

1st Grade

Standards for Mathematical Practice

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| <ol style="list-style-type: none"> 1. Make sense of problems and persevere in solving them. 2. Reason abstractly and quantitatively. 3. Construct viable arguments and critique the reasoning of others. 4. Model with mathematics. | <ol style="list-style-type: none"> 5. Use appropriate tools strategically. 6. Attend to precision. 7. Look for and make use of structure. 8. Look for and express regularity in repeated reasoning. |
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Operations and Algebraic Thinking

Current Standard Abbreviation	Current Standard	Proposed Standard Abbreviation	Final Draft Proposed Standard
Represent and solve problems involving addition and subtraction.		Represent and solve problems.	
1.OA.1	Use addition and subtraction within 20 to solve word problems involving situations of adding to, taking from, putting together, taking apart, and comparing, with unknowns in all positions, e.g., by using objects, drawings, and equations with a symbol for the unknown number to represent the problem. (Note: See Glossary, Table 1).	NC.1.OA.1	Represent and solve addition and subtraction word problems, within 20, with unknowns, by using objects, drawings, and equations with a symbol for the unknown number to represent the problem, when solving: <ul style="list-style-type: none"> • Add to/Take from-Change Unknown • Put together/Take Apart-Addend Unknown • Compare-Difference Unknown
1.OA.2	Solve word problems that call for addition of three whole numbers whose sum is less than or equal to 20, e.g., by using objects, drawings, and equations with a symbol for the unknown number to represent the problem.	NC.1.OA.2	Represent and solve word problems that call for addition of three whole numbers whose sum is less than or equal to 20, by using objects, drawings, and equations with a symbol for the unknown number.
Understand and apply properties of operations and the relationship between addition and subtraction.		Understand and apply the properties of operations.	
1.OA.3	Apply properties of operations as strategies to add and subtract. ² <i>Examples: If $8 + 3 = 11$ is known, then $3 + 8 = 11$ is also known. (Commutative property of addition.) To add $2 + 6 + 4$, the second two numbers can be added to make a ten, so $2 + 6 + 4 = 2 + 10 = 12$. (Associative property of addition.)</i>	NC.1.OA.3	Apply the commutative and associative properties as strategies for solving addition problems.
1.OA.4	Understand subtraction as an unknown-addend problem. <i>For example, subtract $10 - 8$ by finding the number that makes 10 when added to 8. Add and subtract within 20.</i>	NC.1.OA.4	Solve an unknown-addend problem, within 20, by using addition strategies and/or changing it to a subtraction problem.
Add and subtract within 20.		Add and subtract within 20.	
1.OA.5	Relate counting to addition and subtraction (e.g., by counting on 2 to add 2).		STANDARD REMOVED
	NEW STANDARD NUMBER, Concept from 1.OA.6	NC.1.OA.9	Demonstrate fluency with addition and subtraction within 10.

Operations and Algebraic Thinking

Current Standard Abbreviation	Current Standard	Proposed Standard Abbreviation	Final Draft Proposed Standard
1.OA.6	Add and subtract within 20, demonstrating fluency for addition and subtraction within 10. Use strategies such as counting on; making ten (e.g., $8 + 6 = 8 + 2 + 4 = 10 + 4 = 14$); decomposing a number leading to a ten (e.g., $13 - 4 = 13 - 3 - 1 = 10 - 1 = 9$); using the relationship between addition and subtraction (e.g., knowing that $8 + 4 = 12$, one knows $12 - 8 = 4$); and creating equivalent but easier or known sums (e.g., adding $6 + 7$ by creating the known equivalent $6 + 6 + 1 = 12 + 1 = 13$).	NC.1.OA.6	Add and subtract, within 20, using strategies such as: <ul style="list-style-type: none"> • Counting on • Making ten • Decomposing a number leading to a ten • Using the relationship between addition and subtraction • Using a number line • Creating equivalent but simpler or known sums
Work with addition and subtraction equations.		Analyze addition and subtraction equations within 20.	
1.OA.7	Understand the meaning of the equal sign, and determine if equations involving addition and subtraction are true or false. For example, which of the following equations are true and which are false? $6 = 6$, $7 = 8 - 1$, $5 + 2 = 2 + 5$, $4 + 1 = 5 + 2$.	NC.1.OA.7	Apply understanding of the equal sign to determine if equations involving addition and subtraction are true.
1.OA.8	Determine the unknown whole number in an addition or subtraction equation relating three whole numbers. <i>For example, determine the unknown number that makes the equation true in each of the equations $8 + ? = 11$, $5 = _ - 3$, $6 + 6 = _$.</i>	NC.1.OA.8	Determine the unknown whole number in an addition or subtraction equation involving three whole numbers.

Number and Operations in Base Ten

Current Standard Abbreviation	Current Standard	Proposed Standard Abbreviation	Final Draft Proposed Standard
Extend the counting sequence.		Extend and recognize patterns in the counting sequence.	
1.NBT.1	Count to 120, starting at any number less than 120. In this range, read and write numerals and represent a number of objects with a written numeral.	NC.1.NBT.1	Count to 150, starting at any number less than 150.
	NEW STANDARD NUMBER, Concept from 1.NBT.1	NC.1.NBT.7	Read and write numerals, and represent a number of objects with a written numeral, to 100.
Understand place value.		Understand place value.	
1.NBT.2	Understand that the two digits of a two-digit number represent amounts of tens and ones. Understand the following as special cases: <ol style="list-style-type: none"> a. 10 can be thought of as a bundle of ten ones — called a “ten.” b. The numbers from 11 to 19 are composed of a ten and one, two, three, four, five, six, seven, eight, or nine ones. c. The numbers 10, 20, 30, 40, 50, 60, 70, 80, 90 refer to one, two, three, four, five, six, seven, eight, or nine tens (and 0 ones). 	NC.1.NBT.2	Understand that the two digits of a two-digit number represent amounts of tens and ones. <ul style="list-style-type: none"> • Unitize by making a ten from a collection of ten ones. • Model the numbers from 11 to 19 as composed of a ten and one, two, three, four, five, six, seven, eight, or nine ones. • Demonstrate that the numbers 10, 20, 30, 40, 50, 60, 70, 80, 90 refer to one, two, three, four, five, six, seven, eight, or nine tens, with 0 ones.

Number and Operations in Base Ten

Current Standard Abbreviation	Current Standard	Proposed Standard Abbreviation	Final Draft Proposed Standard
1.NBT.3	Compare two two-digit numbers based on meanings of the tens and ones digits, recording the results of comparisons with the symbols $>$, $=$, and $<$.	NC.1.NBT.3	Compare two two-digit numbers based on the value of the tens and ones digits, recording the results of comparisons with the symbols $>$, $=$, and $<$.
Use place value understanding and properties of operations to add and subtract.		Use place value understanding and properties of operations.	
1.NBT.4	Add within 100, including adding a two-digit number and a one-digit number, and adding a two-digit number and a multiple of 10, using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method and explain the reasoning used. Understand that in adding two-digit numbers, one adds tens and tens, ones and ones; and sometimes it is necessary to compose a ten.	NC.1.NBT.4	Using concrete models or drawings, strategies based on place value, properties of operations, and explaining the reasoning used, add, within 100, in the following situations: <ul style="list-style-type: none"> • A two-digit number and a one-digit number • A two-digit number and a multiple of 10
1.NBT.5	Given a two-digit number, mentally find 10 more or 10 less than the number, without having to count; explain the reasoning used.	NC.1.NBT.5	Given a two-digit number, mentally find 10 more or 10 less than the number, without having to count; explain the reasoning used.
1.NBT.6	Subtract multiples of 10 in the range 10-90 from multiples of 10 in the range 10-90 (positive or zero differences), using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method and explain the reasoning used.	NC.1.NBT.6	Subtract multiples of 10 in the range 10-90 from multiples of 10 in the range 10-90, explaining the reasoning, using: <ul style="list-style-type: none"> • Concrete models and drawings • Number lines • Strategies based on place value • Properties of operations • The relationship between addition and subtraction

Measurement and Data

Current Standard Abbreviation	Current Standard	Proposed Standard Abbreviation	Final Draft Proposed Standard
Measure lengths indirectly and by iterating length units.		Measure lengths.	
1.MD.1	Order three objects by length; compare the lengths of two objects indirectly by using a third object.	NC.1.MD.1	Order three objects by length; compare the lengths of two objects indirectly by using a third object.
1.MD.2	Express the length of an object as a whole number of length units, by laying multiple copies of a shorter object (the length unit) end to end; understand that the length measurement of an object is the number of same-size length units that span it with no gaps or overlaps. <i>Limit to contexts where the object being measured is spanned by a whole number of length units with no gaps or overlaps.</i>	NC.1.MD.2	Measure lengths with non-standard units. <ul style="list-style-type: none"> • Express the length of an object as a whole number of non-standard length units. • Measure by laying multiple copies of a shorter object (the length unit) end to end (iterating) with no gaps or overlaps.
Tell and write time.		Build understanding of time and money.	
1.MD.3	Tell and write time in hours and half-hours using analog and digital clocks.	NC.1.MD.3	Tell and write time in hours and half-hours using analog and digital clocks.

	NEW STANDARD	NC.1.MD.5	Identify quarters, dimes, and nickels and relate their values to pennies.
Represent and interpret data.		Represent and interpret data.	
1.MD.4	Organize, represent, and interpret data with up to three categories; ask and answer questions about the total number of data points, how many in each category, and how many more or less are in one category than in another.	NC.1.MD.4	Organize, represent, and interpret data with up to three categories. <ul style="list-style-type: none"> • Ask and answer questions about the total number of data points. • Ask and answer questions about how many in each category. • Ask and answer questions about how many more or less are in one category than in another.

Geometry			
Current Standard Abbreviation	Current Standard	Proposed Standard Abbreviation	Final Draft Proposed Standard
Identify and describe shapes (squares, circles, triangles, rectangles, hexagons, cubes, cones, cylinders, and spheres).		Reason with shapes and their attributes.	
1.G.1	Distinguish between defining attributes (e.g., triangles are closed and three-sided) versus non-defining attributes (e.g., color, orientation, overall size); build and draw shapes to possess defining attributes.	NC.1.G.1	Distinguish between defining and non-defining attributes and create shapes with defining attributes by: <ul style="list-style-type: none"> • Building and drawing triangles, rectangles, squares, trapezoids, hexagons, circles. • Building cubes, right rectangular prisms, right circular cones, spheres, and right circular cylinders.
1.G.2	Compose two-dimensional shapes (rectangles, squares, trapezoids, triangles, half-circles, and quarter-circles) or three-dimensional shapes (cubes, right rectangular prisms, right circular cones, and right circular cylinders) to create a composite shape, and compose new shapes from the composite shape. (Note: Students do not need to learn formal names such as “right rectangular prism.”)	NC.1.G.2	Create composite shapes by: <ul style="list-style-type: none"> • Making a two-dimensional composite shape using rectangles, squares, trapezoids, triangles, and half-circles naming the components of the new shape. • Making a three-dimensional composite shape using cubes, rectangular prisms, cones, and cylinders, naming the components of the new shape.
1.G.3	Partition circles and rectangles into two and four equal shares, describe the shares using the words <i>halves</i> , <i>fourths</i> , and <i>quarters</i> , and use the phrases <i>half of</i> , <i>fourth of</i> , and <i>quarter of</i> . Describe the whole as two of, or four of the shares. Understand for these examples that decomposing into more equal shares creates smaller shares.	NC.1.G.3	Partition circles and rectangles into two and four equal shares. <ul style="list-style-type: none"> • Describe the shares as halves and fourths, as half of and fourth of. • Describe the whole as two of, or four of the shares. • Explain that decomposing into more equal shares creates smaller shares.