

**Construction Science and Management**  
**Information Access Policy**  
**Clemson University Libraries**

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**I. Purpose:** To support research and teaching needs of students and faculty in the field of construction science. The Clemson University Department of Construction Science and Management offers programs leading to the following qualifications:

- Bachelor of Science in Construction Science and Management
- Master of Construction Science and Management
- Graduate-level certificate in Construction Science and Management

The Bachelor of Science degree is accredited by the American Council for Construction Education.

**A. Curriculum**

1. In addition to the University's general education requirements, students are introduced to the current processes and functions utilized by construction industry practitioners. Theoretic concepts are reinforced and practiced in the laboratory, through site visits, and through seminars conducted by industry experts. Topics such as structures, materials and methods, contract documents, estimating, scheduling, safety, and project management form the core curriculum of the degree.
2. Clemson University's Master of Construction Science and Management program provides students with high levels of skill and understanding in the technical areas of construction project administration and control. The degree focuses on advanced study in the field of business techniques, in new and emerging technologies for construction project delivery systems, and in the administration of construction firms. Qualified students can earn their degree by attending classes full time or part time on the Clemson campus or via online distance learning.

**B. Program Enrollments**

	<b>2008</b>	<b>2009</b>	<b>2010</b>	<b>2011</b>	<b>2012</b>
Undergrad Majors	194	192	180	160	145
Graduate Students	23	24	15	18	15

**C. Primary & Secondary Users**

1. Primary Users (2012):
  - Undergraduate CSM majors: 145
  - Graduate students: 15
  - Faculty: 8

2. Secondary Users
  - Other Clemson students, faculty, and staff
  - Professional constructors
  - Courtesy patrons involved in building

## **II. Scope of In-House Collection**

Materials are purchased for the construction collection to support academic classes offered by the Department of Construction Science and Management at Clemson University (See Appendix).

The construction collection is housed in the Gunnin Architecture Library. Materials for the circulating collection (other than government documents) and Reference materials will be evaluated and selected by the Construction Science & Management Librarian. The Construction Science & Management Librarian may also recommend resources for the Main Library's reference collection and the Clemson Libraries database/e-resource collection.

### **A. Format Guidelines**

Collection development will focus on acquiring (through purchase, subscription or license) curriculum-relevant content in the available format that best suits the needs of the resource's primary users. Formats may be either print or digital. Digital resources may be online or on physical media such as DVDs.

### **B. Language Guidelines**

The vast majority of materials purchased should be written in the English language.

### **C. Geographical Guidelines**

Collection efforts will emphasize materials related to American and European construction. Relevant and significant materials on global trends and developments in the construction industry will also be collected.

### **D. Chronological Guidelines**

Selections will focus on current, up-to-date information. Certain important materials on the history of technology will be selected.

### **E. Publication Date Guidelines**

The selector will purchase books/resources published within the last two years. Exceptions: books requested by faculty members or books highly recommended in a review source.

### **F. Types of Materials Included**

1. Monographs: Monographs on a single subject will be selected for the general collection as budget allows.
2. Collections of essays on relevant topics will be selected as budget allows.
3. Career guidance materials: Career guides and job-seeking books for construction students will be purchased for the reference collection.

4. Databases: Electronic databases that can be used to locate journal articles and other publications for research in construction, including standards, and in construction management (in alphabetical order):
  - a. Applied Science & Technology Full Text
  - b. ASCE Research Library
  - c. ASTM Digital Library
  - d. ASTM Standards
  - e. Avery Index to Architectural Periodicals
  - f. Business Source Complete
  - g. CRCnetBASE Resource Center
  - h. Engineering Index/Compendex
  - i. ICONDA (International Construction Database)
  - j. IEEE Xplore Digital Library
  - k. Knovel Science and Technology Collection
  - l. ScienceDirect
  - m. SpringerLink
  - n. TRID Online
5. Cost data resources: Purchased for the Reference collection. Most recently superseded editions of some titles are rotated to the circulating collection. Non-circulating software versions are also acquired for the media collection.
6. Dictionaries: Purchased for the Reference collection. No effort is made to collect dictionaries for the circulating collection.
7. Directories: Purchased for the Reference collection. No effort is made to collect directories for the circulating collection.
8. Encyclopedias: New editions and new titles will be purchased for the Reference collection.
9. Journals: Every effort will be made to preserve the current journal collection and to add new titles as funds allow. Evaluation tools such as faculty surveys and interlibrary loan activity will be used to identify core journals and faculty favorites to ensure they remain in the collection. A special effort will be made to acquire or retain journals for which faculty members serve as editors or members of editorial boards. Electronic format will be preferred over print when both formats are available, as budget allows.
10. Theses and Dissertations: The Graduate School requires that all theses and dissertations be submitted in electronic format. These are made available online. The majority of theses and dissertations written at other universities should be obtained through Interlibrary Loan.

#### **G. Types of Materials Excluded**

Textbooks: Textbooks that are used in classes taught at Clemson University will not be purchased. Other textbooks may be purchased if they support the construction curriculum.

#### **H. List of Journals**

There is no core list of journals for construction science from the American Council for Construction Education or any other body. Some key journals received by Clemson are:

Architects' journal  
 Architectural lighting  
 Builder  
 Building design and construction  
 Building research and information  
 Construction manager  
 Construction review  
 Construction specifier  
 Constructor  
 Dixie contractor  
 Energy and buildings  
 ENR  
 Lighting design and application  
 Mid-west contractor  
 Modern steel construction  
 NFPA journal  
 Old-house journal  
 Taunton's fine woodworking

### III. Collection Analysis by Subject

#### A. Library of Congress Call Number Ranges and Subject Headings

<u>Call Number</u>	<u>Subject Heading/Description</u>
HD9715-9717.5	Construction industry
TH 1-9745	Building construction
TH 845-895	Architectural engineering. Structural engineering of buildings
TH 900-915	Construction equipment in building
TH 1000-1725	Systems of building construction. Including fireproof construction, concrete construction
TH 2025-3000	Details in building design and construction. Including walls, roofs
TH 3301-3411	Maintenance and repair
TH 4021-4977	Buildings: Construction with reference to use. Including public buildings, dwellings
TH 5011-5701	Construction by phase of the work (Building trades)
TH 6014-6081	Environmental engineering of buildings. Sanitary engineering of buildings
TH 6101-6887	Plumbing and pipefitting
TH 7005-7699	Heating and ventilation. Air conditioning
TH 7700-7975	Illumination. Lighting
TH 8001-8581	Decoration and decorative furnishings
TH 9025-9745	Protection of buildings. Including protection from dampness, fire, burglary

#### B. Level of Collecting

Approximately 75% of the books ordered for the construction collection should support the undergraduate curriculum. Titles should be reviewed on an individual basis, and the selector should determine which courses the book will support. Since many courses are offered at the both the 300/400 and 600 levels, both undergraduate and graduate students will benefit from books selected for these subjects.

#### **IV. Access to Information not On-Site/Licensed by Clemson Libraries**

##### **A. Interlibrary Loan & PASCAL**

The primary access points for books, journals, and other types of publications not owned or accessible by the Libraries will be Interlibrary Loan and the South Carolina academic libraries consortium, PASCAL. These services are free to Clemson University students, faculty, and staff. These services are not available to the general public.

##### **B. Ingenta**

This service enables Clemson faculty, students, and staff to access full-text online articles that the Clemson Libraries do not own and that are not available from PASCAL partners or via interlibrary loan. Ingenta has limited coverage and a price cap per article.

##### **C. Full-text Databases**

Many of the databases offered through PASCAL and State of South Carolina DISCUS licenses include full-text journal and magazine articles and other information resources.

#### **V. Selection Tools**

##### **A. Book Review & Notification Sources**

Choice Reviews Online  
GOBI Notifications

##### **B. Approval Plans**

Approval plans for books and notification slips are arranged with Yankee Book Peddler (as authorized by the Acquisitions Branch Head) to ensure acquisition/notification of titles that fit the needs of the library's circulating collection. There is currently no approval plan for construction materials.

##### **C. Publisher's Catalogs & Web Pages**

A few publishers that offer titles on construction topics include:  
McGraw-Hill  
RSMears  
E & FN Spon  
Sweet's Group  
Wiley

##### **D. Faculty requests and recommendations**

Faculty recommendations will be solicited at the start of each semester. Requests will be accepted at any time and expedited, if needed.

### **E. Weeding Guidelines**

The initial phase of weeding of books relating to construction will focus on removing books published prior to 1990 that have not circulated. Because of the need to maintain books for historical research, it is occasionally important to keep copies of older books, even if they have never circulated. They receive some in-house use, and future projects may involve their use.

## **VI. Collection Assessment & Planning**

### **A. Qualitative Measures**

#### 1. Clemson Benchmark Institutions

Auburn

Georgia Tech

Texas A&M

Virginia Tech

North Carolina State

#### 2. User Surveys

Surveys should be conducted to determine how construction students and faculty perceive the collection and to determine what they think is weak/strong about the collection. Surveys could also be used to find out what resources/services users would like added and if there are any they could do without.

### **B. Quantitative Measures**

#### 1. Interlibrary loan statistics

#### 2. Circulation statistics for materials in the call number range listed in III.A

## **Appendix: Construction Science & Management Courses offered at Clemson University**

### UNDERGRADUATE

CSM 100 Introduction to Construction Science & Management

CSM 150 Construction Problem Solving

CSM 201 Structures I

CSM 202 Structures II

CSM 203 Materials and Methods of Construction I

CSM 204 Contract Documents

CSM 205 Materials and Methods of Construction II

CSM 303 Soils and Foundations

CSM 304 Environmental Systems I

CSM 305 Environmental Systems II

CSM 351 Construction Estimating

CSM 352 Construction Scheduling

CSM 353 Construction Estimating II

CSM 411 Safety in Building Construction

CSM 420 Highway Construction and Contracting

CSM 450 Construction Internship

CSM 453 Construction Project Management  
CSM 454 Construction Capstone  
CSM 455/655 Reducing Adversarial Relations in Construction  
CSM 461 Construction Economics Seminar  
CSM 490/H490 Directed Studies  
CSM 498 Current Topics in Construction

## GRADUATE

### Core Requirements

CSM 852 Construction Management Research  
CSM 860 Financial Planning & Analysis  
CSM 861 Construction Control Systems  
CSM 862 Personnel Management & Negotiations  
CSM 863 Advanced Planning & Scheduling  
CSM 864 Business Strategy & Marketing  
CSM 865 Project Management  
CSM 889 Special Problem  
CSM 891 Master's Thesis Research

### Major Elective Courses

CSM 655 Reducing Adversarial Relations in Construction  
CSM 881 Professional Seminar  
CSM 890 Directed Studies