Student Pie Chart

Print

08/15/2016 Learning

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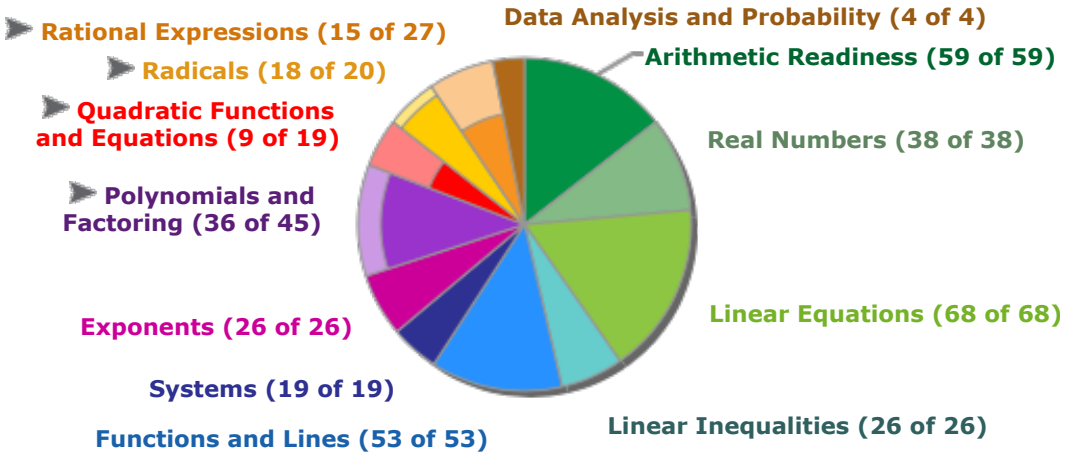
Total Hours: 104 hours 36 minutes

Course Mastery
(371 of 404 topics)



Josiah's State Standards Report

View Common Core Georgia Performance Standards (CCGPS) report

What Josiah Can Do

Arithmetic Readiness

Fractions
- Mixed arithmetic operations with fractions

Geometry
- Area of a triangle
- Circumference and area of a circle
- Volume of a rectangular prism

- Identifying numbers as rational or irrational
- Plotting rational numbers on a number line
- Ordering real numbers

Properties of Real Numbers

- Properties of real numbers

Linear Equations

Multi-Step Linear Equations

- Solving equations with zero, one, or infinitely many solutions
- Algebraic symbol manipulation: Problem type 2

Writing Expressions and Equations

- Translating a sentence into a multi-step equation

Applications

- Solving a word problem involving consecutive integers
- Solving a value mixture problem using a linear equation
- Word problem on unit rates associated with ratios of whole numbers: Decimal answers
- Finding a side length given the perimeter and side lengths with variables
- Finding the value for a new score that will yield a given mean

Proportions

- Solving a proportion of the form a/(x+b) = c/x

Percents

- Applying the percent equation
- Finding the original price given the sale price and percent discount
- Finding the percentage increase or decrease: Advanced
- Finding simple interest without a calculator

Measurement and Unit Conversion

- Metric distance conversion with whole number values
- Converting between metric and U.S. Customary unit systems
- Converting between temperatures in Fahrenheit and Celsius

Linear Inequalities

Writing and Graphing Inequalities

- Translating a sentence into a one-step inequality

Linear Inequalities and Applications

- Solving a two-step linear inequality with a fractional coefficient
- Solving a linear inequality with multiple occurrences of the variable: Problem type 2
- Solving a linear inequality with multiple occurrences of the variable: Problem type 3
- Solving a decimal word problem using a two-step linear inequality

Absolute Value Inequalities

- Solving an absolute value inequality: Problem type 2
- Solving an absolute value inequality: Problem type 4

Functions and Lines

Sets, Relations, and Functions

- Identifying functions from relations
- Vertical line test

Graphing Lines

- Graphing a line by first finding its x- and y-intercepts
- Graphing a line by first finding its slope and y-intercept

Finding the slope of horizontal and vertical lines
Finding the coordinate that yields a given slope
Writing an equation in point-slope form given the slope and a point
Writing the equation of the line through two given points
Writing the equations of vertical and horizontal lines through a given point

Applications

Writing an equation and drawing its graph to model a real-world situation: Advanced
Interpreting the parameters of a linear function that models a real-world situation
Application problem with a linear function: Finding a coordinate given the slope and a point
Application problem with a linear function: Finding a coordinate given two points
Identifying parallel and perpendicular lines from equations
Writing equations of lines parallel and perpendicular to a given line through a point

Direct Variation

Identifying direct variation equations
Identifying direct variation from ordered pairs and writing equations

Absolute Value Functions

Graphing an absolute value equation in the plane: Basic

Systems

Systems of Linear Equations

Classifying systems of linear equations from graphs
Graphically solving a system of linear equations
Solving a system of linear equations with fractional coefficients
Solving a system of linear equations with decimal coefficients

Applications

Solving a word problem using a system of linear equations of the form Ax + By = C
Solving a word problem using a system of linear equations of the form y = mx + b
Solving a value mixture problem using a system of linear equations
Solving a distance, rate, time problem using a system of linear equations

Systems of Linear Inequalities

Graphing a system of two linear inequalities: Basic

Exponents

Properties of Exponents

Evaluating an expression with a negative exponent: Negative integer base
Product rule with negative exponents
Understanding the power rules of exponents
Power and product rules with positive exponents
Power and quotient rules with negative exponents: Problem type 2

Scientific Notation

Multiplying and dividing numbers written in scientific notation

Polynomials and Factoring

Polynomial Expressions

Degree and leading coefficient of a univariate polynomial
Multiplying conjugate binomials: Multivariate

Multiplication involving binomials and trinomials in one variable
Dividing a polynomial by a monomial: Univariate
Polynomial long division: Problem type 2

Factoring Using the GCF
Greatest common factor of two multivariate monomials
Greatest common factor of three univariate monomials

Factoring by Grouping
Factoring out a binomial from a polynomial: GCF factoring, basic
Factoring a univariate polynomial by grouping: Problem type 2
Factoring a multivariate polynomial by grouping: Problem type 1

Factoring Quadratic Trinomials
Factoring out a constant before factoring a quadratic
Factoring a quadratic with leading coefficient greater than 1: Problem type 3
Factoring a quadratic in two variables with leading coefficient greater than 1

Solving Quadratic Equations by Factoring
Finding the roots of a quadratic equation of the form $ax^2 + bx = 0$
Finding the roots of a quadratic equation with leading coefficient greater than 1

Quadratic Functions and Equations

Quadratic Functions
Finding the vertex, x-intercepts, and axis of symmetry from the graph of a parabola
Domain and range from the graph of a parabola
Graphing a parabola of the form $y = ax^2 + bx + c$: Integer coefficients
Writing an equation for a function after a vertical translation

Quadratic Equations
Solving a quadratic equation using the square root property: Decimal answers, basic

Radicals

Radical Functions
Domain of a square root function

Radical Expressions
Simplifying a sum or difference of radical expressions: Multivariate
Simplifying a product of radical expressions: Multivariate
Simplifying a product involving square roots using the distributive property: Advanced
Rationalizing the denominator of a radical expression

Radical Equations
Solving a radical equation that simplifies to a linear equation: Two radicals

Pythagorean Theorem and Distance Formula
Pythagorean Theorem
Distance between two points in the plane: Exact answers

Rational Expressions

Rational Expressions
Restriction on a variable in a denominator: Linear
Introduction to the LCM of two monomials
Adding rational expressions with common denominators and binomial

Complex fraction without variables: Problem type 2
Complex fraction involving multivariate monomials

Applications

Solving a work problem using a rational equation
Writing an inverse variation equation
Word problem on inverse variation

Data Analysis and Probability

Data Analysis

Mode of a data set
Mean and median of a data set

and many other more elementary topics.

What Josiah is Ready to Learn Next

Polynomials and Factoring

Factoring Quadratic Trinomials

Factoring a quadratic with a negative leading coefficient
Factoring a product of a quadratic trinomial and a monomial

Factoring Special Products

Factoring a perfect square trinomial with leading coefficient greater than 1
Factoring a difference of squares in one variable: Advanced

Solving Quadratic Equations by Factoring

Solving a quadratic equation needing simplification
Solving a word problem using a quadratic equation with rational roots

Quadratic Functions and Equations

Quadratic Functions

Finding the x-intercept(s) and the vertex of a parabola
Finding the maximum or minimum of a quadratic function
How the leading coefficient affects the shape of a parabola

Quadratic Equations

Solving a quadratic equation using the square root property: Decimal answers, advanced
Applying the quadratic formula: Decimal answers
Applying the quadratic formula: Exact answers
Discriminant of a quadratic equation

Radicals

Radical Functions

Graphing a square root function

Rational Expressions

Rational Expressions

Domain of a rational function: Excluded values

History

Learning Data Since Last Assessment

Assessment performance

Progress Assessment	06/30/2016	90 +2 %	8	2.8	2.9
Progress Assessment	06/21/2016	86 +5 %	20	7.1	2.8
Progress Assessment	06/15/2016	82 +5 %	20	5.3	3.7
Progress Assessment	06/08/2016	79 +5 %	20	7.2	2.8
Progress Assessment	05/17/2016	76 +5 %	20	9.8	2.0
Progress Assessment	05/03/2016	74 +5 %	20	8.8	2.3
Progress Assessment	04/22/2016	70 +5 %	20	7.6	2.6
Progress Assessment	03/18/2016	68 +5 %	20	7.3	2.7
Progress Assessment	03/09/2016	63 +6 %	24	5.1	4.7
Progress Assessment	02/24/2016	60 +5 %	23	5.1	4.5
Progress Assessment	02/10/2016	55 +5 %	20	5.8	3.5
Progress Assessment	02/01/2016	50 +5 %	20	5.5	3.7
Progress Assessment	01/20/2016	45 +5 %	20	5.4	3.7
Initial Assessment	01/11/2016	36 +8 %	31	5.0	6.1
Free Trial Assessment	01/04/2016		0	-	-

Legend: Content mastered based on the assessment ( ), Progress made in Learning Mode ( ),
Content that is not yet mastered ( ) , assessment not completed ( ) , Not assessed in this course (/Hide these assessments)

Learning Log

Polynomials and Factoring

Factoring by Grouping

Factoring a univariate polynomial by grouping: Problem type 1	41 days ago
Factoring a univariate polynomial by grouping: Problem type 2	41 days ago
Factoring a multivariate polynomial by grouping: Problem type 1	41 days ago

Factoring Quadratic Trinomials

Factoring a quadratic in two variables with leading coefficient 1	41 days ago
Factoring a quadratic with leading coefficient greater than 1: Problem type 3	41 days ago
Factoring a quadratic in two variables with leading coefficient greater than 1	40 days ago

Solving Quadratic Equations by Factoring

Finding the roots of a quadratic equation with leading coefficient 1	40 days ago
Finding the roots of a quadratic equation with leading coefficient	40 days ago

Common Core Georgia Performance Standards (CCGPS) for Coordinate Algebra (2011) Report for Josiah Meadows on 08/15/2016

Expand the Details to see topics mastered and not mastered. Select a topic to generate sample problems/explanations.

(RL): Ready to Learn topic
TD: Teacher Directed

Number and Quantity

N-Q: Quantities

MCC9-12N-Q.1: Apply and interpret units; interpret the scale and the origin in graphs	**5 out of 5**
MCC9-12N-Q.2: Define appropriate quantities for the purpose of descriptive modeling	**9 out of 9**
MCC9-12N-Q.3: Choose appropriate levels of accuracy on measurements	**TD**

Algebra

A-SSE: Seeing Structure in Expressions

MCC9-12A-SSE.1: Interpret expressions that represent a quantity	
MCC9-12A-SSE.1.a: Interpret parts of an expression e.g., terms, factors, coefficients	**5 out of 5**
MCC9-12A-SSE.1.b: Interpret expressions by viewing their parts as a single entity	**3 out of 3**

A-CED: Creating Equations

MCC9-12A-CED.1: Create and apply equations and inequalities in one variable	**17 out of 17**
MCC9-12A-CED.2: Create equations in two or more variables; graph equations	**5 out of 5**
MCC9-12A-CED.3: Represent constraints by equations or inequalities	**5 out of 5**
MCC9-12A-CED.4: Rearrange formulas to highlight a quantity of interest	**3 out of 3**

A-REI: Reasoning with Equations & Inequalities

MCC9-12A-REI.1: Explain each step in solving a simple equation	**TD**
MCC9-12A-REI.3: Solve linear equations and inequalities in one variable	**40 out of 40**
MCC9-12A-REI.5: Operate on a system of equations to produce another with the same solutions	**TD**
MCC9-12A-REI.6: Solve systems of linear equations	**7 out of 7**
MCC9-12A-REI.10: Understand what the graph of an equation in two variables means	**5 out of 5**
MCC9-12A-REI.11: Explain why the points where f(x) intersects g(x) are the solutions to f(x)=g(x)	**TD**
MCC9-12A-REI.12: Graph linear and systems of linear inequalities in two variables	**4 out of 4**

Functions

F-IF: Interpreting Functions

MCC9-12F-IF.1: Understand functions; the graph of f is the graph of y = f(x)	**3 out of 3**
MCC9-12F-IF.2: Use and interpret function notation; evaluate functions	**2 out of 2**
MCC9-12F-IF.3: Recognize that sequences are functions	**TD**
MCC9-12F-IF.4: For a function, interpret and sketch key features	**1 out of 1**

MCC9-12F-IF.6: Calculate and interpret the rate of change of a function **TD**

MCC9-12F-IF.7: Graph functions expressed symbolically and show key features

MCC9-12F-IF.7.a: Graph linear functions; show intercepts, maxima, minima **11 out of 11**

MCC9-12F-IF.7.e: Graph exponential functions showing intercepts and end behavior **TD**

MCC9-12F-IF.9: Compare properties of two functions represented in a different way **TD**

F-BF: Building Functions

MCC9-12F-BF.1: Write a function that describes a relationship between two quantities

MCC9-12F-BF.1.a: Determine an explicit expression, a recursive process, or steps for calculation **3 out of 3**

MCC9-12F-BF.1.b: Combine standard function types using arithmetic operations **TD**

MCC9-12F-BF.2: Write and use arithmetic and geometric sequences **TD**

MCC9-12F-BF.3: Identify the effect on the graph of replacing f(x) by f(x) + k, kf(x), f(kx), f(x + k) **2 out of 3**

F-LE: Linear, Quadratic, & Exponential Models

MCC9-12F-LE.1: Distinguish situations that can be modeled with functions

MCC9-12F-LE.1.a: Prove the way linear functions and exponential functions grow **TD**

MCC9-12F-LE.1.b: Recognize situations that exhibit constant rate of change **4 out of 4**

MCC9-12F-LE.1.c: Recognize situations that exhibit grow/ decay by a constant percent rate **TD**

MCC9-12F-LE.2: Construct linear and exponential functions **9 out of 9**

MCC9-12F-LE.3: Observe that exponential increase exceeds that of polynomial functions **TD**

MCC9-12F-LE.5: Interpret the parameters in a linear or exponential function **3 out of 3**

Statistics and Probability

S-ID: Interpreting Categorical & Quantitative Data

MCC9-12S-ID.1: Represent data with plots on the real number line **TD**

MCC9-12S-ID.2: Compare center and spread of two or more different data sets **TD**

MCC9-12S-ID.3: Interpret differences in shape, center, and spread in data **TD**

MCC9-12S-ID.5: Summarize and analyze data for two categories in two-way frequency tables **TD**

MCC9-12S-ID.6: Represent data on two quantitative variables on a scatter plot

MCC9-12S-ID.6.a: Fit a function to the data; use functions fitted to data to solve problems **TD**

MCC9-12S-ID.6.b: Assess the fit of a function by plotting and analyzing residuals **TD**

MCC9-12S-ID.6.c: Fit a linear function for a scatter plot suggesting a linear association **TD**

MCC9-12S-ID.7: Interpret the slope and intercept in the context of the data **TD**

MCC9-12S-ID.8: Compute and interpret the correlation coefficient of a linear fit **TD**

MCC9-12S-ID.9: Distinguish between correlation and causation **TD**