Third Grade Mathematics Curriculum

ELO #1: Place Value - Students will compare and order, compose and decompose numbers up to 10,000 utilizing the base ten model.

ELO Standards

3.NBT.A.1	Round whole numbers to the nearest 10 or 100.
3.NBT.A.2	Read, write and identify whole numbers within 100,000 using base ten numerals, number names and expanded form.

Supporting Standards

Prior Knowledge	Understanding of 1,000 as groups of 10 hundreds.
Prior Knowledge	Count within 10,000 by 1s, 10s, 100s, and 1,000s.

Instructional and Assessment Resources

Math in Focus	Chapter 1
Math in Focus	Assessments

ELO #2: Addition & Subtraction - Students will add and subtract with and without regrouping up to 10,000.

ELO Standards

3.NBT.A.3	Demonstrate fluency with addition and subtraction within 1000.

Supporting Standards

Prior Knowledge	Fluency / mastery of basic addition and subtraction facts.
3.RA.D.10	Interpret the reasonableness of answers using mental computation and estimation strategies including rounding.

Instructional and Assessment Resources

Math in Focus	Chapters 3, 4
Math in Focus	Assessments

ELO #3: Multiplication & Division - Students will multiply & divide facts up to 10.

ELO Standards

3.NBT.A.4	Multiply whole numbers by multiples of 10 in the range 10-90.
3.RA.A.1	Interpret products of whole numbers.
3.RA.A.2	Interpret quotients of whole numbers.
3.RA.A.3	Describe in words or drawings a problem that illustrates a multiplication or division situation.
3.RA.A.4	Use multiplication and division within 100 to solve problems.
3.RA.A.5	Determine the unknown number in a multiplication or division equation relating three whole numbers.
3.RA.B.6	Apply properties of operations as strategies to multiply and divide.
3.RA.C.7	Multiply and divide with numbers and results within 100 using strategies such as the relationship between multiplication and division or properties of operations. Know all products of two one-digit numbers.
3.RA.C.8	Demonstrate fluency with products within 100.

Supporting Standards

3.RA.D.9	Write & solve two-step problems involving variables using any of the four operations.

Instructional and Assessment Resources

Math in Focus	Chapter 6
Math in Focus	Assessments

ELO #4: Problem Solving - Students will use the four operations to solve real world word problems.

ELO Standards

3.RA.D.9	Write and solve two-step problems involving variables using any of the four operations.
3.RA.E.11	Identify arithmetic patterns and explain the patterns using properties of operations.
3.GM.B.6	Solve problems involving addition and subtraction of minutes.
3.GM.B.8	Use the four operations to solve problems involving lengths, liquid volumes or weights given in the same units.
3.GM.D.15	Solve problems involving perimeters of polygons.
3.DS.A.2	Solve one- and two-step problems using information presented in bar and/or picture graphs.

Supporting Standards

3.RA.D.10	Interpret the reasonableness of answers using mental computation and estimation strategies including rounding.
3.GM.B.4	Tell and write time to the nearest minute.
3.GM.B.5	Estimate time intervals in minutes.
3.GM.B.7	Measure or estimate length, liquid volume and weight of objects.
3.DS.A.1	Create frequency tables, scaled picture graphs and bar graphs to represent a data set with several categories.
3.DS.A.3	Create a line plot to represent data.
3.DS.A.4	Use data shown in a line plot to answer questions.
3.RA.A.3	Describe in words or drawings a problem that illustrates a multiplication or division situation.

Instructional and Assessment Resources

Math in Focus	Chapters 5, 9, 12 and Sections 10.3, 16.7
Math in Focus	Assessments

ELO #5: Geometry - Students will identify polygons, compare and contrast the attributes of quadrilaterals, and find area and perimeter with and without unknown sides.

ELO Standards

3.GM.A.1	Understand that shapes in different categories may share attributes and that the shared attributes can define a larger category.
3.GM.A.2	Distinguish rhombuses and rectangles as examples of quadrilaterals, and draw examples of quadrilaterals that do not belong to these subcategories.
3.GM.A.3	Partition shapes into parts with equal areas, and express the area of each part as a unit fraction of the whole.
3.GM.C.9	Calculate area by using unit squares to cover a plane figure with no gaps or overlaps.
3.GM.C.10	Label area measurements with squared units.
3.GM.C.11	Demonstrate that tiling a rectangle to find the area and multiplying the side lengths result in the same value.
3.GM.C.12	Multiply whole-number side lengths to solve problems involving the area of rectangles.
3.GM.C.13	Find rectangular arrangements that can be formed for a given area.
3.GM.C.14	Decompose a rectangle into smaller rectangles to find the area of the original rectangle.
3.GM.D.16	Understand that rectangles can have equal perimeters but different areas, or rectangles can have equal areas but different perimeters.

Supporting Standards

2.GM.B.4	Measure the length of an object by selecting and using appropriate tools.
2.GM.B.5	Analyze the results of measuring the same object with different units.
2.GM.B.6	Estimate lengths using units of inches, feet, yards, centimeters and meters.
2.GM.B.7	Measure to determine how much longer one object is than another.
2.GM.C.8	Use addition and subtraction within 100 to solve problems involving lengths that are given in the same units.

Instructional and Assessment Resources

Math in Focus	Chapters 17, 18, 19
Math in Focus	Assessments

ELO #6: Fractions - Students will identify fractions as part of a whole and as a number line, find equivalent fractions, compare and order with same numerator or denominator by relating its size.

ELO Standards

3.NF.A.1	Understand a unit fraction as the quantity formed by one part when a whole is partitioned into equal parts.
3.NF.A.2a	Understand that when a whole is partitioned equally, a fraction can be used to represent a portion of the whole.
3.NF.A.2b	Understand that when a whole is partitioned equally, a fraction can be used to represent a portion of the whole.
3.NF.A.3a	Represent fractions on a number line.
3.NF.A.3b	Represent fractions on a number line.
3.NF.A.3c	Represent fractions on a number line.
3.NF.A.4	Demonstrate that two fractions are equivalent if they are the same size, or the same point on a number line.
3.NF.A.5	Recognize and generate equivalent fractions using visual models, and justify why the fractions are equivalent.
3.NF.A.6	Compare two fractions with the same numerator or denominator using the symbols >, = or <, and justify the solution.
3.NF.A.7	Explain why fraction comparisons are only valid when the two fractions refer to the same whole.

Supporting Standards

3.RA.D.10	Interpret the reasonableness of answers using mental computation and estimation strategies including rounding.
3.GM.A.3	Partition shapes into parts with equal areas, and express the area of each part as a unit fraction of the whole.
3.RA.A.4	Use multiplication and division within 100 to solve problems.
3.RA.A.5	Determine the unknown number in a multiplication or division equation relating three
3.RA.B.6	Apply properties of operations as strategies to multiply and divide.
3.RA.C.7	Multiply and divide with numbers and results within 100 using strategies such as the
3.RA.C.8	Demonstrate fluency with products within 100.

Instructional and Assessment Resources

Math in Focus	Chapter 14
Math in Focus	Assessments