

Sixth Grade Math Common Core State Standards

Standard	I Can Statements
Ratios and Proportional Relationships	
6.RP.1	<p>I can use ratio language to describe the relationship between two quantities.</p> <p>I can write a ratio to describe the relationship between two quantities using the three standard forms.</p>
6.RP.2	<p>I can use words to describe a unit rate.</p> <p>I can write ratios in the form of a/b and $a:b$.</p>
6.RP.3.a	<p>I can make and use tables to find equivalent ratios.</p> <p>I can find missing values in tables of equivalent ratios.</p> <p>I can plot the pairs of values in a table on a coordinate plane.</p> <p>I can use tables to compare ratios.</p> <p>I can use a tape diagram to reason about ratios.</p> <p>I can use equations to reason about equivalent ratios.</p>
6.RP.3.b	<p>I can solve unit rate problems dealing with unit pricing.</p> <p>I can solve unit rate problems involving constant speed.</p>
6.RP.3.c	<p>I can understand that percent deals with hundredths.</p> <p>I can find a percent of a quantity as a rate per 100.</p> <p>I can find the whole given a part and the percent.</p>
6.RP.3.d	<p>I can convert measurement units.</p> <p>I can transform units when multiplying or dividing quantities.</p>
Number System	
6.NS.1	<p>I can divide fractions to find the quotient.</p> <p>I can interpret the meaning of the quotient.</p> <p>I can solve story problems using division of fractions by fractions.</p> <p>I can write story problems that involve the division of fractions. I can use a visual model to represent division of fractions.</p> <p>I can use the relationship between multiplication and division to explain division of fractions.</p> <p>I can write an equation to solve a problem using division of fractions.</p>
6.NS.2	I can fluently divide multi-digit numbers using the standard algorithm.
6.NS.3	<p>I can fluently add multi-digit decimals using the standard algorithm.</p> <p>I can fluently subtract multi-digit decimals using the standard algorithm.</p> <p>I can fluently multiply multi-digit decimals using the standard algorithm.</p> <p>I can fluently divide multi-digit decimals using the standard algorithm.</p>
6.NS.4	<p>I can find the greatest common factor of two whole numbers less than or equal to 100.</p> <p>I can find the least common multiple of two whole numbers less than or equal to 12.</p> <p>I can use the distributive property to express a sum of two whole numbers 1-100 with a common factor as a multiple of a sum of two whole numbers with no common factor.</p>
6.NS.5	I can understand that positive and negative numbers are used together to

	<p>describe quantities having opposite directions or values on a number line. I can use positive and negative numbers to represent quantities in real-world contexts.</p>
6.NS.6.a	<p>I can recognize opposite signs of numbers as indicating locations on opposite sides of 0 on the number line. I can recognize that the opposite of the opposite of a number is the number itself. I can understand that 0 is its own opposite.</p>
6.NS.6.b	<p>I can understand the signs of numbers in ordered pairs indicate the location of the point in a quadrant on the coordinate plane. I can recognize that when two ordered pairs differ only by signs the locations of the points are reflections across one or both axes.</p>
6.NS.6.c	<p>I can find and place integers and other rational numbers on a number line. I can find and plot ordered pairs on a coordinate plane.</p>
6.NS.7.a	<p>I can interpret statements of inequality as statements about the relative position of two numbers on a number line.</p>
6.NS.7.b	<p>I can write inequality statements dealing with real-world situations. I can interpret and explain inequalities as they pertain to real-world situations.</p>
6.NS.7.c	<p>I can understand the absolute value of a rational number as its distance from 0 on the number line. I can interpret absolute value as magnitude for a positive or negative quantity in a real-world situation.</p>
6.NS.7.d	<p>I can compare and order the absolute value of numbers.</p>
6.NS.8	<p>I can solve real-world problems by graphing ordered pairs in all four quadrants of a coordinate plane. I can use coordinate and absolute value to find the distance between points with the same first coordinate or the same second coordinate.</p>
Expressions and Equations	
6.EE.1	<p>I can write expressions involving whole-number exponents. I can evaluate numerical expressions involving whole-number exponents.</p>
6.EE.2.a	<p>I can write expressions containing variables. I can evaluate expressions containing variables.</p>
6.EE.2.b	<p>I can identify parts of an expression using mathematical terms sum, term, product, factor, quotient, coefficient. I can describe expressions as the product of two factors and as the sum of two terms.</p>
6.EE.2.c	<p>I can evaluate expressions using specific values of their variables. I can solve formulas used in real-world situations. I can use order of operations to evaluate expressions. I can use formulas to solve for volume and surface area of cubes.</p>
6.EE.3	<p>I can apply properties of operations to generate equivalent expressions.</p>
6.EE.4	<p>I can identify when two expressions are equivalent. I can combine like terms to create equivalent expressions.</p>
6.EE.5	<p>I can understand solving an equation or inequality is a process of answering a question.</p>

	<p>I can determine which value from a set make an equation or inequality true.</p> <p>I can use substitution to determine whether a number in a set makes an equation or inequality true.</p>
6.EE.6	<p>I can use variables to represent numbers.</p> <p>I can write expressions when solving a real-world or mathematical problems.</p> <p>I can understand that a variable can represent an unknown number or a number in a set of numbers.</p>
6.EE.7	<p>I can solve real-world problems by writing and solving equations where the variables are all nonnegative rational numbers.</p> <p>I can solve mathematical problems by writing and solving equations where the variables are all nonnegative rational numbers.</p>
6.EE.8	<p>I can write an inequality to represent a constraint or condition in a real-world or mathematical problem.</p> <p>I can recognize inequalities in the form $x > c$ or $x < c$ have an infinite number of solutions.</p> <p>I can represent solutions to inequalities on a number line.</p>
6.EE.9	<p>I can use variables to represent two quantities in a real-world problem that change in relationship to one another.</p> <p>I can write an equation to describe one quantity in terms of the other quantity.</p> <p>I can analyze the relationship between dependent and independent variables in a table.</p> <p>I can analyze the relationship between dependent and independent variables in a graph.</p>
Geometry	
6.G.1	<p>I can find the area of right triangles and other triangles.</p> <p>I can find the area of quadrilaterals and polygons by composing into rectangles or decomposing into triangles and other shapes.</p> <p>I can find the area of polygons in real-world and mathematical problems.</p>
6.G.2	<p>I can find the volume of a right rectangular prism using unit cubes.</p> <p>I can find the volume of a right rectangular prism using mathematical formulas.</p> <p>I can find the volume of right rectangular prisms in real-world problems.</p>
6.G.3	<p>I can draw polygons in the coordinate plane given coordinates for the vertices.</p> <p>I can use coordinates to find the length of a side joining points with the same first or same second coordinate.</p> <p>I can apply these techniques to solve real-world and mathematical problems.</p>
6.G.4	<p>I can represent three-dimensional figures using nets made up of rectangles and triangles.</p> <p>I can use nets to find the surface area of three-dimensional figures.</p> <p>I can apply the use of nets to solve real-world and mathematical problems.</p>
Statistics and Probability	
6.SP.1	I can recognize the difference between a statistical and non-statistical

	<p>question.</p> <p>I can recognize that in a statistical question variability is anticipated.</p>
6.SP.2	<p>I can understand that data collected to answer a statistical question has a distribution that can be described by its center, spread, and overall shape.</p> <p>I can find the center of a data set.</p>
6.SP.3	<p>I can be able to calculate the mean of a data set.</p> <p>I can be able to calculate the median of a data set.</p> <p>I can be able to calculate the range of a data set.</p>
6.SP.4	<p>I can be able to display data on a number line.</p> <p>I can be able to display data on a dot plot.</p> <p>I can be able to display data on a histogram.</p> <p>I can be able to display data on a box plot.</p>
6.SP.5.a	I can report the number of observations in a data set.
6.SP.5.b	I can describe the nature of the attribute and how it was measured and the units of measurement used.
6.SP.5.c	<p>I can be able to calculate the mean of a data set.</p> <p>I can be able to calculate the median of a data set.</p> <p>I can be able to calculate the inter quartile range of a data set.</p> <p>I can be able to identify outliers of a data set.</p>
6.SP.5.d	I can be able to identify the best measure of central tendency based on the context that the data were gathered.