Northwest Arkansas Community College
(Science and Mathematics Division)

Discipline Code
MATH

Course Number
0112

Course Title
Foundations of College Algebra

Catalog Description
This is a co-requisite course for those students who do not meet the prerequisite for MATH 1203, but who have either completed MATH 0053 or have an appropriate placement score. Topics include foundational math topics not already included in MATH 1203. This course can only be taken concurrently with MATH 1203 and cannot be taken alone.

Co-requisites
MATH 1203

Prerequisites
MATH 0053 with a C or better, or appropriate placement scores.

Credit Hours
2 credit hours

Contact hours
30 lecture contact hours

Load hours
2 load hours

Semesters Offered
Fall & Spring

ACTS Equivalent
No ACTS Equivalent

Grade Mode
A-F

Learning Outcomes

Students completing Foundations of College Algebra, MATH 0112, should be able to do the topics necessary to support completion of MATH 1203, College Algebra, which covers but is not limited to the following:

- Solve and graph linear equations and inequalities
- Solving systems of linear equations
- Factor polynomials in one variable
- Recognize functionality; find domain and range of a relation, evaluate a function, and graph basic functions
- Solve basic quadratic, rational, and radical equations
- Simplify exponential, rational, and radical expressions

General Education Outcomes Supported

- Students can achieve mathematical literacy.

Standard Practices

Topics list

- Multi-step equations
- Properties of exponents
- Functions and graphs
- Polynomials and factoring
- Rational expressions and equations
- Radical expressions and equations
- Quadratic equations and functions
- Systems of linear equations
- Approaches to application problems
- Other topics necessary for success in MATH 1203, College Algebra

Assessments

- Each instructor will include a set of departmental final exam questions on their final exam. Approval to include the questions on another end-of-semester assessment tool may be granted if inclusion on the final exam is not possible.
- These questions will be in direct support of the Learning Outcomes. Department-wide results for these questions will be reported when final grades are submitted.

Grading guidelines

- At least 70% of the student's final grade should come from proctored work.

Last Revision Date: Spring 2022