

MATH 103 College Algebra

Online

Course Syllabus

Course Title and Number, Credits: MATH 103 College Algebra, 4 credits

Prerequisite: MATH 102 Intermediate Algebra, designated math placement test score, or instructor approval.

Course Description: Linear and quadratic equations, radicals, exponents and logarithms, rational expressions, systems of linear equations, functional notation, graphing sequences, and series.

Course Objectives: Students will learn techniques for solving problems related to the topics above. Students will develop ideas and methods for applying techniques to find solutions or resolutions to questions requiring algebraic reasoning. A graphing calculator will be used in appropriate areas.

Instructor: Jan Nahinurk

Office: Thatcher 1104

Phone: 701-228-5479

E-mail: Use online course eMail tool; if unable to access the online class, use campus email address - jan.nahinurk@dakotacollege.edu

Office Hours: Use the eMail tool within the online course to communicate with the instructor. Course eMail messages will be checked daily, Monday through Friday.

Technical Problems: If you have a technical problem, contact the Distance Education office by calling 1-701-228-5479 or 1-888-918-5623 (toll-free) or the Wimba/Moodle help desk: 1-866-940-0065

Class Schedule: Online

Learning Environment: The course utilizes an online learning system called ALEKS. Through ALEKS, students will have access to worked out explanations, textbook lessons, and video demonstrations.

Required Text: *College Algebra e-Text 2nd Edition* by John W. Coburn with ALEKS online learning software; McGraw Hill Publishing

Graphing Calculator: preferably TI-83 or TI-84 series

Course Requirements:

The sequential nature of mathematics deems it necessary for students to participate in class on a regular basis. *Active participation in the course is paramount.* Active participation means regularly accessing the online learning environment (ALEKS) and completing ALEKS learning activities (MyPie topics) and ALEKS assessments (topic mastery). In addition, students are expected to complete weekly homework assignments prior to the due dates and take exams on the scheduled dates.

Final grades are based on mastery of course topics (25%), scores on homework assignments (25%), and scores on comprehensive midterm and final exams (50%).

Letter grades are awarded using the scale below.

A = 90-100%

B = 80-89%

C = 70-79%

D = 60-69%

F = 59% or less

Course Outline:

- Review of Basic Concepts and Skills
- Equations and Inequalities
- Relations, Functions, and Graphs
- Polynomial and Rational Functions
- Exponential and Logarithmic Functions
- Systems of Equations and Inequalities

General Education Goals/Objectives:

Goal 2: Demonstrates knowledge and application of technology.

- Objective 2: Uses electronic resources for course related assignments and information
 - Skill 1: Selects appropriate program on the graphing calculator to solve problems

Goal 3: Demonstrates the ability to convert, calculate, and analyze a variety of mathematical problems

- Objective 1: Utilizes mathematical equations to solve problems
 - Skill1: Solves equations and problems using the appropriate method
- Objective 2: Applies practical application of mathematics to everyday life
 - Skill3: Solves word problems

Relationship to Campus Theme:

The student will use algebra to solve application problems in nature, economics, science, psychology, etc. The graphing calculator will be used to represent solutions visually and to find answers to complex problems.

Classroom Policies:

- Regular participation is expected.
- All homework and exams are delivered and submitted via the Internet.
- Students need to set up or select an environment conducive for learning (e.g. distraction-free area at home, a computer lab at a library, etc.)
- Homework assignments are due by dates posted on the course calendar. Students may work ahead.
- Tests must be taken on the dates designated on the course calendar.
- Tests will be available for a limited amount of time.

Academic Integrity:

The academic community is operated on the basis of honesty, integrity and fair play. It is the expectation that all students, as members of the college community, adhere to the highest levels of academic integrity. This means that:

- Students are responsible for submitting their own work. Student work must not be plagiarized.
- Students must not cooperate on oral or written examinations or work together on evaluated assignments without authorization.
- If there is evidence of cheating on an exam the student will receive an F on the respective exam.

Violations of academic principles such as cheating, plagiarism or other academic improprieties will be handled using the guidelines outlined in the [Student Handbook](#) on pages 18, 19, and 37.

Disabilities and Special Needs:

If you have a disability for which you need accommodation, contact the Learning Center to request disability support services: phone 701-228-5477 or toll-free 1-888-918-5623.