

Algebra 2A

Unit 1—Week 1

Day	Activity
1	Pretest—Unit 1
2	Evaluating Rational Expressions
3	Restrictions on Rational Expressions
4	Equivalent Forms of Rational Expressions
5	Simplifying Rational Expressions

Unit 1—Week 2

Day	Activity
1	Sum of Rational Expressions, Part 1
2	Difference of Rational Expressions, Part 1
3	Product of Rational Expressions
4	Quotient of Rational Expressions
5	Common Denominators of Rational Expressions

Unit 1—Week 3

Day	Activity
1	Sum of Rational Expressions, Part 2
2	Difference of Rational Expressions, Part 2
3	Review: Rational Expressions
4	Review: Rational Expressions (continued)
5	Posttest—Unit 1

Unit 2—Week 1

Day	Activity
1	Pretest—Unit 2
2	The Coordinate Plane
3	Graphing Ordered Pairs
4	Solutions of Linear Equations as Ordered Pairs
5	Graphing a Linear Equation in 2 Variables
	Graphing a Linear Inequality in 2 Variables

Unit 2—Week 2

Day	Activity
1	Slope of a Line from 2 Points
2	The y -Intercept of a Line
3	Using the Slope and y -Intercept to Graph a Line
4	Finding the Slope and y -Intercept from an Equation
5	Writing Equations in Slope-Intercept Form

Unit 2—Week 3

Day	Activity
1	Calculating the Slope of a Line
2	Point-Slope and Slope-Intercept Forms of Equations
3	Identifying Graphs from Their Equations
4	Parallel Lines and Their Slopes
5	Perpendicular Lines and Their Slopes

Unit 2—Week 4

Day	Activity
1	Equations of Parallel or Perpendicular Lines
2	Equation of a Line Given a Point and Parallel Line
3	Equation of a Line Given a Point and Perpendicular Line
4	Review: Graphs
5	Posttest—Unit 2

Unit 3—Week 1

Day	Activity
1	Pretest—Unit 3
2	Solving Linear Systems of Equations: Graphs
3	Classifying Linear Systems:
4	Solving Linear Systems of Inequalities: Graphs
5	Solving Linear Systems of Equations: Substitution

Unit 3—Week 2

Day	Activity
1	Solving Linear Systems of Equations: Addition
2	Solving Linear Systems of Equations: Matrices 1
3	Solving Linear Systems of Equations: Matrices 2
4	Solving Linear-Quadratic Systems of Equations
5	Solving Problems with Linear Systems

Unit 3—Week 3	
Day	Activity
1	Review: Linear Systems
2	Chance Experiments and Probability
3	Determining the Probability of an Event
4	Determining Probabilities of Mutually Exclusive Events, Independent Events, and Dependent Events
5	Multiplication Principle of Counting

Unit 3—Week 4	
Day	Activity
1	Review: Probability
2	Introduction to Vectors
3	Vector Addition
4	Posttest—Unit 3
5	End-of-Semester Test—Algebra 2A

Algebra 2B

Unit 1—Week 1	
Day	Activity
1	Pretest—Unit 1
2	Rules for Exponents and Radicals
3	Rationalizing the Denominator in Rational Expressions
4	Applying Rules for Exponents and Radicals
5	Scientific Notation

Unit 1—Week 2	
Day	Activity
1	Simplifying Algebraic Expressions
2	Multiplying Algebraic Expressions
3	Factoring Algebraic Expressions
4	Factoring Sums and Differences of Perfect Cubes
5	Factoring or Using the Quadratic Formula

Unit 1—Week 3	
Day	Activity
1	Rational Expressions: Simplify
2	Rational Expressions: Add and Subtract
3	Rational Expressions: Multiply and Divide
4	Dividing Polynomials Using Synthetic Division
5	Simplifying Complex Fractions

Unit 1—Week 4	
Day	Activity
1	Evaluating Expressions with Absolute Value
2	Solving Absolute Value Equations and Inequalities
3	Absolute Value, Inequalities, and Interval Notation
4	Solving Equations Containing Radical Expressions
5	Solving Equations Involving Algebraic Fractions

Unit 1—Week 5	
Day	Activity
1	Graphing Linear Inequalities in 1 Variable
2	Graphing with Restrictions on the Variable
3	Graphing Solution Sets of Associated Inequalities
4	Graphing Solution Sets of Associated Inequalities (continued)
5	Posttest—Unit 1

Unit 2—Week 1	
Day	Activity
1	Pretest—Unit 2
2	Direct, Inverse, and Joint Variation
3	Perpendicular Bisector of a Line Segment
4	Distance between 2 Points
	Distance between a Point and a Line
5	Distance and Circles

Unit 2—Week 2	
Day	Activity
1	Parabola and Its Intercepts
2	Parabola and Its Vertex
3	Parabola and Its Coefficients
4	Ellipse
5	Hyperbola

Unit 2—Week 3	
Day	Activity
1	Equations of Ellipses and Hyperbolas
2	Defining a Function with Its Rule
3	Finding Values of a Function Using Its Rule
4	Equations and Graphs of Functions, Part 1
	Equations and Graphs of Functions, Part 2
5	Graphing Piecewise Functions

Unit 2—Week 4	
Day	Activity
1	Graphing Absolute Value Functions
2	Translations and Transformations
3	Functional Values
4	Operations on Functions
5	Composite Functions

Unit 2—Week 5	
Day	Activity
1	Domain Values of Composite Functions
2	Inverse of a Function
3	Determining if a Function Has an Inverse
4	Solving Problems with Linear Functions
	Solving Problems with Quadratic Functions
5	Posttest—Unit 2

Unit 3—Week 1	
Day	Activity
1	Pretest—Unit 3
2	Properties of Exponential Functions
3	Properties of Logarithmic Functions
4	Recognizing Graphs of Types of Functions
5	Solving Problems: Exponential and Logarithmic

Unit 3—Week 2

Day	Activity
1	Exponential Growth
2	Exponential Decay
3	Plotting Complex Numbers in the Plane
4	Adding and Subtracting Complex Numbers
5	Multiplying and Dividing Complex Numbers

Unit 3—Week 3

Day	Activity
1	Solve Quadratic Equations in the Complex Number System
2	Introduction to Sequences and Series
3	Arithmetic Sequences and Series
	Geometric Sequences and Series
4	Posttest—Unit 3
5	End-of-Semester Test—Algebra 2B