

## My Child's Learning - A Family Resource Grade 6 Mathematics - At A Glance

Organizing Idea	Grade 6 Learning Outcome	Highlights of your Child's Learning <i>(by the end of Grade 6)</i>
<b>Number</b>	Students investigate magnitude with positive and negative numbers.	<ul style="list-style-type: none"> <li>● Identify negative numbers in familiar contexts, including contexts that use vertical or horizontal models of the number line.</li> <li>● Compare and order positive and negative numbers.</li> <li>● Model and add any two negative or positive numbers (integers).</li> </ul>
	Students solve problems using standard algorithms for addition and subtraction.	<ul style="list-style-type: none"> <li>● Solve problems in various contexts (Example: money and measurement) using standard algorithms for addition and subtraction.</li> </ul>
	Students analyze numbers using prime factorization and exponentiation.	<ul style="list-style-type: none"> <li>● Compose a product in multiple ways, including with more than two factors.</li> <li>● Determine divisibility of a number from its prime factorization.</li> <li>● Express the product of identical factors as a power</li> </ul>
	Students apply standard algorithms to multiplication and division of decimal and natural numbers.	<ul style="list-style-type: none"> <li>● Multiply and divide numbers using standard algorithms</li> <li>● Check the reasonableness of a product or quotient by estimating..</li> <li>● Solve problems using multiplication and division, including problems involving money.</li> </ul>
	Students relate fractions to quotients.	<ul style="list-style-type: none"> <li>● Model and describe an equal-sharing situation in more than one way.</li> <li>● Express a fraction as a division statement and vice versa.</li> <li>● Change a fraction to a decimal using division.</li> </ul>
	Students add and subtract fractions with denominators within 100.	<ul style="list-style-type: none"> <li>● Express two fractions with common denominators.</li> <li>● Add and subtract fractions.</li> <li>● Solve problems involving addition and subtraction of fractions.</li> </ul>
	Students interpret the multiplication of natural numbers by fractions.	<ul style="list-style-type: none"> <li>● Multiply a number by a fraction.</li> <li>● Relate multiplication by a unit fraction to division.</li> <li>● Solve problems using multiplication of a fraction and a natural number.</li> </ul>

	Students apply equivalence to the interpretation of ratios and rates.	<ul style="list-style-type: none"> <li>• Determine whether two ratios are equivalent.</li> <li>• Relate percentage of a number to a proportion.</li> <li>• Determine a percent of a number, limited to percentages within 100%.</li> <li>• Solve problems involving ratios, rates, and proportions.</li> </ul>
<b>Algebra</b>	Students analyze expressions and solve algebraic equations.	<ul style="list-style-type: none"> <li>• Evaluate expressions involving operations in brackets and powers according to the order of operations.</li> <li>• Simplify algebraic expressions by combining like terms.</li> <li>• Determine different strategies for solving equations.</li> <li>• Solve problems using equations limited to one or two operations.</li> </ul>
<b>Geometry</b>	Students analyze shapes through symmetry and congruence.	<ul style="list-style-type: none"> <li>• Describe the symmetry between two shapes as reflection symmetry or rotational symmetry.</li> <li>• Symmetry is a relationship between two shapes that can be mapped exactly onto</li> </ul>
<b>Coordinate Geometry</b>	Students explain location and movement in relation to position in the Cartesian plane.	<ul style="list-style-type: none"> <li>• Location can be described using coordinates on a grid. (includes all 4 quadrants)</li> <li>• Create an image of a polygon in the Cartesian plane by reflecting, rotating or translating (sliding).</li> </ul>
<b>Measurement</b>	Students analyze areas of parallelograms and triangles.	<ul style="list-style-type: none"> <li>• Understand the characteristics of triangles and parallelograms related to length and area</li> <li>• Describe the relationship between the area of a triangle and the area of a parallelogram with the same base and height.</li> <li>• Determine the area of composite shapes using the areas of triangles and parallelograms.</li> </ul>
<b>Patterns</b>	Students investigate functions to enhance understanding of change.	<ul style="list-style-type: none"> <li>• Create a table of values related to the function.</li> <li>• Create a graph from the table of values.</li> <li>• Write an algebraic expression that represents a function.</li> <li>• Solve problems involving a function.</li> </ul>
<b>Statistics</b>	Students investigate relative frequency using experimental data.	<ul style="list-style-type: none"> <li>• Express relative frequencies as decimals, fractions, or percentages.</li> <li>• Collect categorized data through experiments.</li> <li>• Analyze relative frequency statistics from experiments with different sample sizes.</li> </ul>

For additional resources to support your math learner:

[Doing Mathematics with Your Child, Kindergarten to Grade 6. A Parent Guide](#)

[Helping Your Child Learn Math: A Parent's Guide](#)