

JAMESTOWN COMMUNITY COLLEGE

State University of New York

INSTITUTIONAL COURSE SYLLABUS

Course Title: Precalculus

Course Abbreviation and Number: MAT 1600

Credit Hours: 4

Course Type: Lecture

Course Description: Students will learn topics necessary for studying calculus and discrete mathematics. Algebra topics include rational and polynomial functions. Trigonometry topics include graphs, identities, half and double-angle formulas, and inverse trig functions. Other topics include exponential and logarithmic functions, and an introduction to limits. An approved graphing calculator is required.

Prerequisite: MAT1590 (or higher); or as determined by college placement.

General Education Requirements Met

SUNY
Math

Student Learning Outcomes:

Students who demonstrate understanding can:

1. Interpret and draw inferences from appropriate mathematical models such as formulas, graphs, and tables for polynomial, rational, exponential, logarithmic, and/or trigonometric functions. [SUNY Gen Ed -Mathematics]
2. Represent mathematical information symbolically, visually, numerically, or verbally as appropriate for various kinds of functions. [SUNY Gen Ed – Mathematics]
3. Employ quantitative methods such as operations on functions, application of trigonometric identities, and/or computation of limits to solve problems. [SUNY Gen Ed – Mathematics]

Topics Covered:

- Equations, Inequalities, and Functions
- Quadratic Functions and Models
- Polynomial and Rational Functions
- Limits and derivatives of functions
- Exponential and Logarithmic Functions
- Trigonometric Functions
- Analytic Trigonometry

Information for Students

- Expectations of Students
 - [Civility Statement](#)
 - [Student Responsibility Statement](#)
 - [Academic Integrity Statement](#)

- [Accessibility Services](#)

Students who require accommodations to complete the requirements and expectations of this course because of a disability must make their accommodation requests to the Accessibility Services Coordinator.

- [Get Help: JCC & Community Resources](#)
- [Emergency Closing Procedures](#)

- Course grade is determined by the instructor based on a combination of factors, including but not limited to, homework, quizzes, exams, projects, and participation. Final course grade can be translated into a grade point value according to the following:

A=4.0	B+=3.5	B=3	C+=2.5	C=2	D+=1.5	D=1	F=0
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- Veterans and active duty military personnel with special circumstances (e.g., upcoming deployments, drill requirements, VA appointments) are welcome and encouraged to communicate these to the instructor.

Effective Date: Spring 2026