MATH 132 - Finite Mathematics (3 Credits)

DESCRIPTION:

Topics include symbolic logic, set theory, and probability theory applied to the analysis of business and social science problems. Prerequisite: Math 124 or Math 126 or Math 128 all with a grade of C or better; or a satisfactory ACT/SAT/Placement Test score.

TEXT:

Finite Mathematics for Business, Economics, Life Sciences, and Social Sciences; 13th Edition; Barnett, Ziegler, Byleen

NOTE: Full-time instructors have the right to use no text or a different text.

OUTLINE:

Ch 01 - A one-day review is suggested.
Ch 03 - Section 3.1
Ch 04 - Sections 4.1 - 4.5
Ch 05 - Sections 5.1 - 5.3
Ch 06 - Sections 6.1, 6.2
Ch 07 - Sections 7.1 - 7.4
Ch 08 - Sections 8.1 - 8.5
Ch 09 - Sections 9.1, 9.2
Ch 11 - Sections 11.1 - 11.5

OUTCOMES:

a. Solve systems of equations.
b. Perform arithmetic of matrices.
c. Solve systems of equations using Gauss-Jordan elimination method.
d. Carry out linear programming geometrically.
e. Perform the simplex algorithm in LP.
f. Construct Venn diagrams.
g. Investigate fundamental counting principles, permutations and combinations.
h. Solve elementary probability problems.
i. Perform calculations using Bayes rule and Markov chains.
j. Explore elementary statistics to include normal and binomial distribution.
k. Investigate the mathematics of finance.

EVALUATION:

Grades will be determined by student performance in one or more of the following areas: in-class tests, take-home tests, homework assignments, quizzes, special projects, papers, attendance, and class participation. Degree of importance and types of assessment used will depend on the instructor.

This course satisfies or partially satisfies the Math component of a degree or certificate program at CSN.

Updated 10/12/2015