



General Information

Course Instructor: Adeeba Raheem
Email: aaaraheem@utep.edu
Phone: 915-747-6348
Office: Civil Engineering (A213)
Course Website: <https://blackboardlearn.utep.edu>
Online Meeting Platform: MS Teams

Course Credits: 3

Course Description

In this course, students will be provided an understanding of how to complete a detailed bid estimate for a construction project and will learn the methods and tools required to analyze, quantify, and price the construction costs for any project. Students are required to complete a detailed estimate of a residential building project.

Course Introduction

This course is a required course in both the Certificate in Construction Management, Bachelor of Science in Construction Engineering and Management, and Master of Science Degree in Construction Management. The primary purpose of this course is to provide an understanding of the estimating and bidding process in construction.

Course Goals and Learning Outcomes

The goals of this course are to provide the students with a working knowledge of the art and science of estimating and its importance to all participants in a construction/engineered project. Upon completion of the course, students will demonstrate their ability to:

LO1: Differentiate between various construction processes and methods for cost estimation

LO2: Design spreadsheet applications for cost estimating

LO3: Interpret construction drawings and prepare detailed quantity take-offs

LO4: Prepare cost estimates from preliminary budgeting through detailed estimates required for bidding and project budgeting

LO5: Develop professional report writing skills

MATERIAL NEEDED

Textbook



Additional resources:

- RS Means Construction Cost Data (2021 and 2022 versions) is available in the UTEP Library (reserved section)
- **Highly recommended:** The student license is available for the online version of RS Means Cost data if you can't get to the library for the hardbound version. The license is good for one year. Click the link below for the information.
<https://www.rsmeans.com/products/student>
- RS Means online version can be downloaded for 30 days from the website: <https://www.rsmeans.com/>. The data in this version are limited but still, it is a good tool to start with.

GRADING POLICY

Students will be responsible for weekly quizzes, class discussion questions, class discussion/participation, and assignments. Grades will be determined based on the following criteria.

Grade	Required Percentage (Based on the Grading Scheme)
A (Outstanding)	90 – 100
B (Very Good)	80 – 90
C (Satisfactory)	70 – 80
D (Unsatisfactory)	60 – 70
F (Failure)	less than 60

Grading Scheme

Available points for grading each assignment category, **grade weightage**, and a **week-by-week** schedule of deliverables are as follows:

DELIVERABLES, PARTICIPATION STANDARDS & EXPECTATIONS

The class material is divided into seven modules. Each module consists of lectures and class assignments. Students will be responsible for all reading material assigned during each week.

Week	Course Assignment Categories and Grade Weightage				
	Quizzes (15%)	Discussion Questions and posts (20%)	Final Exam (20%)	HW Assignments (25%)	Final project (20%)
1	30	100		100	
2	30	100		100	
3	30	100		100	
4	30	100		100	
5	30	100		100	
6	30	100		100	
7	30	100		100	
Total	210	700	100	600	300

- ✚ **Final exam** will consist of short written questions, MCQs, Fill-in-the-blanks, and some real-life situation analysis of construction problems. There will be **NO** makeup quizzes or the final exam unless there are extenuating circumstances.
- ✚ The students will have to submit a **Final project** by the last week of the course. The specifics will be provided during the second week of the session.
- ✚ **Discussion questions:** Each week, students have to provide FIVE comments, including their own answers to discussion questions posted on the discussion board online. The comments should add to the discussion by sharing your experience or adding information that is missing. The comments such as great...really good...I enjoyed it...All answers are good....I agree etc. will **NOT** be considered for grading purposes. Proper English and grammar are required in all discussions. In order to count towards participation credit, each post must be substantive. Substantive means they must respond to each point or question posted by the Professor or students, provide additional thought and analysis on the question or point made in the post, and raise a question or comment about the material posted that will contribute towards additional class discussion and inquiry. Slang, texting styles, or street language is unacceptable and will not be graded.
- ✚ **HW Assignments:** Late assignments will **NOT** be accepted. Each student will have **ONE** opportunity during the 7-week period to submit a late assignment within one day after the deadline has passed. This doesn't apply to quizzes and discussion comments. **Quizzes and discussion entries posted after completion of the course week will not be reviewed or graded.**

✚ **Quizzes:** Each week, students have to complete a quiz worth 30 points. Quizzes will cover the material discussed during that week and consist of MCQs, short questions, fill-in-the-blanks, etc.

✚ Students are encouraged to provide **feedback** during the term to facilitate a positive learning environment. Students can send any suggestions/comments/concerns regarding the course/assignment structure or any related aspect. The instructor strongly believes in helping and listening to students during the semester when it affects them THE MOST.

TECHNOLOGY REQUIREMENTS

Computer Requirements

Course content is delivered via the Internet through the Blackboard learning management system. Ensure your UTEP e-mail account is working and that you have access to the Web and a stable web browser. Google Chrome and Mozilla Firefox are the best browsers for Blackboard; other browsers may cause complications. When having technical difficulties, update your browser, clear your cache, or try switching to another browser.

Software Requirements

You will need to download or update the following software: Microsoft Office, Adobe Acrobat Reader, Windows Media Player, QuickTime, and Java. Check that your computer hardware and software are up-to-date and able to access all parts of the course.

If you do not have a word-processing software, you can download Word and other Microsoft Office programs (including Excel, PowerPoint, Outlook and more) for free via [UTEP's Microsoft Office Portal](#). Click the following link for more information about Microsoft Office 365 and follow the instructions.

IMPORTANT: If you encounter technical difficulties beyond your scope of troubleshooting, please contact the [UTEP Help Desk](#), as they are trained specifically in assisting with the technological needs of students. Please do not contact me for this type of assistance. The Help Desk is much better equipped than I am to assist you!

DIVERSITY

As an instructor, I am committed to creating an inclusive environment in which all students are respected and valued. I will not tolerate disrespectful language or behavior on the basis of age, ability, color/ethnicity/race, gender identity/expression, marital/parental status, military/veteran's status, national origin, political affiliation, religious/spiritual beliefs, sex, sexual orientation, socioeconomic status or other visible or non-visible differences.

All members of this class are expected to contribute to a respectful, welcoming, and inclusive environment for every other member of the class.

IMPORTANT REMINDERS

Course Schedule Changes

As a course instructor, I reserve the right to adjust the course syllabus or change assignments as needed. I will be sure to give you plenty of notice prior to any changes.

Class Participation

I strongly recommend that you check the course at least three times a week at a minimum to keep up. Email messages are sent to your UTEP email address, so you will want to check your UTEP email several times a week. There will be no incompletes offered in this course. Past experience has shown that if you cannot complete the course during the time allotted, you probably never will.

Time Management

The rule of thumb for time planning for a course is approximately three (3) hours for every credit hour taken. This is a standard figure recommended across the board by American universities. For a 3-credit course, you should expect to spend:

3 hours of class time + 9 hours of study and prep time = 12 hours per week.

Being Successful in an Online Class

Online learning is not a spectator sport. It is everyone's responsibility to participate as fully as they can so everyone can get the most from the experience. Here are some simple rules to follow to ensure your participation and engagement in the learning process:

- Ask questions: If you don't know the answer, someone else will. The discussion board is the area for asking questions related to the content OR any problems (related to the class) you are having. Make sure that you have clearly indicated the subject of your message.
- Reach out to others: Offer a fact, article, link, or another item that can help others learn something you can share.
- Be appropriate: The online classroom is not the place for insulting or insensitive comments, attacks, or venting. Inappropriate behavior can be subject to disciplinary action, as well.
- Be diplomatic: When sending messages on emotionally charged topics, I recommend that you write the message and then walk away for at least an hour before re-reading the message and then sending it. Re-reading emotionally charged messages ensures that they are constructive instead of destructive. Think of the person at the other end.
- Stay focused: Stay on topic to increase the efficiency of your learning.

Effective Electronic Communications

It is important to share a word of caution so we can become wiser about interpersonal distance learning communications. When communicating electronically, many of the feelings or impressions that are transmitted via body language in face-to-face communications are lost. Consequently, interpreting emotions and innuendos is much more difficult. Only what is written, or drawn, carries the message. Often, excitement can be misinterpreted as anger or insult. It is important that we all keep this in mind as we communicate. Words in print may seem harmless, but they could emotionally injure us when working at a distance. Hence, it is vitally important that we are conscious of how we communicate while working at a distance.

- For example, avoid the use of caps in your electronic messages, as the wording in caps comes across as shouting.

The standard practice ("Netiquette") for participation in the networked discussion requires that all participation be focused on the topic at hand, not become personalized, and be substantive in nature. (Translation: you may certainly disagree with others, but you must do so respectfully; you may express strong beliefs or emotions, but you may not get so carried away that you lose all perspective on the course itself.). More information on Netiquette, the etiquette of Internet communication, can be found at www.albion.com/netiquette.

Academic Dishonesty Statement

Academic dishonesty is prohibited and is considered a violation of the [UTEP Handbook of Operating Procedures](#). It includes but is not limited to, cheating, plagiarism, and collusion. Cheating may involve copying from or providing information to another student, possessing unauthorized materials during a test, or falsifying research data on laboratory reports. Plagiarism occurs when someone intentionally or knowingly represents the words or ideas of another person's as one's own. And, collusion involves collaborating with another person to commit any academically dishonest act. Any act of academic dishonesty attempted by a UTEP student is unacceptable and will not be tolerated. Violations will be taken seriously and will be referred to the Dean of Students Office for possible disciplinary action. Students may be suspended or expelled from UTEP for such actions.

Academic dishonesty is an assault upon the basic integrity and meaning of a University. Cheating, plagiarism, and collusion in dishonest activities are serious acts that erode the University's educational and research roles and cheapen the learning experience not only for the perpetrators but also for the entire community. It is expected that UTEP students will understand and subscribe to the ideal of academic integrity and that they will be willing to bear individual responsibility for their work. Materials (written or otherwise) submitted to fulfill academic requirements must represent a student's own efforts. Any act of academic dishonesty attempted by a UTEP student is unacceptable and will not be tolerated. Violations will be referred to the [Office of Student Conduct and Conflict Resolution \(OSCCR\)](#) for possible disciplinary action. Students may be suspended or expelled from UTEP for such actions.

Notice of Safe Assign

This course may utilize third party software that has the ability to automatically detect plagiarism on documents submitted for grading.

Copyright Notice

Many of the materials that are posted within this course are protected by copyright law. These materials are only for the use of students enrolled in this course and only for the purpose of this course. They may not be further retained or disseminated.

Disabled Student Statement

In Section 504 of the Vocational Rehabilitation Act of 1973 and the Americans with Disabilities Act (ADA) of 1990, if a student needs an accommodation, then the [Office of Disabled Student Services](#) located at UTEP needs to be contacted. If you have a condition that may affect your ability to perform successfully in this course, you are encouraged to discuss this in confidence with the instructor and/or the director of Disabled Student Services. You may call (915) 747-5148 for general information about the Americans with Disabilities Act (ADA) and the rights that you have as a UTEP student with a disability. You also can visit the DSSO website at www.utep.edu/dsso or the DSSO office in Room 108 East Union Building. Individuals with disabilities have the right to equal access and opportunity. It is the student's responsibility to contact the instructor and The Disabled Student Services Office at The University of Texas at El Paso.

UTEP Resources

UTEP provides a variety of student services and support. Please refer to the [UTEP Student Success Resource Hub](#) for a listing of campus resources.

Weekly Schedule*

	Topics	Readings	Deliverables	Associated Learning Objectives
Week 1	Introduction Contracts, Bonds, & Insurance Project Manual	Text Chapters 1, 2,3 Professor Discussion Topic Lecture 1	Quiz 1 Discussion Questions (DQ1) HW Assignment 1	LO1
Week 2	The Estimate; Computers in Estimating Overhead & Contingencies	Text Chapters 4, 5,6 Professor Discussion Topic Lecture 2	Quiz 2 Discussion Questions (DQ2) HW Assignment 2	LO1, LO2
Week 3	Labor Costs; Equipment Excavation	Text Chapters 7,8,9 Professor Discussion Topic Lecture 3	Quiz 3 Discussion Questions (DQ3) HW Assignment 3	LO3
Week 4	Concrete Masonry	Text Chapters 10,11 Professor Discussion Topic Lecture 4	Discussion Questions (DQ4) HW Assignment 4	LO3
Week 5	Metals Wood Thermal Protection;	Text Chapters 12,13,14 Professor Discussion Topic Lecture 5	Quiz 5 Discussion Questions (DQ5) HW Assignment 5	LO3
Week6	Doors & Windows, Finishes; Electrical	Text Chapters 15,16,17 Professor Discussion Topic Lecture 6	Quiz 6 Discussion Questions (DQ6) HW Assignment 6	LO3
Week 7	Plumbing; HVAC Profit; Other Estimating Methods	Text Chapters 18, 19,20, 21 Professor Discussion Topic Lecture 7	Discussion Questions (DQ7) HW Assignment 7	LO1, LO3
Last Friday			Final Project	LO4-LO5
Week 7			Final Exam	LO1- LO5

*Course schedule is tentative and subject to modification