principles of Construction	Applications in Construction

States' Career Clusters Initiative, 2008, www.careerclusters.org.

Important

- Check with your advisor to make sure that your course selections satisfy your graduation requirements.
- Courses available may vary from school to school.

Sample Career Path

People take different pathways through their careers, but no one starts at the top. This is an example of how the earnings, education and experience requirements, and responsibilities might progress for someone in this occupation.

Level 1

Sample Title	Assistant Project Manager
Earnings	\$50,000 to \$60,000 a year
Requirements	• College degree or experience as a skilled tradesperson
Responsibilities	Assisting with construction material orders, project estimates, and project scheduling; helping prepare bids for construction projects.

Level 2

Sample Title	Project Manager
Earnings	\$60,000 to \$80,000 a year
Requirements	• 2 to 3 years of experience in the construction industry • Possibly some post-secondary training in business
Responsibilities	Scheduling work and people; providing cost estimates for labor, materials, and other project expenses; purchasing labor and materials.

Level 3

Sample Title	Senior Project Manager / Superintendent
---------------------	---

Level 3

Earnings	\$80,000 to \$110,000 a year
Requirements	• 5 to 10 years of experience
Responsibilities	Coordinating the work of various tradespeople; overseeing activities on a construction site; working on marketing and financial aspects of large projects.

Level 4

Sample Title	Vice-President of Construction / Owner of Company
Earnings	\$100,000 to \$150,000 a year or more
Requirements	• 10 to 15 years of experience
Responsibilities	Purchasing land; doing master planning for large construction projects; obtaining financing; setting company policy.

Related Careers

Here are some other occupations that you might be interested in. Click on an occupation name to learn more.

- Architect
- Building Inspector
- Carpenter
- Civil Engineer
- Construction Tradesperson
- Cost Estimator
- Demolition Expert
- Energy Auditor
- Entrepreneur
- Home Inspector
- Interior Designer
- Landscaper
- Manufacturing Manager
- Property Manager
- Real Estate Agent
- Real Estate Appraiser

Related Military Careers

- Construction Specialist

Career Clusters

Career Clusters are groups or families of occupations that share common characteristics such as knowledge requirements, skill sets, and/or goals.

Architecture & Construction

Business Management & Administration

National Employment by Industry

Industry	% Employed
Self-Employed	64
Construction	29

Source: O*Net Online, Browse by Industry, US Department of Labor
<http://online.onetcenter.org/find/industry>

Other Resources

Construction Management Association of America (CMAA) – Careers

This association offers certification for construction managers. Here you can find useful career information for students, including a career brochure and glossary of terms.

<http://www.cmaanet.org/careers>

Associated General Contractors of America (AGC)

This association serves as the voice of the construction industry in the US. Check out the Industry Priorities section to find articles of interest for the construction industry.

<http://www.agc.org>

National Association of Home Builders (NAHB)

This is an association for anyone in the home building industry.

<http://www.nahb.org>

Home Builders Institute (HBI)

HBI provides training for careers in the building industry. Scroll over Programs and click on Career & Certification Services to learn more about the services they offer.

<http://www.hbi.org>

National Association of Women in Construction (NAWIC)

This organization supports women in or wishing to become part of the construction industry. Be sure to check out the Education section.

<http://www.nawic.org>

ConstructMyFuture.Com

This is a career and education guide focusing on the construction industry. Click on Jobs to discover different careers.

<http://www.constructmyfuture.com/students>

HowStuffWorks – What does a construction manager do?

Find out more about what the role and job duties of a construction manager are.

<http://www.howstuffworks.com/home-improvement/construction/projects/construction-manager.htm>

Civil Engineer Web – Top 10 Qualities of Effective Construction Managers

Discover the qualities that set effective construction managers apart.

<http://www.civilengineerweb.com/top-10-qualities-effective-construction-managers>

Occupational Outlook Handbook – Construction Managers

Career information from the US Department of Labor.

<http://www.bls.gov/ooh/Management/Construction-managers.htm>

