

# CONSTRUCTION MANAGEMENT, BACHELOR OF SCIENCE

The major in construction management leads to the Bachelor of Science (BS) degree in Construction Management. Graduates of the Construction Management (CM) program enter the industry as project superintendents, field supervisors, project managers, or owner's representatives for a variety of construction related firms such as general contractors, specialty subcontractors, construction managers, designers, developers, consultants, or owners.

## Program Goals

The goal of the Construction Management program is to prepare baccalaureate degree graduates who have the necessary skills to plan, organize, staff, lead and exercise control in the directing and coordinating of resources to achieve construction project objectives. Therefore, the objective of the program is to produce graduates who have the technical grounding in construction processes for infrastructure and have managerial skills to plan and direct projects.

## Co-curricular Activities

The CM faculty supports and encourages the involvement of construction management majors in at least one technical organization relevant to the construction enterprise.

## Student Learning Outcomes

Students who successfully complete the CM program are expected to have the ability to:

- Apply knowledge, techniques, skills, and tools of the construction industry in construction activities;
- Select and apply knowledge of mathematics, science, and technology to construction problems;
- Perform standard tests, organize and interpret test data, and apply test results to improve construction processes;
- Function effectively as members or leaders on construction teams;
- Communicate effectively regarding subjects related to construction activities; and
- Demonstrate an understanding of professional and ethical responsibilities.

## Outcomes Assessment Activities

- To be eligible for graduation, all construction management majors are required to take an exit examination. The results of the exit examination are used in the evaluation of the program but have no effect on the student's GPA.
- Graduates and their employers are surveyed on program satisfaction and job performance following their graduation.
- The CM Advisory Committee meets every year to review the three year cycle report and make suggestions for program improvement. The committee also meets with current CM students for an open discussion regarding the CM program.

## Institutional and General Education Requirements

To complete the General Education requirements, students are required to take a total of 35 credit hours consisting of the skills and knowledge components as specified under the undergraduate *General Education Requirements* section of this catalog. Construction Management (CM) students will take 17 of the 35 credit hours of the general education requirements under the required math and physical science courses and the required business and management component.

Therefore, the CM majors are expected to take 18 credit hours to complete the remaining skills and knowledge components in Written Communication (6 credit hours), Humanities and Speech Communication (9 credit hours), and History (3 credit hours). Please refer to the undergraduate *General Education Requirements* section of this catalog for the list of courses that can be taken to fulfill the skills and knowledge components.

### Construction Management Curriculum

The CM curriculum consists of courses listed under the major categories listed below.

Course	Title	Credits
<b>Skills Component</b>		
ENG 101	RHETORIC & WRITING I	3
ENG 102	RHETORIC & WRITING II	3
<b>Knowledge Component</b>		
COMR 103	SPEAKING AND LISTENING	3
General Education: History		3
General Education: Humanities		6
Social Sciences (6 hours listed under Business) <sup>1</sup>		
<b>Math and Sciences</b>		
MATH 101	INTRODUCTORY COLLEGE MATHEMATICS	3.0
MATH 156	INTRODUCTION TO STATISTICS	3
PHYS 201 & 201L	PRINCIPLES OF PHYSICS I and PRINCIPLES OF PHYSICS LAB I	4
Select one of the following:		4
CHEM 111 & 111L	PRINCIPLES OF CHEMISTRY and PRINCIPLES OF CHEMISTRY LAB	4
GEOL 101 & 101L	EARTH SCIENCE and EARTH SCIENCE LAB	4
<b>Business and Management</b>		
ACCT 201	PRINCIPLES OF FINANCIAL ACCOUNTING	3.0
BSAD 270	BUSINESS COMMUNICATIONS	3.0
BSAD 302	ETHICS IN BUSINESS	3.0
ECON 201	PRINCIPLES OF MACROECONOMICS <sup>1</sup>	3
ECON 202	PRINCIPLES OF MICROECONOMICS <sup>1</sup>	3
MGMT 201	PRINCIPLES OF MANAGEMENT	3
<b>Introduction to Computers</b>		
CIS 100	INTRODUCTION TO WORD	1
CIS 103	INTRODUCTION TO POWERPOINT	1
CIS 104	INTRODUCTION TO EXCEL SPREADSHEETS	1
<b>Major Courses</b>		
CET 102	SURVEYING I	3
CET 103	SURVEYING II	3

CET 115	CIVIL DRAFTING I	3
CET 207	CONSTRUCTION MATERIALS AND METHODS	3
CET 208	CONCRETE AND ASPHALT MATERIALS	3
CET 303	CONSTRUCTION MANAGEMENT	3
CET 304	BUILDING COST ESTIMATING	3
CET 305	HEAVY/HIGHWAY COST ESTIMATING	3
CM 101	INTRO TO CONSTRUCTION MANAGEMENT	2
CM 231	STATICS AND STRUCTURES	4
CM 320	SOILS IN CONSTRUCTION	3
CM 330	WOOD STRUCTURAL SYSTEMS	3
CM 341	CONCRETE AND STEEL STRUCTURES	4
CM 351	CONSTRUCTION PLANNING & SCHEDULING	3
CM 445	CONSTRUCTION SAFETY	2
CM 451	MECHANICAL & ELECTRICAL SYSTEMS	4
CM 461	CONSTRUCTION LAW	3
CM 465	CONSTRUCTION ACCOUNTING & FINANCE	3
CM 475	SENIOR PROJECT	3

**Technical and Management Electives**

Select 5 credits from ACCT, BSAD, CET, CM, EN, FIN, MGMT or MKTG 5

**Upper Division Technical and Management Electives**

Select 3 credits from ACCT, BSAD, CET, CM, EN, FIN, MGMT or MKTG 3

Total Credits 119

<sup>1</sup> ECON 201 PRINCIPLES OF MACROECONOMICS (3.00 c.h.) and ECON 202 PRINCIPLES OF MICROECONOMICS (3.00 c.h.) are also counting for the Social Science General Education Requirement.

**Graduation Requirements****Construction Management Program Requirements**

- Students are required to complete an approved program of study with a cumulative GPA of 2.000 or better in the CM major courses.
- Students are required to demonstrate skills and knowledge in the areas of quantitative analysis and science by having a cumulative GPA of 2.000 or better in the required mathematics and physical science courses.
- Construction management majors are expected to demonstrate the ability to solve problems pertinent to the construction industry by completing a senior-year capstone activity that requires a packaged submittal and an oral presentation.

The general education requirement for graduation includes a total of 35 semester credits in two categories: Skills Component and Knowledge Component. Please see the General Education Requirement section under Academic Policies for more information.