

COLUMBUS STATE COMMUNITY COLLEGE
MATHEMATICS DEPARTMENT
COURSE SYLLABUS

Course Number: MATH 152

Course Name: Calculus and Analytic Geometry II

Credit Hour: 5

Quarter Offered: Autumn, Winter, Spring, and Summer

Prerequisite: MATH 151 with a grade of "C" or higher

COURSE DESCRIPTION

Introduction to integral calculus: antiderivatives, definite integral, area under a curve, Fundamental Theorem of Calculus, integration of exponential, logarithmic, trigonometric, inverse trigonometric and hyperbolic functions, volume and surface area of solids of revolution, arclength, and methods of integration. Also includes L'Hopital's Rule and Improper Integrals. Applications to problems in science and engineering.

TEXTBOOK

Calculus: Early Transcendental Functions, 4th Edition, Larson/Hostetler/Edwards, Houghton-Mifflin, 2007

UNITS OF INSTRUCTION

5.1 - 5.9, 6.2 - 6.3, 7.1 - 7.6, 8.1- 8.8