## MATH 2470-1001 Fundamentals of Statistics

Text Book: Probability and Statistics for Engineering and the Sciences (9'th edition), Jay L. Devore

Prerequisite: C or better in MATH 1260, MATH 1310, or MATH 1350
Content: Descriptive statistics: Populations, samples and processes; Pictorial and Tabular; Measures of Location; Measures of Variability; Probability: Sample Spaces and Events; Axioms, Interpretations and properties of probability; Counting techniques; Conditional probability; Independence; Discrete Random Variables and Probability Distributions; Continuous Random Variables and Probability Distributions; Joint Probability Distributions and Random samples: Jointly distributed random variables; expected values, covariance and correlation; the distribution of the sample mean; Point estimation; Test of hypotheses.

## Grading System:

Homework/Quizzes: 25\%
Midterm Exam: 35\%
Final Exam: 40\%
All exams must be taken at the scheduled time unless evidence of a legitimate, unavoidable problem is presented. Make-up exams will not be given.

Note: Exams are closed book. Final exam will be comprehensive.
Homework and Quizzes: Homework will be assigned and collected time to time. When collected, homework is due at the beginning of class. Late homework will not be accepted.

Grade scale: A
90-100\%
B
80-89\%
C $\quad 70-79 \%$
D 60-69\%

