

**Diocese of Boise Math Curriculum – 4<sup>th</sup> grade**

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT														
<p>Sample Questions:</p> <p>How can we use various strategies to solve a word problem?</p> <p>How are division and multiplication related to subtraction and addition?</p> <p>What patens can we find in multiplication and division facts?</p>	<p><b>Counting and Cardinality A1</b></p> <p>Know and use numbers and the count sequence</p> <p>Use the four operations with whole numbers to solve problems</p> <p>Gain familiarity with factors and multiples</p> <p>Generate and analyze patterns</p>	<p align="center"><b>Introduced Skills</b></p> <table border="1" data-bbox="564 289 1476 367"> <tr> <td style="width: 20px;"></td> <td>Write decimals in expanded form</td> </tr> </table> <p align="center"><b>Reviewed Skills</b></p> <table border="1" data-bbox="564 444 1476 506"> <tr> <td style="width: 20px;"></td> <td>Identify Roman Numerals</td> </tr> </table> <p align="center"><b>Mastered Skills</b></p> <table border="1" data-bbox="564 584 1476 799"> <tr> <td style="width: 20px;"></td> <td>Count within 1000</td> </tr> <tr> <td style="width: 20px;"></td> <td>Read and write words for numbers</td> </tr> <tr> <td style="width: 20px;"></td> <td>Read and write numbers to 1000 using base-ten numbers, number names and expanded form</td> </tr> <tr> <td style="width: 20px;"></td> <td>Write whole numbers in expanded form</td> </tr> </table> <p align="center"><b>Mastered Skills</b></p> <table border="1" data-bbox="564 935 1476 984"> <tr> <td style="width: 20px;"></td> <td>Identify dozen, half-dozen, pair, etc.</td> </tr> </table>		Write decimals in expanded form		Identify Roman Numerals		Count within 1000		Read and write words for numbers		Read and write numbers to 1000 using base-ten numbers, number names and expanded form		Write whole numbers in expanded form		Identify dozen, half-dozen, pair, etc.	<p><b>RIT from 210-225 &amp; Above</b></p> <ul style="list-style-type: none"> <li>• Approximate</li> <li>• Billion</li> <li>• Capacity</li> <li>• Composite number</li> <li>• Decade</li> <li>• Deposit</li> <li>• Diagonal</li> <li>• Fahrenheit</li> <li>• Hundred million</li> <li>• Hundredths</li> <li>• Inside</li> <li>• Intersect</li> <li>• Kite</li> <li>• ;attest</li> <li>• Line graph</li> <li>• Longer</li> <li>• Operation</li> <li>• Parallel</li> <li>• Pentagon</li> <li>• Perpendicular</li> <li>• Plane</li> <li>• Polygon</li> <li>• Prime number</li> <li>• Proportion</li> <li>• Quintillion</li> <li>• Rectangular</li> <li>• Regroup[</li> <li>• Rename</li> <li>• Rhombus</li> <li>• Same shape</li> <li>• Skew</li> </ul>	<ol style="list-style-type: none"> <li>1. Make sense of problems and persevere in solving them</li> <li>2. Reason abstractly and quantitatively</li> <li>3. Construct viable arguments and critique the reasoning of others</li> <li>4. Model with mathematics</li> <li>5. Use appropriate tools strategically</li> <li>6. Attend to precision</li> <li>7. Look for and make sense of structure</li> </ol>
	Write decimals in expanded form																	
	Identify Roman Numerals																	
	Count within 1000																	
	Read and write words for numbers																	
	Read and write numbers to 1000 using base-ten numbers, number names and expanded form																	
	Write whole numbers in expanded form																	
	Identify dozen, half-dozen, pair, etc.																	

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																
<p>How do you multiply a fraction by a whole number?</p>	<p><b>Operations and Algebraic Thinking A2</b></p> <p>Demonstrate addition as putting together and adding to</p> <p>Work with addition and subtraction equations</p> <p>Use properties of multiplication and division</p>	<p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Apply the associative property of addition [i.e.</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Fluently add and subtract multi-digit numbers</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Use addition and subtraction within 100 to solve one- and two-</td> </tr> <tr> <td style="width: 20px;"></td> <td>Add up to four two-digit numbers</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Represent whole-number products as rectangular areas in mathematical reasoning</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Interpret models as products of whole numbers (i.e. describe a context in which a total number of objects can be expressed as <math>5 \times 7</math>)</td> </tr> <tr> <td style="width: 20px;"></td> <td>Interpret models as whole-number quotients of whole numbers (i.e. describe the context in which a number of shares or a number of groups can be expressed as <math>56 \div 8</math>)</td> </tr> <tr> <td style="width: 20px;"></td> <td>Explain division as an unknown-factor problem</td> </tr> </table>		Apply the associative property of addition [i.e.		Fluently add and subtract multi-digit numbers		Use addition and subtraction within 100 to solve one- and two-		Add up to four two-digit numbers		Represent whole-number products as rectangular areas in mathematical reasoning		Interpret models as products of whole numbers (i.e. describe a context in which a total number of objects can be expressed as $5 \times 7$ )		Interpret models as whole-number quotients of whole numbers (i.e. describe the context in which a number of shares or a number of groups can be expressed as $56 \div 8$ )		Explain division as an unknown-factor problem	<ul style="list-style-type: none"> <li>• Square inch</li> <li>• Standard numeral</li> <li>• Straight</li> <li>• Subtrahend</li> <li>• Thousand</li> <li>• Trillion vertical line</li> <li>• Zero</li> <li>• Expanded form</li> <li>• Base ten</li> <li>• Half-dozen</li> <li>• Multi-digit</li> <li>• Interpret</li> <li>• Product</li> <li>• Quotient</li> <li>• Equation</li> <li>• Relationship</li> <li>• Computation</li> <li>• Calculation</li> <li>• Generate</li> <li>• Attribute</li> <li>• Formula</li> <li>• Associative property</li> <li>• Distributive property</li> <li>• Intervals</li> <li>• Celsius</li> <li>• Compose</li> <li>• Decompose</li> <li>• Perimeter</li> <li>• Quadrilateral</li> <li>• Rhombus</li> </ul>	<p>8. Look for and express regularity in repeated reasoning</p> <p><b>Resources:</b>            White boards            Base ten blocks            Number lines            Yardstick            Thermometer            Flash Cards            Hundreds chart            Fraction tiles            Analog clocks            Liquid containers            Balance scale            Gram weights            Graph paper            Unit square tiles            Various shapes            Visuals            Pencil and paper</p>
	Apply the associative property of addition [i.e.																			
	Fluently add and subtract multi-digit numbers																			
	Use addition and subtraction within 100 to solve one- and two-																			
	Add up to four two-digit numbers																			
	Represent whole-number products as rectangular areas in mathematical reasoning																			
	Interpret models as products of whole numbers (i.e. describe a context in which a total number of objects can be expressed as $5 \times 7$ )																			
	Interpret models as whole-number quotients of whole numbers (i.e. describe the context in which a number of shares or a number of groups can be expressed as $56 \div 8$ )																			
	Explain division as an unknown-factor problem																			

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																																
<p>When do we use commutative and associative properties?</p>	<p><b>Operations and Algebraic Thinking</b></p> <p>Gain familiarity with factors and multiples</p> <p>Generate and analyze patterns</p>	<p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 20px;"></td> <td>Write an equation to express an even number as a sum of two equal addends</td> </tr> <tr> <td></td> <td>Use addition to find the total number of objects arranged in rectangular arrays with up to 5 rows and columns</td> </tr> <tr> <td></td> <td>Write an equation to express the total as a sum of equal addends</td> </tr> <tr> <td></td> <td>Determine whether a group of objects has an odd or even number of members</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 20px;"></td> <td>Multiply a whole number of up to four digits by a one-digit whole number</td> </tr> <tr> <td></td> <td>Multiply two two-digit numbers</td> </tr> <tr> <td></td> <td>Find whole-number quotients and remainders with up to four-digit dividends and one-digit divisors</td> </tr> <tr> <td></td> <td>Multiply multi-digit whole numbers</td> </tr> <tr> <td></td> <td>Divide multi-digit numbers</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 20px;"></td> <td>Use multiplication and division within 100 to solve word problems in situations involving equal groups, arrays, and measurement quantities</td> </tr> <tr> <td></td> <td>Determine the unknown whole number in a multiplication or division equation relating three whole numbers (<math>8x?=48</math>, <math>5=□□3</math>, <math>6x6=?</math>)</td> </tr> <tr> <td></td> <td>Apply the commutative property of multiplication (if <math>6x4=24</math> then <math>4x6=24</math>)</td> </tr> <tr> <td></td> <td>Apply the associative property of multiplication [i.e. <math>(3x5)2=3(5x2)=30</math>]</td> </tr> <tr> <td></td> <td>Apply the distributive property [i.e. <math>8(5+2)=(8x5)+(8x2) = 40+16 =</math></td> </tr> <tr> <td></td> <td>Fluently multiply and divide within 100 using fact families, relationships strategies or properties of operations</td> </tr> <tr> <td></td> <td>Know from memory all products of two one-digit numbers</td> </tr> </table>		Write an equation to express an even number as a sum of two equal addends		Use addition to find the total number of objects arranged in rectangular arrays with up to 5 rows and columns		Write an equation to express the total as a sum of equal addends		Determine whether a group of objects has an odd or even number of members		Multiply a whole number of up to four digits by a one-digit whole number		Multiply two two-digit numbers		Find whole-number quotients and remainders with up to four-digit dividends and one-digit divisors		Multiply multi-digit whole numbers		Divide multi-digit numbers		Use multiplication and division within 100 to solve word problems in situations involving equal groups, arrays, and measurement quantities		Determine the unknown whole number in a multiplication or division equation relating three whole numbers ( $8x?=48$ , $5=□□3$ , $6x6=?$ )		Apply the commutative property of multiplication (if $6x4=24$ then $4x6=24$ )		Apply the associative property of multiplication [i.e. $(3x5)2=3(5x2)=30$ ]		Apply the distributive property [i.e. $8(5+2)=(8x5)+(8x2) = 40+16 =$		Fluently multiply and divide within 100 using fact families, relationships strategies or properties of operations		Know from memory all products of two one-digit numbers	<p><u>RIT 201-220</u></p> <ul style="list-style-type: none"> <li>• billion</li> <li>• capacity</li> <li>• composite number</li> <li>• decade</li> <li>• diagonal</li> <li>• hundred million</li> <li>• intersect</li> <li>• line graph</li> <li>• longer</li> <li>• miles per hour</li> <li>• oval</li> <li>• parallel</li> <li>• plane</li> <li>• prime number</li> <li>• quintillion</li> <li>• scale</li> <li>• standard numeral</li> <li>• thousands</li> <li>• trillion</li> <li>• vertical line</li> <li>• bar graph</li> <li>• below</li> <li>• biggest</li> <li>• chance</li> <li>• common multip</li> <li>• compatible num</li> <li>• coordinate</li> <li>• coordinate poin</li> <li>• cubic centimete</li> <li>• cubic unit</li> <li>• decameter</li> <li>• decimeter</li> <li>• divisible</li> <li>• edge</li> </ul>	<p><b>Assessment:</b></p> <ul style="list-style-type: none"> <li>• Timed test</li> <li>• Quizzes</li> <li>• Higher order questioning</li> <li>• Open-ended questioning</li> <li>• Performance tasks</li> <li>• Oral explanation</li> <li>• Math portfolio</li> <li>• Math journal</li> <li>• Rubrics</li> <li>• Checklists</li> </ul>
	Write an equation to express an even number as a sum of two equal addends																																			
	Use addition to find the total number of objects arranged in rectangular arrays with up to 5 rows and columns																																			
	Write an equation to express the total as a sum of equal addends																																			
	Determine whether a group of objects has an odd or even number of members																																			
	Multiply a whole number of up to four digits by a one-digit whole number																																			
	Multiply two two-digit numbers																																			
	Find whole-number quotients and remainders with up to four-digit dividends and one-digit divisors																																			
	Multiply multi-digit whole numbers																																			
	Divide multi-digit numbers																																			
	Use multiplication and division within 100 to solve word problems in situations involving equal groups, arrays, and measurement quantities																																			
	Determine the unknown whole number in a multiplication or division equation relating three whole numbers ( $8x?=48$ , $5=□□3$ , $6x6=?$ )																																			
	Apply the commutative property of multiplication (if $6x4=24$ then $4x6=24$ )																																			
	Apply the associative property of multiplication [i.e. $(3x5)2=3(5x2)=30$ ]																																			
	Apply the distributive property [i.e. $8(5+2)=(8x5)+(8x2) = 40+16 =$																																			
	Fluently multiply and divide within 100 using fact families, relationships strategies or properties of operations																																			
	Know from memory all products of two one-digit numbers																																			

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT														
<p>How do fractions relate to other number concepts?</p> <p>How do we write fractions in simplest form?</p> <p>What does a decimal represent?</p> <p>How do we read and write decimals?</p> <p>How do we add and subtract fractions and mixed numbers?</p>	<p><b>Operations and Algebraic Thinking</b></p> <p>Explain and use factors and multipliers</p> <p>Generate and analyze patterns</p> <p>Apply and extend previous understanding of numbers to the system of rational numbers</p> <p>Apply and extend previous understanding of arithmetic to the algebraic expressions</p>	<p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Solve word problems in which remainders must be interpreted</td></tr> <tr><td>Represent verbal statements of comparisons as equations</td></tr> <tr><td>Multiply and divide to solve word problems involving multiplicative comparisons</td></tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Solve multi-step word problems using the four operations</td></tr> <tr><td>Assess the reasonableness of answers using mental computation and estimation strategies (including rounding)</td></tr> <tr><td>Use parentheses, brackets or braces in numerical expressions and evaluate expressions with these symbols</td></tr> <tr><td>Solve problems involving integers using the four operations</td></tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Find all factors for a whole number in the range 1-100</td></tr> <tr><td>Recognize that a whole number is a multiple of each of its factors</td></tr> <tr><td>Determine whether a given whole number is divisible by a given one digit number</td></tr> <tr><td>Determine whether a given whole number in the range of 1-100 is prime or composite</td></tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Identify apparent features of a pattern without a given rule</td></tr> <tr><td>Find and position integers and other rational numbers on a horizontal or vertical number line</td></tr> <tr><td>Perform arithmetic operations including those involving whole number exponents in the conventional order when there are no parentheses to specify a particular order</td></tr> </table>	Solve word problems in which remainders must be interpreted	Represent verbal statements of comparisons as equations	Multiply and divide to solve word problems involving multiplicative comparisons	Solve multi-step word problems using the four operations	Assess the reasonableness of answers using mental computation and estimation strategies (including rounding)	Use parentheses, brackets or braces in numerical expressions and evaluate expressions with these symbols	Solve problems involving integers using the four operations	Find all factors for a whole number in the range 1-100	Recognize that a whole number is a multiple of each of its factors	Determine whether a given whole number is divisible by a given one digit number	Determine whether a given whole number in the range of 1-100 is prime or composite	Identify apparent features of a pattern without a given rule	Find and position integers and other rational numbers on a horizontal or vertical number line	Perform arithmetic operations including those involving whole number exponents in the conventional order when there are no parentheses to specify a particular order	<ul style="list-style-type: none"> <li>• expanded numeral</li> <li>• half-dollar</li> <li>• hectometer</li> <li>• hundredth</li> <li>• integer</li> <li>• larger</li> <li>• less likely</li> <li>• magic square</li> <li>• median</li> <li>• miles per gallon</li> <li>• milliliter</li> <li>• minimum</li> <li>• mirror image</li> <li>• mixed number</li> <li>• multiple</li> <li>• octagon</li> <li>• origin</li> <li>• parallel line</li> <li>• place value</li> <li>• plus</li> <li>• probability</li> <li>• random</li> <li>• rectangular box</li> <li>• regular polygon</li> <li>• trapezoid</li> <li>• acute angle</li> <li>• century</li> <li>• coin</li> <li>• combinations</li> </ul>	
Solve word problems in which remainders must be interpreted																		
Represent verbal statements of comparisons as equations																		
Multiply and divide to solve word problems involving multiplicative comparisons																		
Solve multi-step word problems using the four operations																		
Assess the reasonableness of answers using mental computation and estimation strategies (including rounding)																		
Use parentheses, brackets or braces in numerical expressions and evaluate expressions with these symbols																		
Solve problems involving integers using the four operations																		
Find all factors for a whole number in the range 1-100																		
Recognize that a whole number is a multiple of each of its factors																		
Determine whether a given whole number is divisible by a given one digit number																		
Determine whether a given whole number in the range of 1-100 is prime or composite																		
Identify apparent features of a pattern without a given rule																		
Find and position integers and other rational numbers on a horizontal or vertical number line																		
Perform arithmetic operations including those involving whole number exponents in the conventional order when there are no parentheses to specify a particular order																		

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																		
How do we apply perimeter and area formulas?	<p><b>Number and Operations in Base Ten</b></p> <p>Explain and use the place value system</p> <p>Generalize place value understanding for multi-digit whole numbers</p> <p>Use place value understanding and properties of operations to perform multi-digit arithmetic</p>	<p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Compare two decimals to thousandths based on meanings of the digits in each place using <math>&lt;</math>, <math>&gt;</math>, and <math>=</math></td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Explain patterns in the number of zeroes of the product when multiplying or dividing a number by powers of 10</td> </tr> <tr> <td style="width: 20px;"></td> <td>Read, write and compare decimals to thousandths using base-ten numbers, number names and expanded form</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Round multi-digit whole numbers to any place</td> </tr> <tr> <td style="width: 20px;"></td> <td>Recognize that in a multi-digit number, a digit in one place represents ten times what it represents in the place to its right (i.e. <math>700 \div 70 = 10</math>) and <math>1/10</math> of what it represents in the place to its left</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Explain that the three digits of a three-digit number represent amounts of hundreds, tens and ones</td> </tr> <tr> <td style="width: 20px;"></td> <td>Round whole numbers to the nearest 10 or 100</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Illustrate and explain the calculation of a problem by using equations, rectangular arrays and/or area models</td> </tr> <tr> <td style="width: 20px;"></td> <td>Add, subtract, multiply and divide decimals to hundredths using concrete models or drawings and strategies based on place value, properties of operations and/or the relationship between addition and subtraction</td> </tr> </table>		Compare two decimals to thousandths based on meanings of the digits in each place using $<$ , $>$ , and $=$		Explain patterns in the number of zeroes of the product when multiplying or dividing a number by powers of 10		Read, write and compare decimals to thousandths using base-ten numbers, number names and expanded form		Round multi-digit whole numbers to any place		Recognize that in a multi-digit number, a digit in one place represents ten times what it represents in the place to its right (i.e. $700 \div 70 = 10$ ) and $1/10$ of what it represents in the place to its left		Explain that the three digits of a three-digit number represent amounts of hundreds, tens and ones		Round whole numbers to the nearest 10 or 100		Illustrate and explain the calculation of a problem by using equations, rectangular arrays and/or area models		Add, subtract, multiply and divide decimals to hundredths using concrete models or drawings and strategies based on place value, properties of operations and/or the relationship between addition and subtraction	<ul style="list-style-type: none"> <li>• common factor</li> <li>• congruent angle</li> <li>• cord</li> <li>• decimal form</li> <li>• decimal point</li> <li>• dilation</li> <li>• enlargement</li> <li>• factor tree</li> <li>• fastest</li> <li>• fitted line</li> <li>• geometric solid</li> <li>• greatest common factor</li> <li>• how long</li> <li>• line of best fit</li> <li>• line plot</li> <li>• lowest term</li> <li>• lowest terms</li> <li>• mean</li> <li>• micrometer</li> <li>• negative</li> <li>• number cube</li> <li>• obtuse angle</li> <li>• outcome</li> <li>• positive</li> <li>• positive linear relationship</li> <li>• proof</li> <li>• protractor</li> </ul>	
	Compare two decimals to thousandths based on meanings of the digits in each place using $<$ , $>$ , and $=$																					
	Explain patterns in the number of zeroes of the product when multiplying or dividing a number by powers of 10																					
	Read, write and compare decimals to thousandths using base-ten numbers, number names and expanded form																					
	Round multi-digit whole numbers to any place																					
	Recognize that in a multi-digit number, a digit in one place represents ten times what it represents in the place to its right (i.e. $700 \div 70 = 10$ ) and $1/10$ of what it represents in the place to its left																					
	Explain that the three digits of a three-digit number represent amounts of hundreds, tens and ones																					
	Round whole numbers to the nearest 10 or 100																					
	Illustrate and explain the calculation of a problem by using equations, rectangular arrays and/or area models																					
	Add, subtract, multiply and divide decimals to hundredths using concrete models or drawings and strategies based on place value, properties of operations and/or the relationship between addition and subtraction																					

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																						
	<p><b><i>Number and Operations in Base Ten</i></b></p> <p>Use place value understanding and properties of operations to perform multi-digit arithmetic</p> <p><b>Number and Operations - Fractions</b></p> <p>Develop understanding of fractions as numbers</p>	<p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Multiply one-digit whole numbers by multiples of 10 in the range 10-90</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Demonstrate that in adding or subtracting three-digit numbers, one adds or subtracts hundreds and hundreds, tens and tens, ones and ones and sometimes it is necessary to compose or decompose tens or hundreds</td> </tr> <tr> <td style="width: 20px;"></td> <td>Mentally add and subtract 10 or 100 to or from a given number 100-900</td> </tr> <tr> <td style="width: 20px;"></td> <td>Use and explain problem solving strategies based on place value and properties of operations</td> </tr> <tr> <td style="width: 20px;"></td> <td>Add and subtract within 100 and 1000 using concrete models or drawings and strategies based on place value, properties of operations and/or the relationship between addition and subtraction</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Explain equivalence of fractions by attending to the number and size of the parts when two fractions themselves are the same size</td> </tr> <tr> <td style="width: 20px;"></td> <td>Compare two fractions with different numerators and different denominators and justify the conclusions</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Represent a fraction as a number on the number line</td> </tr> <tr> <td style="width: 20px;"></td> <td>Compare fractions by using symbols of &lt;, &gt;, or =</td> </tr> <tr> <td style="width: 20px;"></td> <td>Explain, represent and generate equivalent fractions</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Explain a fraction <math>a/b</math> as the quantity formed by <math>a</math> parts of size <math>1/b</math> (i.e. <math>2/3</math> is equal to 2 parts of <math>1/3</math>)</td> </tr> </table>		Multiply one-digit whole numbers by multiples of 10 in the range 10-90		Demonstrate that in adding or subtracting three-digit numbers, one adds or subtracts hundreds and hundreds, tens and tens, ones and ones and sometimes it is necessary to compose or decompose tens or hundreds		Mentally add and subtract 10 or 100 to or from a given number 100-900		Use and explain problem solving strategies based on place value and properties of operations		Add and subtract within 100 and 1000 using concrete models or drawings and strategies based on place value, properties of operations and/or the relationship between addition and subtraction		Explain equivalence of fractions by attending to the number and size of the parts when two fractions themselves are the same size		Compare two fractions with different numerators and different denominators and justify the conclusions		Represent a fraction as a number on the number line		Compare fractions by using symbols of <, >, or =		Explain, represent and generate equivalent fractions		Explain a fraction $a/b$ as the quantity formed by $a$ parts of size $1/b$ (i.e. $2/3$ is equal to 2 parts of $1/3$ )	<ul style="list-style-type: none"> <li>• reduce</li> <li>• scatter plot</li> <li>• smaller</li> <li>• straight angle</li> <li>• tessellation</li> <li>• three-dimensional</li> <li>• transformation</li> <li>• triple</li> <li>• union</li> </ul>	
	Multiply one-digit whole numbers by multiples of 10 in the range 10-90																									
	Demonstrate that in adding or subtracting three-digit numbers, one adds or subtracts hundreds and hundreds, tens and tens, ones and ones and sometimes it is necessary to compose or decompose tens or hundreds																									
	Mentally add and subtract 10 or 100 to or from a given number 100-900																									
	Use and explain problem solving strategies based on place value and properties of operations																									
	Add and subtract within 100 and 1000 using concrete models or drawings and strategies based on place value, properties of operations and/or the relationship between addition and subtraction																									
	Explain equivalence of fractions by attending to the number and size of the parts when two fractions themselves are the same size																									
	Compare two fractions with different numerators and different denominators and justify the conclusions																									
	Represent a fraction as a number on the number line																									
	Compare fractions by using symbols of <, >, or =																									
	Explain, represent and generate equivalent fractions																									
	Explain a fraction $a/b$ as the quantity formed by $a$ parts of size $1/b$ (i.e. $2/3$ is equal to 2 parts of $1/3$ )																									

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT														
	<p><b>Number and Operations - Fractions</b></p> <p>Build fractions from unit fractions by applying and extending previous understandings of operations on whole numbers</p> <p>Compare decimal, fractions and percent notations</p> <p><b>Measurement and Data</b></p> <p>Describe and compare measurable attributes</p>	<p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Add and subtract mixed numbers with like denominators</td> </tr> <tr> <td></td> <td>Solve word problems involving addition and subtraction of fractions referring to the same whole, having like denominators and unlike denominators</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Explain addition and subtraction of fractions as joining and separating parts referring to the same whole</td> </tr> <tr> <td></td> <td>Breakdown a fraction into a sum of fractions with the same denominator in more than one way, recording each decomposition by an equation</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Use decimal notation for fractions with denominators 10 or 100 (i.e. rewrite 0.62 as 62/100; describe a length as 0.62 meters)</td> </tr> <tr> <td></td> <td>Compare two decimals to hundredths by reasoning about their size by using the symbols <math>&lt;</math>, <math>&gt;</math>, or <math>=</math> and justify the conclusion</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Describe several measurable attributes of objects (i.e. length, weight, temperature)</td> </tr> </table>		Add and subtract mixed numbers with like denominators		Solve word problems involving addition and subtraction of fractions referring to the same whole, having like denominators and unlike denominators		Explain addition and subtraction of fractions as joining and separating parts referring to the same whole		Breakdown a fraction into a sum of fractions with the same denominator in more than one way, recording each decomposition by an equation		Use decimal notation for fractions with denominators 10 or 100 (i.e. rewrite 0.62 as 62/100; describe a length as 0.62 meters)		Compare two decimals to hundredths by reasoning about their size by using the symbols $<$ , $>$ , or $=$ and justify the conclusion		Describe several measurable attributes of objects (i.e. length, weight, temperature)		
	Add and subtract mixed numbers with like denominators																	
	Solve word problems involving addition and subtraction of fractions referring to the same whole, having like denominators and unlike denominators																	
	Explain addition and subtraction of fractions as joining and separating parts referring to the same whole																	
	Breakdown a fraction into a sum of fractions with the same denominator in more than one way, recording each decomposition by an equation																	
	Use decimal notation for fractions with denominators 10 or 100 (i.e. rewrite 0.62 as 62/100; describe a length as 0.62 meters)																	
	Compare two decimals to hundredths by reasoning about their size by using the symbols $<$ , $>$ , or $=$ and justify the conclusion																	
	Describe several measurable attributes of objects (i.e. length, weight, temperature)																	

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																				
	<p><b>Measurement and Data</b></p> <p>Solve problems involving measurement and conversion of measurement from a larger unit to a smaller unit</p> <p>Represent and interpret data</p>	<p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 20px;"></td> <td>Measure the length of an object by selecting and using appropriate tools, i.e. ruler, yardstick, meter stick, measuring tape</td> </tr> <tr> <td></td> <td>Estimate lengths using units of inches, feet, centimeters and meters</td> </tr> <tr> <td></td> <td>Measure the length of an object twice using length units of different lengths and describe how the two measurements relate to the size of the chosen unit (cm, m, in., ft.)</td> </tr> <tr> <td></td> <td>Measure to determine how much longer one object is than another</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 20px;"></td> <td>Within a single system of measurement, express measurements in a larger unit in terms of a smaller unit (i.e. Express the length of a 4 ft snake as 48 in.)</td> </tr> <tr> <td></td> <td>Generate a conversion table</td> </tr> <tr> <td></td> <td>Apply the area and perimeter formulas for rectangles in real world and mathematical problems (i.e. find the width of a rectangular room given the area of the flooring and the length, by viewing the area formula as a multiplication equation with an unknown factor)</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 20px;"></td> <td>Use the four operations to solve word problems involving measurement units</td> </tr> <tr> <td></td> <td>Measure and estimate liquid volumes and masses of objects using grams (g), kilograms (kg) and liters (l)</td> </tr> <tr> <td></td> <td>Know relative sizes of measurement units within one system of units including km, m, cm; kg, g; lb, oz; l, ml; hr, min, sec, degrees</td> </tr> </table>		Measure the length of an object by selecting and using appropriate tools, i.e. ruler, yardstick, meter stick, measuring tape		Estimate lengths using units of inches, feet, centimeters and meters		Measure the length of an object twice using length units of different lengths and describe how the two measurements relate to the size of the chosen unit (cm, m, in., ft.)		Measure to determine how much longer one object is than another		Within a single system of measurement, express measurements in a larger unit in terms of a smaller unit (i.e. Express the length of a 4 ft snake as 48 in.)		Generate a conversion table		Apply the area and perimeter formulas for rectangles in real world and mathematical problems (i.e. find the width of a rectangular room given the area of the flooring and the length, by viewing the area formula as a multiplication equation with an unknown factor)		Use the four operations to solve word problems involving measurement units		Measure and estimate liquid volumes and masses of objects using grams (g), kilograms (kg) and liters (l)		Know relative sizes of measurement units within one system of units including km, m, cm; kg, g; lb, oz; l, ml; hr, min, sec, degrees	<ul style="list-style-type: none"> <li>•</li> </ul>	
	Measure the length of an object by selecting and using appropriate tools, i.e. ruler, yardstick, meter stick, measuring tape																							
	Estimate lengths using units of inches, feet, centimeters and meters																							
	Measure the length of an object twice using length units of different lengths and describe how the two measurements relate to the size of the chosen unit (cm, m, in., ft.)																							
	Measure to determine how much longer one object is than another																							
	Within a single system of measurement, express measurements in a larger unit in terms of a smaller unit (i.e. Express the length of a 4 ft snake as 48 in.)																							
	Generate a conversion table																							
	Apply the area and perimeter formulas for rectangles in real world and mathematical problems (i.e. find the width of a rectangular room given the area of the flooring and the length, by viewing the area formula as a multiplication equation with an unknown factor)																							
	Use the four operations to solve word problems involving measurement units																							
	Measure and estimate liquid volumes and masses of objects using grams (g), kilograms (kg) and liters (l)																							
	Know relative sizes of measurement units within one system of units including km, m, cm; kg, g; lb, oz; l, ml; hr, min, sec, degrees																							

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																										
	<p><b>Measurement and Data</b> Solve problems using measurement</p> <p><b>Time</b> Work with time</p> <p><b>Money</b> Work with money</p> <p><b>Data</b> Represent and interpret data</p>	<p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Use addition and subtraction within 100 to solve word problems involving lengths</td> </tr> <tr> <td></td> <td>Observe Celsius and Fahrenheit thermometers to measure and record temperature to the nearest degree</td> </tr> <tr> <td></td> <td>Identify temperatures in degrees Celsius and Fahrenheit</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Tell and write time to the nearest minute</td> </tr> <tr> <td></td> <td>Measure time intervals in minutes</td> </tr> <tr> <td></td> <td>Solve word problems involving addition and subtraction of time intervals in minutes</td> </tr> <tr> <td></td> <td>Identify measurement of time in seconds</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Tell and write time from analog and digital clocks to the nearest five minutes, using a.m. and p.m.</td> </tr> <tr> <td></td> <td>Read the clock to tell time in terms of minutes before and after the hour</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Solve problems involving dollar bills, quarters, dimes, nickels and pennies</td> </tr> <tr> <td></td> <td>Use \$ and ¢ symbols appropriately</td> </tr> <tr> <td></td> <td>Show how different combinations of coins equal the same amount of money</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Solve problems by using line plots</td> </tr> </table>		Use addition and subtraction within 100 to solve word problems involving lengths		Observe Celsius and Fahrenheit thermometers to measure and record temperature to the nearest degree		Identify temperatures in degrees Celsius and Fahrenheit		Tell and write time to the nearest minute		Measure time intervals in minutes		Solve word problems involving addition and subtraction of time intervals in minutes		Identify measurement of time in seconds		Tell and write time from analog and digital clocks to the nearest five minutes, using a.m. and p.m.		Read the clock to tell time in terms of minutes before and after the hour		Solve problems involving dollar bills, quarters, dimes, nickels and pennies		Use \$ and ¢ symbols appropriately		Show how different combinations of coins equal the same amount of money		Solve problems by using line plots	<ul style="list-style-type: none"> <li>•</li> </ul>	
	Use addition and subtraction within 100 to solve word problems involving lengths																													
	Observe Celsius and Fahrenheit thermometers to measure and record temperature to the nearest degree																													
	Identify temperatures in degrees Celsius and Fahrenheit																													
	Tell and write time to the nearest minute																													
	Measure time intervals in minutes																													
	Solve word problems involving addition and subtraction of time intervals in minutes																													
	Identify measurement of time in seconds																													
	Tell and write time from analog and digital clocks to the nearest five minutes, using a.m. and p.m.																													
	Read the clock to tell time in terms of minutes before and after the hour																													
	Solve problems involving dollar bills, quarters, dimes, nickels and pennies																													
	Use \$ and ¢ symbols appropriately																													
	Show how different combinations of coins equal the same amount of money																													
	Solve problems by using line plots																													

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																				
<p>Why do we measure objects?</p>	<p><b>Measurement and Data</b></p> <p><b>Data</b> Represent and interpret data</p> <p><b>Geometric measurement</b> : understand concepts of angle and measure angels</p>	<p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Represent a data set with several categories on a scaled picture graph and a scaled bar graph</td> </tr> <tr> <td></td> <td>Show data with a picture graph and a bar graph</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Generate measurement data by measuring lengths of several objects to the nearest whole unit or making repeated measurements of the same object</td> </tr> <tr> <td></td> <td>Show data by making a line plot</td> </tr> <tr> <td></td> <td>Solve simple put-together, take-apart and compare problems using information presented in a graph</td> </tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Find the perimeter of a polygon given the side lengths, an unknown side length, same perimeters and different areas, and same area and different perimeter</td> </tr> <tr> <td></td> <td>Find the areas of complex figures</td> </tr> <tr> <td></td> <td>Recognize angles as geometric shapes that are formed wherever two rays share a common endpoint</td> </tr> <tr> <td></td> <td>Describe and use concepts of angle measurement</td> </tr> <tr> <td></td> <td>Measure and sketch angles in whole-number degrees using a protractor</td> </tr> </table>		Represent a data set with several categories on a scaled picture graph and a scaled bar graph		Show data with a picture graph and a bar graph		Generate measurement data by measuring lengths of several objects to the nearest whole unit or making repeated measurements of the same object		Show data by making a line plot		Solve simple put-together, take-apart and compare problems using information presented in a graph		Find the perimeter of a polygon given the side lengths, an unknown side length, same perimeters and different areas, and same area and different perimeter		Find the areas of complex figures		Recognize angles as geometric shapes that are formed wherever two rays share a common endpoint		Describe and use concepts of angle measurement		Measure and sketch angles in whole-number degrees using a protractor		
	Represent a data set with several categories on a scaled picture graph and a scaled bar graph																							
	Show data with a picture graph and a bar graph																							
	Generate measurement data by measuring lengths of several objects to the nearest whole unit or making repeated measurements of the same object																							
	Show data by making a line plot																							
	Solve simple put-together, take-apart and compare problems using information presented in a graph																							
	Find the perimeter of a polygon given the side lengths, an unknown side length, same perimeters and different areas, and same area and different perimeter																							
	Find the areas of complex figures																							
	Recognize angles as geometric shapes that are formed wherever two rays share a common endpoint																							
	Describe and use concepts of angle measurement																							
	Measure and sketch angles in whole-number degrees using a protractor																							

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT															
<p>How do you know if a shape is symmetrical?</p> <p>How do we measure angles?</p> <p>How do we correctly select which unit of measurement to use?</p> <p>How do we draw and identify two-dimensional figures?</p> <p>How do we classify three-dimensional shapes?</p>	<p><b>Geometric measurement:</b> Understand concepts of angle and measure angles</p>	<p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Solve real-world problems involving perimeters of polygons</td></tr> <tr><td>Recognize areas as an attribute of plane figures</td></tr> <tr><td>Relate area to the operations of multiplication and addition</td></tr> <tr><td>Multiply side lengths to find areas of rectangles with whole-number side lengths in the context of solving real world problems</td></tr> <tr><td>Use tiling to show in a concrete case that the area of a rectangle with whole-number side lengths <math>a</math> and <math>b+c</math> is the sum of <math>a \times b</math> and <math>a \times c</math></td></tr> <tr><td>Explain concepts of area measurement</td></tr> <tr><td>Recognize area as additive</td></tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Measure areas by counting unit squares (i.e. square cm, square m, square in, square ft)</td></tr> <tr><td>Find the area of a rectangle with whole-number side lengths by tiling it</td></tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Identify quadrilaterals and pentagons</td></tr> <tr><td>Recognize rhombuses, rectangles and square as quadrilaterals</td></tr> <tr><td>Identify shapes as three-dimensional</td></tr> </table> <p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr><td>Identify angles and lines in two-dimensional figures</td></tr> <tr><td>Classify two-dimensional figures based on the presence or absence of parallel or perpendicular lines or angles of specified size</td></tr> <tr><td>Recognize and identify right triangles as a category</td></tr> </table>	Solve real-world problems involving perimeters of polygons	Recognize areas as an attribute of plane figures	Relate area to the operations of multiplication and addition	Multiply side lengths to find areas of rectangles with whole-number side lengths in the context of solving real world problems	Use tiling to show in a concrete case that the area of a rectangle with whole-number side lengths $a$ and $b+c$ is the sum of $a \times b$ and $a \times c$	Explain concepts of area measurement	Recognize area as additive	Measure areas by counting unit squares (i.e. square cm, square m, square in, square ft)	Find the area of a rectangle with whole-number side lengths by tiling it	Identify quadrilaterals and pentagons	Recognize rhombuses, rectangles and square as quadrilaterals	Identify shapes as three-dimensional	Identify angles and lines in two-dimensional figures	Classify two-dimensional figures based on the presence or absence of parallel or perpendicular lines or angles of specified size	Recognize and identify right triangles as a category	<ul style="list-style-type: none"> <li>•</li> </ul>	
Solve real-world problems involving perimeters of polygons																			
Recognize areas as an attribute of plane figures																			
Relate area to the operations of multiplication and addition																			
Multiply side lengths to find areas of rectangles with whole-number side lengths in the context of solving real world problems																			
Use tiling to show in a concrete case that the area of a rectangle with whole-number side lengths $a$ and $b+c$ is the sum of $a \times b$ and $a \times c$																			
Explain concepts of area measurement																			
Recognize area as additive																			
Measure areas by counting unit squares (i.e. square cm, square m, square in, square ft)																			
Find the area of a rectangle with whole-number side lengths by tiling it																			
Identify quadrilaterals and pentagons																			
Recognize rhombuses, rectangles and square as quadrilaterals																			
Identify shapes as three-dimensional																			
Identify angles and lines in two-dimensional figures																			
Classify two-dimensional figures based on the presence or absence of parallel or perpendicular lines or angles of specified size																			
Recognize and identify right triangles as a category																			

ESSENTIAL QUESTIONS	DOMAINS AND CLUSTERS	4 <sup>th</sup> GRADE MATH SKILLS	VOCABULARY	PRACTICES, RESOURCES & ASSESSMENT																																
<p>How do you know if a shape is symmetric al?</p> <p>How do we measure angles?</p> <p>How do we correctly select which unit of measurement to use?</p> <p>How do we draw and identify two-dimensional figures?</p> <p>How do we classify three-dimensional shapes?</p>	<p><b>GEOMETRY</b></p> <p>Identify and describe shapes</p> <p>Draw and identify lines and angles, and classify shapes by properties of their lines and angles</p>	<p style="text-align: center;"><b>Introduced Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Recognize a line of symmetry for a two-dimensional figure as a line across the figure such that the figure can be folded along the line into matching parts</td> </tr> <tr> <td></td> <td>Identify line-symmetric figures and draw lines of symmetry</td> </tr> </table> <p style="text-align: center;"><b>Reviewed Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Show understanding that shapes in different categories (i.e. rhombus and rectangle) may share attributes (i.e. four sides) and that the shared attributes can define a larger category (i.e. quadrilaterals)</td> </tr> <tr> <td></td> <td>Express the area of the parts of a whole shape as unit fractions</td> </tr> <tr> <td></td> <td>Draw points, lines, line segments, rays, angles and perpendicular and parallel lines</td> </tr> <tr> <td></td> <td>Compose new shapes from composite shapes</td> </tr> </table> <p style="text-align: center;"><b>Mastered Skills</b></p> <table border="1" style="width: 100%;"> <tr> <td style="width: 20px;"></td> <td>Partition rectangles into row and columns</td> </tr> <tr> <td></td> <td>Recognize that equal shares of identical wholes need not have the same shape</td> </tr> <tr> <td></td> <td>Compose two-dimensional shapes or three-dimensional shapes to create a composite shape</td> </tr> <tr> <td></td> <td>Partition circles and rectangles into equal shares</td> </tr> <tr> <td></td> <td>Describe the divisions of shapes using the words halves, half of, fourths, fourth of, quarters and quarter of</td> </tr> <tr> <td></td> <td>Describe the whole of a shape as two of or four of the shares, two halves, three thirds, etc.</td> </tr> <tr> <td></td> <td>Show that decomposing into more equal shares creates smaller shares of an object</td> </tr> <tr> <td></td> <td>Analyze and compare two- and three-dimensional shapes</td> </tr> <tr> <td></td> <td>Build and draw shapes to possess defining attributes</td> </tr> <tr> <td></td> <td>Use informal language to describe similarities, different parts and other attributes of shapes</td> </tr> </table>		Recognize a line of symmetry for a two-dimensional figure as a line across the figure such that the figure can be folded along the line into matching parts		Identify line-symmetric figures and draw lines of symmetry		Show understanding that shapes in different categories (i.e. rhombus and rectangle) may share attributes (i.e. four sides) and that the shared attributes can define a larger category (i.e. quadrilaterals)		Express the area of the parts of a whole shape as unit fractions		Draw points, lines, line segments, rays, angles and perpendicular and parallel lines		Compose new shapes from composite shapes		Partition rectangles into row and columns		Recognize that equal shares of identical wholes need not have the same shape		Compose two-dimensional shapes or three-dimensional shapes to create a composite shape		Partition circles and rectangles into equal shares		Describe the divisions of shapes using the words halves, half of, fourths, fourth of, quarters and quarter of		Describe the whole of a shape as two of or four of the shares, two halves, three thirds, etc.		Show that decomposing into more equal shares creates smaller shares of an object		Analyze and compare two- and three-dimensional shapes		Build and draw shapes to possess defining attributes		Use informal language to describe similarities, different parts and other attributes of shapes		
	Recognize a line of symmetry for a two-dimensional figure as a line across the figure such that the figure can be folded along the line into matching parts																																			
	Identify line-symmetric figures and draw lines of symmetry																																			
	Show understanding that shapes in different categories (i.e. rhombus and rectangle) may share attributes (i.e. four sides) and that the shared attributes can define a larger category (i.e. quadrilaterals)																																			
	Express the area of the parts of a whole shape as unit fractions																																			
	Draw points, lines, line segments, rays, angles and perpendicular and parallel lines																																			
	Compose new shapes from composite shapes																																			
	Partition rectangles into row and columns																																			
	Recognize that equal shares of identical wholes need not have the same shape																																			
	Compose two-dimensional shapes or three-dimensional shapes to create a composite shape																																			
	Partition circles and rectangles into equal shares																																			
	Describe the divisions of shapes using the words halves, half of, fourths, fourth of, quarters and quarter of																																			
	Describe the whole of a shape as two of or four of the shares, two halves, three thirds, etc.																																			
	Show that decomposing into more equal shares creates smaller shares of an object																																			
	Analyze and compare two- and three-dimensional shapes																																			
	Build and draw shapes to possess defining attributes																																			
	Use informal language to describe similarities, different parts and other attributes of shapes																																			

