

MATH 463/563
Linear Algebra (3 units)

Course Outline

Topics	# of Weeks
Chapter 5: (Sections 1, 2 and 4) Diagonalization: Eigenvalues and Eigenvectors Diagonalizability Invariant Subspaces and Cayley-Hamilton Theorem	3.0
Chapter 6: (Sections 1, 2, 3, 4, 5, 6 and 7) Inner Product Spaces: Inner Products The Gram-Schmidt Orthogonalization Process and Orthogonal Components The Adjoint of a Linear Operator Normal, Self-Adjoint, Unitary and Orthogonal Operators Orthogonal Projections and the Spectral Theorem	7.0
Chapter 7: (Sections 1, 2 and 3) Canonical Forms: Jordan Canonical Form The Minimal Polynomial	3.0
Exams	1.0

Textbook: Linear Algebra, 4th Edition, by S. Friedberg, A. Insel and L. Spense,
Brooks/Cole Publishers

Adopted: September, 2008.