23-24 Algebra 1 Pacing Guide

4.0 Target	3.0 Target	T1	T2	T3
Solving Linear Equations and Inequalities				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Create an equation in one-variable to represent a relationship with constraints, solve the equation, and interpret the solutions.	X		
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Solve equations in terms of other variables.	X		
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Create an inequality in one-variable to represent a relationship with constraints, solve the inequality, interpret the solutions, and represent the solution graphically.	X		
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Solve two linear inequalities in one variable (compound inequalities) and represent the solution graphically.	X		
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.	X		
Graph and Write Equations of Lines				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Calculate and interpret key features of linear functions represented by graphs, tables, and equations in and out of context.	X		
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Use function notation to evaluate functions and interpret function notation in terms of context.	X		
Does Not Extend	Graph a linear equation and inequality.	X		
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Create linear equations and inequalities represented by graphs, tables, and situations.	X		
Does Not Extend	Demonstrate ability to retain content knowledge of linear functions.	X		
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.	X		
Statistical Models of Linear Functions				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Use the regression line to make predictions, analyze, and interpret all key features, including the correlation coefficient of a linear model.	X		
Does Not Extend	Distinguish between correlation and causation given a real world context and write an approriate interpretation.	X		
Does Not Extend	Assess the fit of a function by analyzing residual plots.	X		
Does Not Extend	Demonstrate ability to retain content knowledge of systems of linear functions.	X		
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.	X		
System of Linear Equations and Inequalities				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Create a system of linear equations and inequalities to represent a relationship between quantities.		X	
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Solve systems of linear equations and inequalities by graphing and interpret the solution as viable or nonviable in a modeling context.		X	
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Solve systems of linear equations by substitution or linear combination and interpret the solution as viable or nonviable in a modeling context.		X	
Does Not Extend	Demonstrate ability to retain content knowledge of linear functions.		X	
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.		X	
Exponential Properties				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Apply the properties of exponents to rewrite algebraic expressions with integer and rational exponents. *non-calculator*		X	
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Write radical expressions as expressions with rational exponents, and write expressions with rational exponents as radical expressions. *non-calculator*		X	
Does Not Extend	Demonstrate ability to retain content knowledge of systems of linear equations and inequalities.		X	
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.		X	
Graph and Write Exponential Functions				
Does Not Extend	Calculate and interpret key features of functions represented by graphs, tables, and equations in and out of context.		X	
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Graph exponential functions, showing intercepts and end behavior. *non-calculator*		X	
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Create exponential equations given a graph, table, or situation. *non-calculator*		X	
Does Not Extend	Solve equations and inequalities using graphs and tables using technology.		X	

Does Not Extend	Use the exponential regression equation to make predictions, analyze, and interpret all key features.		X	
Does Not Extend	Demonstrate ability to retain content knowledge of exponential functions.		X	
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.		X	
Polynomials and Factoring				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Add, subtract, and multiply polynomial expressions to simplify completely.			X
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Factor polynomial expressions completely.			X
Does Not Extend	Demonstrate ability to retain content knowledge of exponential functions.			X
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.			X
Graph and Write Quadratic Functions				
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Calculate and interpret key features of functions represented by graphs, tables and equations in and out of context.			X
Does Not Extend	Graph quadratic functions and show key features.			X
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Create quadratic equations given a graph, table, or situation.			X
Does Not Extend	Rewrite quadratic functions in different but equivalent forms to reveal and explain key features.			X
Does Not Extend	Analyze the regression equation or determine whether this is a linear, quadratic or exponential model.Use technology to generate the appropriate regression equation and make predictions.			X
Does Not Extend	Demonstrate ability to retain content knowledge of polynomials and factoring.			X
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.			X
Solve Quadratic Equations				
Does Not Extend	Solve quadratic equations by finding square roots, factoring, and quadratic formula and recognize the relationship between the solutions and zeros of the function it represents.			X
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Recognize rational and irrational numbers and approximate irrational numbers with or without a calculator and rewrite radicals into equivalent forms. *non-calculator*			X
Students have multiple ways to demonstrate extension. For more information or to see a scoring rubric, contact your child's teacher.	Solve a system consisting of a linear equation and a quadratic equation in two variables algebraically and graphically.			X
Does Not Extend	Solve equations and inequalities using graphs and tables and by using technology.			X
Does Not Extend	Demonstrate ability to retain content knowledge of quadratic functions.			X
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.			X
Descriptive Statistics				
Does Not Extend	Represent data using histograms, and box-plots and analyze information from the graphical display of data.			X
Does Not Extend	Analyze and interpret shape, center, and spread in the context of the data sets, accounting for possible effects of extreme data points (outliers).			X
Does Not Extend	Use statistics appropriate to the shape of the data distribution to compare center (mean, median) and spread (interquartile range, standard deviation) of two different data sets.			X
Does Not Extend	Demonstrate ability to retain content knowledge of solving quadratic functions.			X
Does Not Extend	Demonstrates ability to be precise when solving problems and/or when communicating mathematical thinking.			X