

CONE 231 – Construction Estimating

Fall Semester 2014

COURSE DESCRIPTION

Principles and application of construction estimating including quantity takeoff, pricing of materials, classification of work, labor, overhead, specifications, bid procedures, and project scheduling. Computerized estimating and scheduling software is introduced. Prerequisites: CONE 221 and IE 207.

PROFESSOR

Nilo Tsung CEng, PE, PhD Assistant Professor Department of Engineering and Technology College of Science and Engineering

CONTACT INFORMATION

Office: Room 204, AG/IT Building

Office Hours: 2:30 – 5:00 PM Tuesdays and Wednesdays or by appointment

Office Telephone: 903-886-5464

E-mail: nilo.tsung@tamuc.edu

Department fax number: 903-886-5960

CLASS MEETINGS INFORMATION

Time: 12:00 – 1:15 PM Mondays and Wednesdays

Location: Ag/IT 118 A

COURSE OBJECTIVES

- 1. Learn plan reading and quantity takeoff.
- 2. Learn bid documents, estimating process, and conceptual cost estimating.
- 3. Learn how to estimate the construction costs of commercial buildings, which may include foundations, concrete structures, steel structures, carpentry, roofing and flashing, masonry, floor systems, painting, and plumbing.

REQUIRED COURSE MATERIALS

Required Textbook:

Peurifoy, R. L. and Oberlender, G. D. (2014). *Estimating Construction Costs* (6th edition). McGraw Hill. ISBN-13: 978-0073398013.

Optional textbook:

Frank R. Walker Company. Walker's Building Estimator's Reference Book.

ATTENDANCE POLICY

Every student is expected to attend all classes to acquire the information and knowledge covered in the class. Students themselves are responsible to obtain the materials covered in the classes they have missed. No effort will be made by the instructor to track down missing students and/or assignments.

HOMEWORK ASSIGNMENT POLICY

A grade of "0" will be assigned to late assignments, unless prior arrangements are worked out with the instructor. The instructor has the final decision on whether late work will be accepted. Late penalties will be assessed to any approved late work.

COURSE GRADING

Attendance and class participation: 10%

10 quizzes: 30%

Midterm exam: 30%

Final exam: 30%

GRADING SCALE

90-100%: A;

80-89%: B;

70-79%: C;

60-69%: D;

<60%: F.

ACADEMIC DISHONESTY

Texas A&M University-Commerce will not condone plagiarism in any form. Plagiarism represents disregard for academic standards and is strictly against University policy. Plagiarized work can result in a "0" on a given assignment(s) or an "F" for the course as well as further administrative sanctions permitted under University policy. You may discuss course work and other course materials with fellow students (except during tests), but it is inappropriate to have another student do your course work or provide you with any portion of it.

Guidelines for properly quoting someone else's writings and the proper citing of sources can be found in the APA Publication Manual. If you do not understand the term "plagiarism", or if you have difficulty summarizing or documenting sources, contact your professor for assistance.

STUDENT BEHAVIOR

All students enrolled at the University shall follow the tenets of common decency and acceptable behavior conducive to a positive learning environment. Students are expected to be fully compliant with the Code of Student Conduct, defined in the current Student Guidebook.

Students are expected to attend all class periods and to be prepared for each class. Students are expected to refrain from any disruptive behaviors during class, which includes but is not limited to working on assignments/projects from another course, reading non-course materials, or using the computer for non-class purposes. Cell phones, iPods, and other electronic devices should be turned off during class.

STUDENTS WITH DISABILITIES

The Americans with Disabilities Act (ADA) is a federal anti-discrimination statute that provides comprehensive civil rights protection for persons with disabilities. Among other things, this legislation requires that all students with disabilities be guaranteed a learning environment that provides for reasonable accommodation of their disabilities. If you have a disability requiring an accommodation, please contact:

Office of Student Disability Resources and Services
Texas A&M University-Commerce
Gee Library
Room 132
Phone (903) 886-5150 or (903) 886-5835
Fax (903) 468-8148
StudentDisabilityServices@tamuc.edu

COURSE SCHEDULE (following schedule is subject to change)

Week No. & Dates	Weekly Contents	Reading Assignments
(mm/dd – mm/dd)		
1 (8/24-8/30)	 Understand course objectives and policies 	Chapter 1
	 Introduction to cost estimating 	
2 (8/31-9/6)	Labor Day (9/1, Mon.; holiday and no class)	Handouts
	Plan reading	
3 (9/7-9/13)	Quantity takeoff	Handouts
4 (9/14-9/20)	Bid documents	Chapter 2
5 (9/21-9/27)	 Estimating process 	Chapter 3
6 (9/28-10/4)	 Conceptual cost estimating 	Chapter 4
7 (10/5-10/11)	 Estimating costs of construction labor, equipment, and material handling and transporting 	• Chapters 5 and 6
8 (10/12-10/18)	Midterm	
9 (10/19-10/25)	Computer estimating	Chapter 22
10 (10/26-11/1)	Concrete structures	Chapter 10
11 (11/2-11/8)	Steel structures	Chapters 12 and 14
12 (11/9-11/15)	Carpentry and masonry	Chapter 6
13 (11/16-11/22)	 Roofing, floor systems, painting, plumbing, electric wiring, etc. 	• Chapters 13, 15, 16, 17, and 18
14 (11/23-11/29)	 Final project preparation Thanksgiving Holidays on 11/27 (Thur.) and 11/28 (Friday) no class 	
15 (11/30-12/6)	Final project preparation	
16 (12/7-12/13)	Final exam	
Finals week	Will be held on the date scheduled by the University	
	for the final exam.	