

Grade 3 Math Proficiency Scale T1

	Novice "1"	Approaching "2"	Proficient "3"	Advanced "4"
Communication Math Practices 3 and 6	Participates in asking questions and sharing ideas, including the construction of arguments.	Asks questions and explains ideas, constructs viable arguments.	Asks questions and explains ideas clearly, constructs viable arguments and critiques the reasoning of others, explains the reasoning with clarity and use of some related academic vocabulary.	Asks questions and explains ideas clearly with details, constructs viable arguments, and critiques the reasoning of others using academic vocabulary related to the task, reasoning shows insight and deeper understanding.
Critical Thinking Math Practices 1, 2, 4, 5, 7,8	Participates in creating questions, gathering information, and understanding connections; and looking for structure to make sense of problems.	Creates basic questions, gathers information, and understands connections; and begins to reason abstractly and quantitatively to look for structure and make sense of problems, attends to precision and perseveres in finding a solution.	Creates questions, gathers information, and understands connections; and reasons abstractly and quantitatively to find structure and make sense of problems, attends to precision and perseveres in finding a solution.	Creates questions, gathers information, and understands connections between parts of a system, and patterns including repeated reasoning; <u>and</u> reasons abstractly and quantitatively to find structure and make sense of problems; <u>and</u> attends to precision and perseveres in finding a solution and reflects upon the thinking process
Geometry			This category is not adequately assessed in this trimester.	
Measurement & Data 3.MD.3	Participates in solving basic problems using the information from scaled picture graphs and bar graphs.	Labels some components accurately when constructing picture and bar graphs and interprets some the information, using the information to solve basic problems. <small>(Students are working toward measuring lengths using rulers marked with halves and fourths of an inch)</small>	Constructs and reads scaled picture graphs and bar graphs, using the information to solve problems.	Constructs and reads scaled picture graphs and bar graphs, using the information to solve complex problems.

Number & Operations in Base Ten 3.NBT.2	Participates in adding and subtracting 2-digit numbers with visual supports and the use of strategies based on place value and the relationship between addition and subtraction.	Adds and subtracts 2-digit numbers with visual supports using strategies and algorithms based on place value, properties of operations and/or the relationship between addition and subtraction.	Adds and subtracts 2-digit numbers using strategies and algorithms based on place value, properties of operations and/or the relationship between addition and subtraction.	Adds and subtracts 2-digit numbers with multiple strategies, including mental math.
Number & Operations in Fractions			This category is not adequately assessed in this trimester.	
Operations & Algebraic Thinking 3.OA.8-9	Participates in using addition, subtraction, and multiplication strategies to solve story problems that require one step within 20; <u>and</u> in activities to identify and explain patterns among facts.	Uses addition, subtraction, and multiplication strategies to solve story problems that require one step within 20; <u>and</u> identifies and explains some patterns among facts using the properties of operations.	Uses addition, subtraction, and multiplication strategies to solve story problems that require more than one step within 100; <u>and</u> identifies and explains patterns among facts using the properties of operations.	Shows in-depth inferences and application Uses a rich variety of possible multiplicative strategies to show fluency in multiplicative basic facts (including division)

Grade 3 Math Proficiency Scale T2

	Novice “1”	Approaching “2”	Proficient “3”	Advanced “4”
Communication Math Practices 3 and 6	Participates in asking questions and sharing ideas, including the construction of arguments.	Asks questions and explains ideas, constructs viable arguments.	Asks questions and explains ideas clearly, constructs viable arguments and critiques the reasoning of others, explains the reasoning with clarity and use of some related academic vocabulary.	Asks questions and explains ideas clearly with details, constructs viable arguments, and critiques the reasoning of others using academic vocabulary related to the task, reasoning shows insight and deeper understanding.
Critical Thinking Math Practices 1, 2, 4, 5, 7,8	Participates in creating questions, gathering information, and understanding connections; and looking for structure to make sense of problems.	Creates basic questions, gathers information, and understands connections; and begins to reason abstractly and quantitatively to look for structure and make sense of problems, attends to precision and perseveres in finding a solution.	Creates questions, gathers information, and understands connections; and reasons abstractly and quantitatively to find structure and make sense of problems, attends to precision and perseveres in finding a solution.	Creates questions, gathers information, and understands connections between parts of a system, and patterns including repeated reasoning; <u>and</u> reasons abstractly and quantitatively to find structure and make sense of problems; <u>and</u> attends to precision and perseveres in finding a solution and reflects upon the thinking process
Geometry			This category is not adequately assessed in this trimester.	
Measurement & Data 3.MD.1, 3, 7	Participates in telling time; <u>and</u> in estimating and measuring liquid and mass with metric units; <u>and</u> in finding the area of a rectangle.	Tells time to the nearest five minute; <u>and</u> estimates and measures liquid volume and mass using some metric units; finds the area of a rectangle by counting units; <u>and</u> solves story problems within a broader range than computations.	Tells time to the minute; <u>and</u> estimates and measures liquid volume and mass in metric units; finds the area of a rectangle using multiplication; <u>and</u> solves story problems. (Students are working toward measuring lengths using rulers marked with halves and fourths of an inch)	Tells time to the minute; <u>and</u> estimates and measures liquid volume and mass in metric units; finds the area of a complex shape using multi-step problems; <u>and</u> solves story problems; <u>and</u> shows in-depth inferences and application

Number & Operations in Base Ten 3.NBT.1-2	Participates in adding and subtracting 2-digit numbers using strategies and algorithms based on place value; <u>and</u> rounding 2-digit numbers to the nearest 10 and 3-digit numbers to the nearest 100 with visual supports.	Adds and subtracts 2-digit numbers using strategies and algorithms based on place value, properties of operations and/or the relationship between addition and subtraction; <u>and</u> rounds 2-digit numbers to the nearest 10 and 3-digit numbers to the nearest 100 with visual supports.	Adds and subtracts 3-digit numbers using strategies and algorithms based on place value, properties of operations and/or the relationship between addition and subtraction; <u>and</u> rounds numbers to the nearest 10 or the nearest 100.	Adds and subtracts 4-digit numbers using strategies and algorithms based on place value, properties of operations and/or the relationship between addition and subtraction; <u>and</u> rounds numbers to the nearest 10,000 with understanding; and shows in-depth inferences and application.
Number & Operations in Fractions 3.NF.1-3	Practices dividing shapes into equal parts and using words like <i>halves, half of, thirds, a third of, fourths, quarters, a fourth of</i> ; <u>and</u> making equivalent fractions with visual support.	Locates and places fractions correctly on a number line with halves and fourths; and recognizes equivalent fractions with denominators 2, 3, 4, 6, and 8.	Locates and places fractions correctly on a number line within the whole; <u>and</u> recognizes and generates equivalent fractions, with denominators 2, 3, 4, 6 and 8.	Locates and places fractions correctly on a number line beyond the whole; <u>and</u> recognizes and generates equivalent fractions in written form without visual support, (denominators 2, 3, 4, 6 and 8); <u>and</u> shows in-depth inferences and application.
Operations & Algebraic Thinking 3.OA.3, 7-8	Practices identifying patterns among basic addition and subtraction facts; <u>and</u> using basic strategies to solve multiplication facts; <u>and</u> using addition, subtraction, and multiplication to solve one-step story problems within the range of fluency.	Uses basic strategies including some multiplicative strategies to solve multiplication facts; <u>and</u> uses addition, subtraction, and multiplication to solve story problems that require more than one step within the range of fluency.	Demonstrates fluency with multiplication facts; <u>and</u> uses addition, subtraction, multiplication, and division to write and solve story problems that require more than one step within 100; <u>and</u> writes or chooses equations to represent such problems.	Shows in-depth inferences and application to extend the range beyond basic multiplicative facts.

Grade 3 Math Proficiency Scale T3

	Novice “1”	Approaching “2”	Proficient “3”	Advanced “4”
Communication Math Practices 3 and 6	Participates in asking questions and sharing ideas, including the construction of arguments.	Asks questions and explains ideas, constructs viable arguments.	Asks questions and explains ideas clearly, constructs viable arguments and critiques the reasoning of others, explains the reasoning with clarity and use of some related academic vocabulary.	Asks questions and explains ideas clearly with details, constructs viable arguments, and critiques the reasoning of others using academic vocabulary related to the task, reasoning shows insight and deeper understanding.
Critical Thinking Math Practices 1, 2, 4, 5, 7, 8	Participates in creating questions, gathering information, and understanding connections; and looking for structure to make sense of problems.	Creates basic questions, gathers information, and understands connections; and begins to reason abstractly and quantitatively to look for structure and make sense of problems, attends to precision and perseveres in finding a solution.	Creates questions, gathers information, and understands connections; and reasons abstractly and quantitatively to find structure and make sense of problems, attends to precision and perseveres in finding a solution.	Creates questions, gathers information, and understands connections between parts of a system, and patterns including repeated reasoning; <u>and</u> reasons abstractly and quantitatively to find structure and make sense of problems; <u>and</u> attends to precision and perseveres in finding a solution and reflects upon the thinking process.
Geometry 3.G.1-2	Practices dividing circles and rectangles into equal parts up to four, and describing the parts using words like <i>halves, half of, thirds, a third of, fourths, quarters, a fourth of</i> ; <u>and</u> recognizing and drawing 2- and 3-D shapes, including triangles, quadrilaterals, pentagons, hexagons, and cubes; <u>and</u> practices sorting and classifying shapes with basic attributes.	Sorts and classifies shapes with some attributes; <u>and</u> divides basic shapes into parts with equal areas; identifies the area of each part as a fraction of the whole shape; <u>and</u> identifies and constructs basic quadrilaterals.	Divides shapes into parts with equal areas; identifies the area of each part as a fraction of the whole shape; <u>and</u> identifies and constructs different kinds of quadrilaterals	Divides shapes into parts with equal areas; identifies the area of each part as a fraction of the whole; <u>and</u> identifies and constructs different quadrilaterals; <u>and</u> is able to work from the unit fraction to the whole and whole to fraction showing in-depth inferences and application.

Measurement & Data 3.MD.1-8	Practices telling time, <u>and</u> reading line plots, scaled picture graphs, and bar graphs, solving basic problems using the information; <u>and</u> estimating and measuring liquid volume and mass in metric units; <u>and</u> finding area using counters.	Tells time to the minute, <u>and</u> constructs and reads line plots, scaled picture graphs, & bar graphs, solving basic problems using the information; estimates and measures liquid volume and mass in metric units; <u>and</u> uses multiplication to find area; <u>and</u> solves story problems.	Constructs and reads line plots, scaled picture graphs, and bar graphs, solving two step problems using the information; <u>and</u> solves perimeter and area problems including story problems. <small>(Students are working toward measuring lengths using rulers marked with halves and fourths of an inch)</small>	Shows in-depth inferences and application of perimeter and area and graphs.
Number & Operations in Base Ten 3.NBT.3	Practices counting by tens and relating it to multiplication; <u>and</u> rounding numbers to the nearest 10 or 100 with visual support; <u>and</u> adding/ subtracting 2-digit numbers.	Multiplies 1-digit numbers by multiples of 10 using a setting.	Multiplies 1-digit numbers by multiples of 10.	Shows in-depth inferences and application and uses understanding of multiplication and strategies to extend the range of numbers multiplied.
Number & Operations in Fractions 3.NF.1-3	Practices dividing shapes into equal parts and using words like <i>halves, half of, thirds, a third of, fourths, quarters, a fourth of;</i> <u>and</u> making equivalent fractions with visual support.	Locates and places fractions correctly on a number line with halves and fourths; and recognizes equivalent fractions <u>and</u> sometimes compares two fractions with the same numerator or the same denominator with denominators 2, 3, 4, 6, and 8.	Locates and places fractions correctly on a number line within the whole; <u>and</u> recognizes and generates equivalent fractions <u>and</u> compares two fractions with the same numerator or the same denominator, with denominators 2, 3, 4, 6 and 8.	Places fractions on a number line beyond the whole; <u>and</u> generates equivalent fractions in written form, <u>and</u> compares fractions with the same numerator or denominator without visual support, (denominators 2, 3, 4, 6 and 8); <u>and</u> shows in-depth inferences and application including solving complex problems that dissembled the fraction.
Operations & Algebraic Thinking 3.OA.3, 5, 7	Practices identifying patterns among basic addition and subtraction facts; <u>and</u> using basic strategies to solve multiplication facts; <u>and</u> using addition, subtraction, and multiplication to solve one-step story problems within the range of fluency.	Uses multiplicative strategies to solve multiplication facts; <u>and</u> uses addition, subtraction, and multiplication to solve multi-step story problems within the range of fluency; <u>and</u> identifies patterns in basic addition and subtraction facts and some multiplication facts.	Demonstrates fluency with multiplication facts; <u>and</u> uses properties of operations to solve multiplication problems; <u>and</u> writes and solves multi-step multiplication and division story problems within 100; <u>and</u> writes or chooses equations to represent problems.	Shows In-depth inferences and application with multiplication and division story problems.