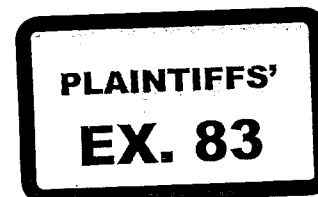


### 3rd Grade Mathematics

Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations of whole numbers</li> <li>• statistical measures (minimum and maximum value, range, mode, and median)</li> <li>• multiplication and division fact families</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>• comparing whole numbers</li> <li>• combining coins and bills</li> <li>• identifying pattern block shapes</li> <li>• telling time</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>• one-step real-world addition and subtraction problems</li> <li>• real-world measurement problems</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• represent patterns in multiple ways</li> <li>• generalize a numerical pattern in words</li> <li>• list possible outcomes</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations of whole numbers</li> <li>• statistical measures (minimum and maximum value, range, mode, and median)</li> <li>• multiplication and division fact families</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>• comparing whole numbers</li> <li>• combining coins and bills</li> <li>• identifying pattern block shapes</li> <li>• telling time</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>• one-step real-world addition and subtraction problems</li> <li>• real-world measurement problems</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• represent patterns in multiple ways</li> <li>• generalize a numerical pattern in words</li> <li>• list possible outcomes</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations of whole numbers</li> <li>• statistical measures (minimum and maximum value, range, mode, and median)</li> <li>• multiplication and division fact families</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>• comparing whole numbers</li> <li>• combining coins and bills</li> <li>• identifying pattern block shapes</li> <li>• telling time</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately solve</u></p> <ul style="list-style-type: none"> <li>• one-step real-world addition and subtraction problems</li> <li>• real-world measurement problems</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• represent patterns in multiple ways</li> <li>• generalize a numerical pattern in words</li> <li>• list possible outcomes</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations of whole numbers</li> <li>• statistical measures (minimum and maximum value, range, mode, and median)</li> <li>• multiplication and division fact families</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>• comparing whole numbers</li> <li>• combining coins and bills</li> <li>• identifying pattern block shapes</li> <li>• telling time</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately solve</u></p> <ul style="list-style-type: none"> <li>• one-step real-world addition and subtraction problems</li> <li>• real-world measurement problems</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• represent patterns in multiple ways</li> <li>• generalize a numerical pattern in words</li> <li>• list possible outcomes</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations of whole numbers</li> <li>• statistical measures (minimum and maximum value, range, mode, and median)</li> <li>• multiplication and division fact families</li> </ul> <p>The student is <u>highly accurate</u> when</p> <ul style="list-style-type: none"> <li>• comparing whole numbers</li> <li>• combining coins and bills</li> <li>• identifying pattern block shapes</li> <li>• telling time</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately solve</u></p> <ul style="list-style-type: none"> <li>• one-step real-world addition and subtraction problems</li> <li>• real-world measurement problems</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• represent patterns in multiple ways</li> <li>• generalize a numerical pattern in words</li> <li>• list possible outcomes</li> </ul>



4<sup>th</sup> Grade Mathematics

Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>place value concepts and notations</li> <li>concepts of whole number properties</li> <li>measurement tools</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>solving one variable, one-step whole number equations with basic facts, money, and time</li> <li>using one operation function tables</li> <li>performing single transformation of two-dimensional figures</li> <li>reading and plotting points in the first quadrant of a coordinate grid</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>one- and two-step real-world problems with addition, subtraction, and multiplication</li> <li>real-world applications of the statistical measures (minimum and maximum value, range, mode, median, and mean)</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent relationships between mathematical operations</li> <li>describe mathematical relationships with various models</li> <li>identify plane figures within a composite figure</li> <li>make reasonable estimations of measurements and calculations</li> <li>graph data presented in a variety of formats including bar graph, pictograph, circle graph, Venn diagram, line plot</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>place value concepts and notations</li> <li>concepts of whole number properties</li> <li>measurement tools</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>solving one variable, one-step whole number equations with basic facts, money, and time</li> <li>using one operation function tables</li> <li>performing single transformation of two-dimensional figures</li> <li>reading and plotting points in the first quadrant of a coordinate grid</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>one- and two-step real-world problems with addition, subtraction, and multiplication</li> <li>real-world applications of the statistical measures (minimum and maximum value, range, mode, median, and mean)</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent relationships between mathematical operations</li> <li>describe mathematical relationships with various models</li> <li>identify plane figures within a composite figure</li> <li>make reasonable estimations of measurements and calculations</li> <li>graph data presented in a variety of formats including bar graph, pictograph, circle graph, Venn diagram, line plot</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>place value concepts and notations</li> <li>concepts of whole number properties</li> <li>measurement tools</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>solving one variable, one-step whole number equations with basic facts, money, and time</li> <li>using one operation function tables</li> <li>performing single transformation of two-dimensional figures</li> <li>reading and plotting points in the first quadrant of a coordinate grid</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>one- and two-step real-world problems with addition, subtraction, and multiplication</li> <li>real-world applications of the statistical measures (minimum and maximum value, range, mode, median, and mean)</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent relationships between mathematical operations</li> <li>describe mathematical relationships with various models</li> <li>identify plane figures within a composite figure</li> <li>make reasonable estimations of measurements and calculations</li> <li>graph data presented in a variety of formats including bar graph, pictograph, circle graph, Venn diagram, line plot</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>place value concepts and notations</li> <li>concepts of whole number properties</li> <li>measurement tools</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>solving one variable, one-step whole number equations with basic facts, money, and time</li> <li>using one operation function tables</li> <li>performing single transformation of two-dimensional figures</li> <li>reading and plotting points in the first quadrant of a coordinate grid</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>one- and two-step real-world problems with addition, subtraction, and multiplication</li> <li>real-world applications of the statistical measures (minimum and maximum value, range, mode, median, and mean)</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent relationships between mathematical operations</li> <li>describe mathematical relationships with various models</li> <li>identify plane figures within a composite figure</li> <li>make reasonable estimations of measurements and calculations</li> <li>graph data presented in a variety of formats including bar graph, pictograph, circle graph, Venn diagram, line plot</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>place value concepts and notations</li> <li>concepts of whole number properties</li> <li>measurement tools</li> </ul> <p>The student is <u>highly accurate</u> when</p> <ul style="list-style-type: none"> <li>solving one variable, one-step whole number equations with basic facts, money, and time</li> <li>using one operation function tables</li> <li>performing single transformation of two-dimensional figures</li> <li>reading and plotting points in the first quadrant of a coordinate grid</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>one- and two-step real-world problems with addition, subtraction, and multiplication</li> <li>real-world applications of the statistical measures (minimum and maximum value, range, mode, median, and mean)</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent relationships between mathematical operations</li> <li>describe mathematical relationships with various models</li> <li>identify plane figures within a composite figure</li> <li>make reasonable estimations of measurements and calculations</li> <li>graph data presented in a variety of formats including bar graph, pictograph, circle graph, Venn diagram, line plot</li> </ul>

5<sup>th</sup> Grade Mathematics

Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations for whole numbers, fractions, and decimals</li> <li>• greatest common factor and least common multiple</li> <li>• properties of solids</li> <li>• statistical measures (minimum and maximum value, mean, median, mode, and range)</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>• solving one-step whole number equations</li> <li>• converting within the customary system</li> <li>• using a function table to identify, plot, and label ordered pairs</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>• one- and two-step real-world problems with addition, subtraction, multiplication, and division</li> <li>• real-world applications of the properties of plane figures</li> <li>• real-world applications of measurement and measurement formulas</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• estimate number quantities</li> <li>• determine and find exact or approximate answers</li> <li>• represent situations with variables and symbols</li> <li>• interpret and use data displays for developing convincing arguments</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations for whole numbers, fractions, and decimals</li> <li>• greatest common factor and least common multiple</li> <li>• properties of solids</li> <li>• statistical measures (minimum and maximum value, mean, median, mode, and range)</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>• solving one-step whole number equations</li> <li>• converting within the customary system</li> <li>• using a function table to identify, plot, and label ordered pairs</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>• one- and two-step real-world problems with addition, subtraction, multiplication, and division</li> <li>• real-world applications of the properties of plane figures</li> <li>• real-world applications of measurement and measurement formulas</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• estimate number quantities</li> <li>• determine and find exact or approximate answers</li> <li>• represent situations with variables and symbols</li> <li>• interpret and use data displays for developing convincing arguments</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations for whole numbers, fractions, and decimals</li> <li>• greatest common factor and least common multiple</li> <li>• properties of solids</li> <li>• statistical measures (minimum and maximum value, mean, median, mode, and range)</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>• solving one-step whole number equations</li> <li>• converting within the customary system</li> <li>• using a function table to identify, plot, and label ordered pairs</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>• one- and two-step real-world problems with addition, subtraction, multiplication, and division</li> <li>• real-world applications of the properties of plane figures</li> <li>• real-world applications of measurement and measurement formulas</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• estimate number quantities</li> <li>• determine and find exact or approximate answers</li> <li>• represent situations with variables and symbols</li> <li>• interpret and use data displays for developing convincing arguments</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations for whole numbers, fractions, and decimals</li> <li>• greatest common factor and least common multiple</li> <li>• properties of solids</li> <li>• statistical measures (minimum and maximum value, mean, median, mode, and range)</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>• solving one-step whole number equations</li> <li>• converting within the customary system</li> <li>• using a function table to identify, plot, and label ordered pairs</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>• one- and two-step real-world problems with addition, subtraction, multiplication, and division</li> <li>• real-world applications of the properties of plane figures</li> <li>• real-world applications of measurement and measurement formulas</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• estimate number quantities</li> <li>• determine and find exact or approximate answers</li> <li>• represent situations with variables and symbols</li> <li>• interpret and use data displays for developing convincing arguments</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>• equivalent representations for whole numbers, fractions, and decimals</li> <li>• greatest common factor and least common multiple</li> <li>• properties of solids</li> <li>• statistical measures (minimum and maximum value, mean, median, mode, and range)</li> </ul> <p>The student is <u>highly accurate</u> when</p> <ul style="list-style-type: none"> <li>• solving one-step whole number equations</li> <li>• converting within the customary system</li> <li>• using a function table to identify, plot, and label ordered pairs</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>• one- and two-step real-world problems with addition, subtraction, multiplication, and division</li> <li>• real-world applications of the properties of plane figures</li> <li>• real-world applications of measurement and measurement formulas</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>• estimate number quantities</li> <li>• determine and find exact or approximate answers</li> <li>• represent situations with variables and symbols</li> <li>• interpret and use data displays for developing convincing arguments</li> </ul>

6th Grade Mathematics

Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>relationships between percents, decimals, and fractions</li> <li>basic operations of whole numbers and decimals and addition, subtraction, and multiplication of fractions</li> <li>probability of simple events</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>comparing integers, fractions, and decimals</li> <li>classifying angles and triangles</li> <li>converting within the metric system</li> <li>performing transformations of two-dimensional figures</li> <li>reading and plotting points in the coordinate plane</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>one-and two-step real world problems with rational numbers</li> <li>real-world problems for perimeter of polygons and area of squares, rectangles, and triangles</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>check reasonableness of estimates and make predictions</li> <li>continue patterns and generalize the rule for the next number</li> <li>represent real-world situations by writing and/or solving one-step equations with positive rational numbers</li> <li>list all possible outcomes</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>relationships between percents, decimals, and fractions</li> <li>basic operations of whole numbers and decimals and addition, subtraction, and multiplication of fractions</li> <li>probability of simple events</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>comparing integers, fractions, and decimals</li> <li>classifying angles and triangles</li> <li>converting within the metric system</li> <li>performing transformations of two-dimensional figures</li> <li>reading and plotting points in the coordinate plane</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>one-and two-step real world problems with rational numbers</li> <li>real-world problems for perimeter of polygons and area of squares, rectangles, and triangles</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>check reasonableness of estimates and make predictions</li> <li>continue patterns and generalize the rule for the next number</li> <li>represent real-world situations by writing and/or solving one-step equations with positive rational numbers</li> <li>list all possible outcomes</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>relationships between percents, decimals, and fractions</li> <li>basic operations of whole numbers and decimals and addition, subtraction, and multiplication of fractions</li> <li>probability of simple events</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>comparing integers, fractions, and decimals</li> <li>classifying angles and triangles</li> <li>converting within the metric system</li> <li>performing transformations of two-dimensional figures</li> <li>reading and plotting points in the coordinate plane</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>one-and two-step real world problems with rational numbers</li> <li>real-world problems for perimeter of polygons and area of squares, rectangles, and triangles</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>check reasonableness of estimates and make predictions</li> <li>continue patterns and generalize the rule for the next number</li> <li>represent real-world situations by writing and/or solving one-step equations with positive rational numbers</li> <li>list all possible outcomes</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>relationships between percents, decimals, and fractions</li> <li>basic operations of whole numbers and decimals and addition, subtraction, and multiplication of fractions</li> <li>probability of simple events</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>comparing integers, fractions, and decimals</li> <li>classifying angles and triangles</li> <li>converting within the metric system</li> <li>performing transformations of two-dimensional figures</li> <li>reading and plotting points in the coordinate plane</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>one-and two-step real world problems with rational numbers</li> <li>real-world problems for perimeter of polygons and area of squares, rectangles, and triangles</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>check reasonableness of estimates and make predictions</li> <li>continue patterns and generalize the rule for the next number</li> <li>represent real-world situations by writing and/or solving one-step equations with positive rational numbers</li> <li>list all possible outcomes</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>relationships between percents, decimals, and fractions</li> <li>basic operations of whole numbers and decimals and addition, subtraction, and multiplication of fractions</li> <li>probability of simple events</li> </ul> <p>The student is <u>highly accurate</u> when</p> <ul style="list-style-type: none"> <li>comparing integers, fractions, and decimals</li> <li>classifying angles and triangles</li> <li>converting within the metric system</li> <li>performing transformations of two-dimensional figures</li> <li>reading and plotting points in the coordinate plane</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>one and two-step real world problems with rational numbers</li> <li>real-world problems for perimeter of polygons and area of squares, rectangles, and triangles</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>check reasonableness of estimates and make predictions</li> <li>continue patterns and generalize the rule for the next number</li> <li>represent real-world situations by writing and/or solving one-step equations with positive rational numbers</li> <li>list all possible outcomes</li> </ul>

## 7th Grade Mathematics


Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>percentages of rational numbers</li> <li>mathematical relationship between ratios, proportions, and percents</li> <li>measurement formulas for perimeter, area, surface area, and volume</li> <li>scale drawings</li> <li>properties of triangles and quadrilaterals</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>adding, subtracting, multiplying, and dividing whole numbers, fractions, and decimals</li> <li>stating the rule for the nth term of a pattern</li> <li>evaluating simple algebraic expressions</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>real-world problems for perimeter and area</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>generate equivalent representations of rational numbers and simple algebraic expressions</li> <li>continue and generalize patterns including perfect squares, cubes, factors, multiples, and arithmetic and geometric sequences</li> <li>represent real-world problems using variables and symbols</li> <li>read graphs presented in a variety of formats including circle graphs, stem-and-leaf graphs, and box-and-whiskers plots</li> <li>recognize misleading data representations and effects of scale changes</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>percentages of rational numbers</li> <li>mathematical relationship between ratios, proportions, and percents</li> <li>measurement formulas for area, perimeter, surface area, and volume</li> <li>scale drawings</li> <li>properties of triangles and quadrilaterals</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>adding, subtracting, multiplying, and dividing whole numbers, fractions, and decimals</li> <li>stating the rule for the nth term of a pattern</li> <li>evaluating simple algebraic expressions</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>real-world problems for perimeter and area</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>generate equivalent representations of rational numbers and simple algebraic expressions</li> <li>continue and generalize patterns including perfect squares, cubes, factors, multiples, and arithmetic and geometric sequences</li> <li>represent real-world problems using variables and symbols</li> <li>read graphs presented in a variety of formats including circle graphs, stem-and-leaf graphs, and box-and-whiskers plots</li> <li>recognize misleading data representations and effects of scale changes</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>percentages of rational numbers</li> <li>mathematical relationship between ratios, proportions, and percents</li> <li>measurement formulas for perimeter, area, surface area, and volume</li> <li>scale drawings</li> <li>properties of triangles and quadrilaterals</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>adding, subtracting, multiplying, and dividing whole numbers, fractions, and decimals</li> <li>stating the rule for the nth term of a pattern</li> <li>evaluating simple algebraic expressions</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems for perimeter and area</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>generate equivalent representations of rational numbers and simple algebraic expressions</li> <li>continue and generalize patterns including perfect squares, cubes, factors, multiples, and arithmetic and geometric sequences</li> <li>represent real-world problems using variables and symbols</li> <li>read graphs presented in a variety of formats including circle graphs, stem-and-leaf graphs, and box-and-whiskers plots</li> <li>recognize misleading data representations and effects of scale changes</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>percentages of rational numbers</li> <li>mathematical relationship between ratios, proportions, and percents</li> <li>measurement formulas for perimeter, area, surface area, and volume</li> <li>scale drawings</li> <li>properties of triangles and quadrilaterals</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>adding, subtracting, multiplying, and dividing whole numbers, fractions, and decimals</li> <li>stating the rule for the nth term of a pattern</li> <li>evaluating simple algebraic expressions</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems for perimeter and area</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>generate equivalent representations of rational numbers and simple algebraic expressions</li> <li>continue and generalize patterns including perfect squares, cubes, factors, multiples, and arithmetic and geometric sequences</li> <li>represent real-world problems using variables and symbols</li> <li>read graphs presented in a variety of formats including circle graphs, stem-and-leaf graphs, and box-and-whiskers plots</li> <li>recognize misleading data representations and effects of scale changes</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>percentages of rational numbers</li> <li>mathematical relationship between ratios, proportions, and percents</li> <li>measurement formulas for perimeter, area, surface area, and volume</li> <li>scale drawings</li> <li>properties of triangles and quadrilaterals</li> </ul> <p>The student is <u>highly accurate</u> when</p> <ul style="list-style-type: none"> <li>adding, subtracting, multiplying, and dividing whole numbers, fractions, and decimals</li> <li>stating the rule for the nth term of a pattern</li> <li>evaluating simple algebraic expressions</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems for perimeter and area</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>generate equivalent representations of rational numbers and simple algebraic expressions</li> <li>continue and generalize patterns including perfect squares, cubes, factors, multiples, and arithmetic and geometric sequences</li> <li>represent real-world problems using variables and symbols</li> <li>read graphs presented in a variety of formats including circle graphs, stem-and-leaf graphs, and box-and-whiskers plots</li> <li>recognize misleading data representations and effects of scale changes</li> </ul>

8th Grade Mathematics

Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>subsets of real numbers</li> <li>the Pythagorean Theorem</li> <li>corresponding parts of congruent and similar figures</li> <li>measures of central tendency with rational numbers</li> <li>ordered pairs, slope, and vertical/horizontal distance</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>computing with integers and order of operations with rational numbers</li> <li>applying real number properties</li> <li>solving one- and two-step linear equations</li> <li>multiplying and dividing numbers between 0 and 1, numbers larger than one, and multiplying by zero</li> <li>finding the probability of compound and independent events</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>real-world problems with rational numbers, pi, and percents</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent real-world problems</li> <li>translate between numerical, graphical, tabular, and symbolic representations of linear relationships</li> <li>model situations graphically, algebraically and geometrically</li> <li>predict simple events</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>subsets of real numbers</li> <li>the Pythagorean Theorem</li> <li>corresponding parts of congruent and similar figures</li> <li>measures of central tendency with rational numbers</li> <li>ordered pairs, slope, and vertical/horizontal distance</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>computing with integers and order of operations with rational numbers</li> <li>applying real number properties</li> <li>solving one- and two-step linear equations</li> <li>multiplying and dividing numbers between 0 and 1, numbers larger than one, and multiplying by zero</li> <li>finding the probability of compound and independent events</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>real-world problems with rational numbers, pi, and percents</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent real-world problems</li> <li>translate between numerical, graphical, tabular, and symbolic representations of linear relationships</li> <li>model situations graphically, algebraically and geometrically</li> <li>predict simple events</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>subsets of real numbers</li> <li>the Pythagorean Theorem</li> <li>corresponding parts of congruent and similar figures</li> <li>measures of central tendency with rational numbers</li> <li>ordered pairs, slope, and vertical/horizontal distance</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>computing with integers and order of operations with rational numbers</li> <li>applying real number properties</li> <li>solving one- and two-step linear equations</li> <li>multiplying and dividing numbers between 0 and 1, numbers larger than one, and multiplying by zero</li> <li>finding the probability of compound and independent events</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems with rational numbers, pi, and percents</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent real-world problems</li> <li>translate between numerical, graphical, tabular, and symbolic representations of linear relationships</li> <li>model situations graphically, algebraically and geometrically</li> <li>predict simple events</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>subsets of real numbers</li> <li>the Pythagorean Theorem</li> <li>corresponding parts of congruent and similar figures</li> <li>measures of central tendency with rational numbers</li> <li>ordered pairs, slope, and vertical/horizontal distance</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>computing with integers and order of operations with rational numbers</li> <li>applying real number properties</li> <li>solving one- and two-step linear equations</li> <li>multiplying and dividing numbers between 0 and 1, numbers larger than one, and multiplying by zero</li> <li>finding the probability of compound and independent events</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems with rational numbers, pi, and percents</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent real-world problems</li> <li>translate between numerical, graphical, tabular, and symbolic representations of linear relationships</li> <li>model situations graphically, algebraically and geometrically</li> <li>predict simple events</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>subsets of real numbers</li> <li>the Pythagorean Theorem</li> <li>corresponding parts of congruent and similar figures</li> <li>measures of central tendency with rational numbers</li> <li>ordered pairs, slope, and vertical/horizontal distance</li> </ul> <p>The student is <u>highly accurate</u> when</p> <ul style="list-style-type: none"> <li>computing with integers and order of operations with rational numbers</li> <li>applying real number properties</li> <li>solving one- and two-step linear equations</li> <li>multiplying and dividing numbers between 0 and 1, numbers larger than one, and multiplying by zero</li> <li>finding the probability of compound and independent events</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems with rational numbers, pi, and percents</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>represent real-world problems</li> <li>translate between numerical, graphical, tabular, and symbolic representations of linear relationships</li> <li>model situations graphically, algebraically and geometrically</li> <li>predict simple events</li> </ul>

## High School Mathematics

Academic Warning	Approaches Standard	Meets Standard	Exceeds Standard	Exemplary
<p>A student scoring at the academic warning level <u>always performs inconsistently and/or inaccurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student <u>struggles</u> to demonstrate content knowledge and application skills. The student <u>seldom</u> understands and uses</p> <ul style="list-style-type: none"> <li>properties of real numbers</li> <li>slopes of parallel and perpendicular lines</li> <li>slope/y-intercept forms of a line</li> </ul> <p>The student is <u>inaccurate</u> when</p> <ul style="list-style-type: none"> <li>solving systems of equations</li> <li>computing probability and odds</li> <li>analyzing the effects of transformations on perimeter, area, and volume</li> <li>analyzing the effect of changes in the slope and constant of linear equations</li> </ul> <p>The student <u>seldom uses</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>real-world problems involving volume and surface area of rectangular solids and cylinder, and application of percents</li> <li>real-world applications of linear equations and inequalities</li> <li>real-world applications of the Pythagorean Theorem</li> <li>real-world problems using data analysis from a data display</li> </ul> <p>The student <u>inconsistently uses</u> representations and is <u>unable to explain</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>adjust estimates</li> <li>represent real-world problems with linear equations and inequalities</li> <li>interpret the real-world meaning of slope, intercepts, and points on/off a line</li> <li>interpret the effect of outliers</li> <li>approximate the line of best fit</li> <li>analyze data from a data display</li> </ul>	<p>A student scoring at the approaches standard level <u>usually performs inconsistently and/or inaccurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>limited</u> content knowledge and application skills. The student <u>sometimes</u> understands and uses</p> <ul style="list-style-type: none"> <li>properties of real numbers</li> <li>slopes of parallel and perpendicular lines</li> <li>slope/y-intercept forms of a line</li> </ul> <p>The student is <u>rarely accurate</u> when</p> <ul style="list-style-type: none"> <li>solving systems of equations</li> <li>computing probability and odds</li> <li>analyzing the effects of transformations on perimeter, area, and volume</li> <li>analyzing the effect of changes in the slope and constant of linear equations</li> </ul> <p>The student <u>inconsistently uses some</u> problem-solving techniques to solve</p> <ul style="list-style-type: none"> <li>real-world problems involving volume and surface area of rectangular solids and cylinder, and application of percents</li> <li>real-world applications of linear equations and inequalities</li> <li>real-world applications of the Pythagorean Theorem</li> <li>real-world problems using data analysis from a data display</li> </ul> <p>The student <u>inconsistently uses</u> representations and <u>partially explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>adjust estimates</li> <li>represent real-world problems with linear equations and inequalities</li> <li>interpret the real-world meaning of slope, intercepts, and points on/off a line</li> <li>interpret the effect of outliers</li> <li>approximate the line of best fit</li> <li>analyze data from a data display</li> </ul>	<p>A student scoring at the meets standard level <u>usually performs consistently and accurately</u> when working on <u>most</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>sufficient</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>properties of real numbers</li> <li>slopes of parallel and perpendicular lines</li> <li>slope/y-intercept forms of a line</li> </ul> <p>The student is <u>usually accurate</u> when</p> <ul style="list-style-type: none"> <li>solving systems of equations</li> <li>computing probability and odds</li> <li>analyzing the effects of transformations on perimeter, area, and volume</li> <li>analyzing the effect of changes in the slope and constant of linear equations</li> </ul> <p>The student <u>uses some</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems involving volume and surface area of rectangular solids and cylinder, and application of percents</li> <li>real-world applications of linear equations and inequalities</li> <li>real-world applications of the Pythagorean Theorem</li> <li>real-world problems using data analysis from a data display</li> </ul> <p>The student <u>uses</u> representations and <u>usually explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>adjust estimates</li> <li>represent real-world problems with linear equations and inequalities</li> <li>interpret the real-world meaning of slope, intercepts, and points on/off a line</li> <li>interpret the effect of outliers</li> <li>approximate the line of best fit</li> <li>analyze data from a data display</li> </ul>	<p>A student scoring at the exceeds standard level <u>usually performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>well-developed</u> content knowledge and application skills. The student <u>usually</u> understands and uses</p> <ul style="list-style-type: none"> <li>properties of real numbers</li> <li>slopes of parallel and perpendicular lines</li> <li>slope/y-intercept forms of a line</li> </ul> <p>The student is <u>accurate</u> when</p> <ul style="list-style-type: none"> <li>solving systems of equations</li> <li>computing probability and odds</li> <li>analyzing the effects of transformations on perimeter, area, and volume</li> <li>analyzing the effect of changes in the slope and constant of linear equations</li> </ul> <p>The student <u>usually uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems involving volume and surface area of rectangular solids and cylinder, and application of percents</li> <li>real-world applications of linear equations and inequalities</li> <li>real-world applications of the Pythagorean Theorem</li> <li>real-world problems using data analysis from a data display</li> </ul> <p>The student <u>uses</u> representations and <u>sufficiently explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>adjust estimates</li> <li>represent real-world problems with linear equations and inequalities</li> <li>interpret the real-world meaning of slope, intercepts, and points on/off a line</li> <li>interpret the effect of outliers</li> <li>approximate the line of best fit</li> <li>analyze data from a data display</li> </ul>	<p>A student scoring at the exemplary level <u>always performs consistently and accurately</u> when working on <u>all</u> grade-level mathematical tasks.</p> <p>The student demonstrates <u>highly-developed</u> content knowledge and application skills. The student <u>consistently</u> understands and uses</p> <ul style="list-style-type: none"> <li>properties of real numbers</li> <li>slopes of parallel and perpendicular lines</li> <li>slope and y-intercept forms of a line</li> </ul> <p>The student is <u>always accurate</u> when</p> <ul style="list-style-type: none"> <li>solving systems of equations</li> <li>computing probability and odds</li> <li>analyzing the effects of transformations on perimeter, area, and volume</li> <li>analyzing the effect of changes in the slope and constant of linear equations</li> </ul> <p>The student <u>effectively uses multiple</u> problem-solving techniques to <u>accurately</u> solve</p> <ul style="list-style-type: none"> <li>real-world problems involving volume and surface area of rectangular solids and cylinder, and application of percents</li> <li>real-world applications of linear equations and inequalities</li> <li>real-world applications of the Pythagorean Theorem</li> <li>real-world problems using data analysis from a data display</li> </ul> <p>The student <u>accurately uses</u> representations and <u>effectively explains</u> the reasoning process used to</p> <ul style="list-style-type: none"> <li>adjust estimates</li> <li>represent real-world problems with linear equations and inequalities</li> <li>interpret the real-world meaning of slope, intercepts, and points on/off a line</li> <li>interpret the effect of outliers</li> <li>approximate the line of best fit</li> <li>analyze data from a data display</li> </ul>



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### Mathematics Assessment Information

Starting In the spring of 2006, the revised Kansas Mathematics Standards (2003) are assessed using a revised Kansas Mathematics Assessment designed for all grades, 3<sup>rd</sup> through 8<sup>th</sup> plus one at high school. The columns on the right side of each document show each grade level where the specified indicator from the 1999 column are assessed, which began with the spring 2006 assessments.

[Mathematics Assessment Fact Sheet](#)

### Assessment Framework

In this document you will find the following components

- Assessment Framework Information
- Cognitive Categories for Mathematics - Grade 2-High School
- Grades 2 - High School Assessment Framework Summary
- Grade Level Assessment Framework

[Assessment Framework Word](#)  
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### Mathematics Quick Links

- Standards
- Resources
- Math Science Partnership
- Mathematics Standards Training Modules

### Test Specifications

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### Mathematics Performance Level Descriptors

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