ARCHDIOCESE of MILWAUKEE

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
Ratios and Proportional Relationships				
		6.RP.1	*Understand the concept of a ratio and use ratio language to describe a ratio relationship between two quantities supports standard 6.RP.3*	No special considerations for curricula well aligned to understanding ratio concepts and using ratio reasoning to solve problems, as detailed in this cluster**. Time spent on instruction and practice should NOT be reduced.**
		6.RP.2	*Understand the concept of a unit rate a/b associated with a ratio a:b with b ≠ 0, and use rate language in the context of a ratio relationship supports standard 6.RP.3*	
6.RP.3	Uses ratio and rate reasoning to solve problems.			
		6.MP.1	*Make sense of problems and persevere in solving them supports 6.RP.3.*	
		6.MP.8	*Look for and express regularity in repeated reasoning supports 6.RP.3.*	
The Number System				
		6.NS.1	*Interpret and compute quotients of fractions, and solve word problems involving division of fractions by fractions, e.g., by using visual fraction models and equations to represent the problem supports standard 6.NS.2*	**Incorporate** foundational work on division with unit fractions and whole numbers in the early part of students' work on fraction division.
6.NS.2	Fluently divides multi-digit numbers.			

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
		6.MP.7	*Look for and make use of structure supports 6.NS.2.*	**Eliminate** lessons on computing fluently by integrating these problems into spiraled practice throughout the year. To keep students on track to algebra and avoid inequitable remediation structures, **time in grade 6 should not be spent remediating multi-digit calculation algorithms.** No special considerations for curricula well aligned to common factors and multiples, including using distributive property for expressions, as detailed in this standard. **Time spent on instruction and practice should not exceed what would be spent in a typical year.** Note: 6.NS.4 is not listed as a priority standard.
6.NS.3	Fluently uses four operations on multi-digit decimals.			
		6.MP.7	*Look for and make use of structure supports 6.NS.3.*	
		6.NS.4	*Find the greatest common factor of two whole numbers less than or equal to 100 and the least common multiple of two whole numbers less than or equal to 12. 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. For example, express 36 + 8 as 4 (9 + 2) supports standard 6.NS.3*	
6.NS.5	Use positive and negative numbers to represent quantities.			
		6.NS.6	*Understand a rational number as a point on the number line. Extend number line diagrams and coordinate axes familiar from previous grades to represent points on the line and in the plane with negative number coordinates. a. Recognize opposite signs of numbers as indicating locations on opposite sides of 0 on the number line; recognize that the opposite of the opposite of a*	

ARCHDIOCESE of MILWAUKEE

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		Notes on Supporting Standards		Priority Instructional Content
			number is the number itself, e.g., –(–3) = 3, and that 0 is its own opposite. b. Understand signs of numbers in ordered pairs as indicating locations in quadrants of the coordinate plane; recognize that when two ordered pairs differ only by signs, the locations of the points are related by reflections across one or both axes. c. Find and position integers and other rational numbers on a horizontal or vertical number line diagram; find and position pairs of integers and other rational numbers on a coordinate plane supports standards 6.NS.5 and 6.NS.7.	**Incorporate** foundational work on the coordinate plane to support students' entry into this cluster.
6.NS.7	Orders and finds absolute value of rational numbers.			
		6.MP.3	*Construct viable arguments and critique the reasoning of others supports 6.NS.7.*	
6.NS.8	Graphs points in all four quadrants of the coordinate plane.			
		6.MP.1	*Make sense of problems and persevere in solving them supports 6.NS.8.*	
Expressions and Equations				

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
		6.EE.1	*Write and evaluate numerical expressions involving whole-number exponents supports standard 6.EE.2.*	**Emphasize** equivalent expressions, particularly the idea that applying properties of operations to an expression always results in an expression that is equivalent to the original one. No special considerations for curricula well aligned to this representing and analyzing quantitative relationships between dependent and independent variables, as detailed in this cluster. **Time spent on instruction and practice should NOT be reduced.**
6.EE.2	Reads, writes, and evaluates expressions that may include variables and exponents.			
		6.EE.3	*Apply the properties of operations to generate equivalent expressions supports standard 6.EE.2.*	
		6.EE.4	*Identify when two expressions are equivalent (i.e., when the two expressions name the same number regardless of which value is substituted into them) supports standard 6.EE.2.*	
		6.EE.5	*Understand solving an equation or inequality as a process of answering a question: which values from a specified set, if any, make the equation or inequality true? Use substitution to determine whether a given number in a specified set makes an equation or inequality true supports standard 6.EE.2.*	

ARCHDIOCESE of MILWAUKEE

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
		6.EE.6	*Use variables to represent numbers and write expressions when solving a real-world or mathematical problem; understand that a variable can represent an unknown number, or, depending on the purpose at hand, any number in a specified set supports standard 6.EE.7.*	No special considerations for curricula well aligned to reasoning about and solving one-variable equations and inequalities, as detailed in this cluster. **Time spent on instruction and practice should NOT be reduced.**
6.EE.7	Write and solve equations with one variable.			
		6.MP.1	*Make sense of problems and persevere in solving them supports 6.EE.7.*	
		6.MP.2	*Reason abstractly and quantitatively supports 6EE.7.*	
		6.EE.8	*Write an inequality of the form x > c or x < c to represent a constraint or condition in a real-world or mathematical problem. Recognize that inequalities of the form x > c or x < c have infinitely many solutions; represent solutions of such inequalities on number line diagrams supports standard 6.EE.7.*	
		6.EE.9	*Use variables to represent two quantities in a real-world problem that change in relationship to one another; write an equation to express one quantity, thought of as the*	

ARCHDIOCESE of MILWAUKEE

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
			dependent variable, in terms of the other quantity, thought of as the independent variable. Analyze the relationship between the dependent and independent variables using graphs and tables and relate these to the equation supports standard 6.EE.7.	
Geometry				
6.G.1	Solve problems using area of complex polygons.			**Emphasize** understanding of the reasoning leading to the triangle area formula; instead of teaching additional area formulas as separate topics, emphasize problems that focus on finding areas in real-world problems by decomposing figures into triangles and rectangles. **Incorporate** grade 5 foundational work on volume while working on volumes of right rectangular prisms with fractional edge lengths. **Emphasize** contextual problems, as detailed in the second sentence of the standard; eliminate lessons focused on the first sentence of the standard (finding the volume of a rectangular prism with fractional edge lengths by packing it with unit cubes). **Eliminate** lessons and problems involving polygons on the coordinate plane.
		6.MP.1	*Make sense of problems and persevere in solving them supports 6.G.1.*	
6.G.2	Solves problems using volume, including with fractional lengths.			
		6.MP.1	*Make sense of problems and persevere in solving them supports 6.G.2.*	
		6.G.3	*Draw polygons in the coordinate plane given coordinates for the vertices; use coordinates to find the length of a side joining points with the same first coordinate or the same second coordinate. Apply these techniques in the context of solving real-world and mathematical problems supports standard 6.G.1.*	
		6.MP.5	*Use appropriate tools strategically supports 6.G.3.*	

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
		6.G.4	*Represent three-dimensional figures using nets made up of rectangles and triangles, and use the nets to find the surface area of these figures. Apply these techniques in the context of solving real-world and mathematical problems supports standard 6.G.1.*	**Eliminate** lessons and problems on constructing three-dimensional figures from nets and determining if nets can be constructed into three-dimensional figures during the study of nets and surface area.
		6.MP.5	*Use appropriate tools strategically supports 6.G.4.*	
Statistics and Probability				
		6.SP.1	*Recognize a statistical question as one that anticipates variability in the data related to the question and accounts for it in the answers supports standard 6.SP.6.*	**Combine** lessons about introductory statistical concepts so as to proceed more quickly to applying and reinforcing these concepts in context. (Note that there are no procedural expectations in the cluster; no procedural practice is required to meet the expectations of the cluster.)
		6.SP.2	*Understand that a set of data collected to answer a statistical question has a distribution which can be described by its center, spread, and overall shape supports standard 6.SP.5.*	
		6.SP.3	*Recognize that a measure of center for a numerical data set summarizes all of its values with a single number, while a measure of variation describes how its values vary with a single number supports standard 6.SP.5.*	

MATH PRIORITY AND SUPPORTING STANDARDS INSTRUCTIONAL SHIFTS 2020-21
GRADE 6

List of Priority Standards as Shown on Report Card		*Notes on Supporting Standards*		*Priority Instructional Content*
6.SP.4	Displays numerical data in plots.			**Reduce** the amount of required student practice in calculating measures of center and measures of variation by hand, to make room to emphasize the concept of a distribution and the usefulness of summary measures. **Reduce** the amount of time spent creating data displays by hand.
		6.MP.5	*Use appropriate tools strategically supports 6.SP.4.*	
6.SP.5	Summarizes numerical data with statistics.			
		6.MP.3	*Construct viable arguments and critique the reasoning of others supports 6.SP.5.*	