Engineering Cost Analysis

PREPARED BY: Dr. Nouredine Boubekri
Boubekri@unt.edu
940 565 2136
OFFICE: Department of Engineering Technology-Discovery Park
F115P: Tuesday and Thursday From 2:00pm to 3:00pm

COURSE NUMBER, TITLE, CREDIT and CONTACT HOURS:
MFET 4200, 3 credit /contact hours

DESCRIPTION:
Principles and techniques for cost evaluation of engineering design including: labor, materials and business accounting analysis, forecasting tools and techniques; operations, product, project and system estimation; and contract considerations.

COURSE LEARNING OBJECTIVES:
1-Demonstrate an understanding of application of cost estimation techniques and principles
2-Demonstrate an understanding of concepts of time value of money

COURSE LEARNING OUTCOMES
The course demonstrates that graduates have:
1. An ability to apply knowledge, techniques, skills, and modern tools of mathematics, science, engineering, or technology to solve broadly-defined engineering problems

PREREQUISITES:
MFET 4190 (or equivalent) or consent of department

TEXTBOOK:
Engineering Economy, 16th Edition
William G. Sullivan, Virginia Polytechnic Institute and State University
Elin M. Wicks
C. Patrick Koelling; ©2015; Pearson; ISBN13: 9780133439274
COURSE OUTLINE:

The course covers the following topics:

1. Introduction to Engineering Economy
2. Cost Concepts and Design Economics
3. Cost-Estimation Techniques
4. The Time Value of Money
5. Comparison among Alternatives
6. Depreciation methods
7. Breakeven Analysis
8. Decision Making Considerations

GRADING ELEMENTS AND WEIGHTS:

Semester Exams (3) 30% each
Homework 10%