

GRANDE PRAIRIE REGIONAL COLLEGE

DEPARTMENT OF COMPUTING SCIENCE, MATHEMATICS and STATISTICS

Linear Algebra II **MA2250 3(3-1-0)**

Room: MA2250 A3 J 202 M F 11:30 – 12:50
F 10:00 – 10:50

Instructor: Dr. Reddy Ganta, J220, Ph. 539-2850 , rganta@gprc.ab.ca

Calendar Description

Vector spaces. Inner product spaces. Examples of n-space and the space of continuous functions. Gram-Schmidt process, QR-factorization of a matrix and least squares. Linear transformations, change of basis, similarity and diagonalization. Orthogonal diagonalization, quadratic forms. Applications in a variety of fields, numerical methods.

Prerequisite: MATH 1200 or 1020 or any linear algebra course, Mathematics 31 or any calculus course.

Transfer: UA, UC, UL, AU, AUC.

Text: Elementary Linear Algebra, Applications version (8th edition) by Howard Anton and Chris Rorres.

I will be placing some relevant texts and other supplemental readings on reserve in the library.

Assesment: Your final grade will be determined in the following manner:

Assignments	20%
Quizzes	10%
Mid Term Test	25%
Final Exam	45%