Covington Elementary School/Math Curriculum Map

4TH GRADE

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: AUGUST	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 1: PLACE VALUE AND MONEY **12 days with 2 buffer days 2 test days**	**4.NS.1:** Read and write whole numbers up to 1,000,000. Use words, models, standard form and expanded form to represent and show equivalent forms of whole numbers up to 1,000,000 **4.NS.7:** Use place value understanding to round multi--digit whole numbers to any given place value. **4.NS.6**: Compare two decimals to hundredths by reasoning about their size based on the same whole. Record the results of comparisons with the symbols >, =, or <, and justify the conclusions (e.g., by using a visual model). **NS.5:** Write tenths and hundredths in decimal and fraction notations. Use words, models, standard form, and expanded form to represent decimal numbers to hundredths. Mentally calculate fraction and decimal equivalents for halves and fourths (e.g., 1/2 = 0.5 = 0.50, 7/4 = 1 3/4 = 1.75). **TOPIC 1 Lessons: The 12 lessons within Topic 1 will focus on:** Reviewing place value, identifying the periods, identify the value of a number, each place to the left is 10 x greater than the number to its right, expanded form, writing numbers in word form and words to standard form, comparing & ordering numbers, rounding numbers, using money to understand decimals, comparing & ordering decimals, rounding decimals, and counting money.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES**. **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: SEPTEMBER	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 2: ADDING AND SUBTRACTING WHOLE NUMBERS AND MONEY **12 days with 2 buffer days + 2 test days**	**4.NS.6:** Compare two decimals to hundredths by reasoning about their size based on the same whole. Record the results of comparisons with the symbols >, =, <, and justify the conclusions (e.g., by using a model). **4.CA.9**: Describe the relationship between two terms and use it to find a second number when a first number is given. Generate a number pattern that follows a given rule. **TOPIC 2 Lessons: The 11 lessons within Topic 2 will focus on:** Reviewing addition and subtraction of larger whole numbers and money, properties of addition, looking for and following a pattern, translating words to expressions, matching words to number expressions, and solving addition and subtraction equations.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: OCTOBER	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 3: MULTIPLICATION AND DIVISION CONCEPTS AND FACTS **16 days with 2 buffer days + 2 test days**	**4.CA.1:** Multiply a whole number of up to four digits by a one-digit whole number and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Describe the strategy and explain the reasoning. **4.CA.3:** Show how the order in which two numbers are multiplied (commutative property) and how numbers are grouped in multiplication (associative property) will not change the product. Use these properties to show that numbers can be multiplied in any order. Investigate and apply the distributive property. **4.CA.4:** Investigate the mathematical relationship between factors and multiples for whole numbers from 1-100, including the set of factors and multiples for given numbers. Identify sets of factors and multiples for any given whole number up to 100. **4.CA.5:** Solve real-world problems with whole numbers involving multiplicative comparison (e.g., by using drawings and equations with a symbol for the unknown number to represent the problem), distinguishing multiplicative comparison from additive comparison. (In grade 4, division problems should not include a remainder). **4.CA.9:** Describe the relationship between two terms and use it to find a second number when a first number is given. Generate a number pattern that follows a given rule. **TOPIC 3 Lessons: The 11 lessons within Topic 3 will focus on:** Reviewing fact families, patterns in multiplying 2, 5, 9, & 10, properties of multiplication, multiplying by 10, 11, & 12, finding factors and greatest common factor, finding multiples and least common multiples, beginning division, two-step story problems using multiplication and division, expressions with variables, finding rules and completing in/out boxes.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: NOVEMBER	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 4: Multiplying by One & Two Digit Numbers **11 days with 5 buffer days**	**4.CA.1:** Multiply a whole number of up to four digits by a one-digit whole number and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Describe the strategy and explain the reasoning. **4.CA.3**: Show how the order in which two numbers are multiplied (commutative property) and how numbers are grouped in multiplication (associative property) will not change the product. Use these properties to show that numbers can be multiplied in any order. Investigate and apply the distributive property. **4.M.3:** Use the four operations (addition, subtraction, multiplication, and division) to solve real-world problems involving distances, intervals of time, volumes, masses of objects, and money. Include addition and subtraction problems involving simple fractions and problems that require expressing measurements given in a larger unit in terms of a smaller unit. **TOPIC 4 Lessons: The 9 lessons within Topic 4 will focus on:** Multiplying multiples of 10, 100, and 1,000, multiplying 2 and 3-digit numbers times a 1-digit number, multiplying money, multiplying 3 factors, multiplying 2 and 3-digit numbers times 2-digit numbers, and multiplying larger money amounts.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: DECEMBER	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 5: Time, Data, and Graphs **12 days with 2 buffer days + 2 test days** **(83 days)**	**4.M.3:** Use the four operations (addition, subtraction, multiplication, and division) to solve real-world problems involving distances, intervals of time, volumes, masses of objects, and money. Include addition and subtraction problems involving simple fractions and problems that require expressing measurements given in a larger unit in terms of a smaller unit. **4.DA.1**: Formulate questions that can be addressed with data. Collect, organize, and graph data from observations, surveys, and experiments using line plots with whole number interval, single-and scaled bar graphs, and frequency tables. Solve real-world problems by analyzing and interpreting the data using grade-level computation and comparison strategies. **4.M.2**: Within given measurement systems, convert larger units to smaller units, including km, m, cm; kg, g; lb, oz; l, ml; hr, min, sec., and use these conversions to solve real-world problems. **TOPIC 5 Lessons: The 10 lessons within Topic 5 will focus on:** Telling time on an analog and digital clock, units of time and converting those units, elapsed time, calendars, pictographs, line plots, bar graphs, ordered pairs, line graphs, and mode, median, & range.		

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: JANUARY	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 6: Long Division **11 days with 2 buffer days + 2 test days** **TOPIC 7: Geometry and Measurement** **15 days with 2 buffer days + 2 test days**	**4.CA.2:** Find whole-number quotients and remainders with up to four-digit dividends and one-digit divisors, using strategies based on place value, the properties of operations, and/or the relationship between multiplication and division. Describe the strategy and explain the reasoning. **TOPIC 6 Lessons: The 9 lessons within Topic 6 will focus on:** Division using the division bar, division sign, and division box, learning long division by dividing 2 and 3-digit numbers with and without remainders, dividing with zero in the quotient, dividing money, divisibility rules for 2, 3, 5, 9, and 10, finding the mean, or average, and dividing multiples of 10. —---------Begin TOPIC 7—---------- **4.G.2:** Identify, describe, and draw rays, angles (right, acute, obtuse), and perpendicular and parallel lines using appropriate tools (e.g., ruler, straightedge and technology). Identify these in two-dimensional figures. **4.G.1**: Identify, describe, and draw parallelograms, rhombuses, and trapezoids using appropriate tools (e.g., ruler, straightedge and technology). **4.G.3**: Classify triangles and quadrilaterals based on the presence or absence of parallel or perpendicular lines, or the presence or absence of angles (right, acute, obtuse). **4.M.4:** Apply the area and perimeter formulas for rectangles to solve real-world and other mathematical problems. Investigate the area of complex shapes composed of rectangles by decomposing them into non-overlapping rectangles and adding the areas of the non-overlapping parts; apply this technique to solve real-world problems and other mathematical problems. **4.CA.1**: Multiply a whole number of up to four digits by a one-digit whole number and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Describe the strategy and explain the reasoning. **TOPIC 7 Lessons: The 10 lessons within Topic 7 will focus on:** Relating solid & plane figures, lines, rays, angles, point, line segments, right, acute, obtuse and straight angles, parallel, perpendicular, & intersecting lines, protractors, triangles, quadrilaterals, circles, lines of symmetry, perimeter & area of regular & irregular shapes, congruent figures and motion, and volume.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: FEBRUARY	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 8: Fraction Concepts **14 days with 2 buffer days + 2 test days**	**4.M.1**: Measure length to the nearest quarter-inch, eighth-inch, and millimeter. **4.M.3**: Use the four operations (addition, subtraction, multiplication and division) to solve real-world problems involving distances, intervals of time, volumes, masses of objects, and money. Include addition and subtraction problems involving simple fractions and problems that require expressing measurements given i n a larger unit in terms of a smaller unit. **4.DA.2**: Make a line plot to display a data set of measurements in fractions of a unit (1/2, 1/4, 1/8). Solve problems involving addition and subtraction of fractions by using data displayed in line plots. **4.CA.7**: Add and subtract mixed numbers with common denominators (e.g. by replacing each mixed number with an equivalent fraction and/or by using properties of operations and the relationship between addition and subtraction). **4.NS.2**: Model mixed numbers and improper fractions using visual fraction models such as number lines and area models. Use a visual fraction model to show the equivalency between whole numbers and whole numbers as fractions. **4.NS.3**: Use fraction models to represent two equivalent fractions with attention to how the number and size of the parts differ even though the fractions themselves are the same size. Use this principle to generate equivalent fractions. (In grade 4, limit denominators of fractions to 2, 3, 4, 5, 6, 8, 10, 25, 100) **4.CA.4**: Investigate the mathematical relationship between factors and multiples for whole numbers from 1-100, including the set of factors and multiples for given numbers. Identify sets of factors and multiples for any given whole number up to 100. **4.NS.4**: Compare two fractions with different numerators and different denominators (e.g., by creating common denominators or numerators, or by comparing to a benchmark, such as 0, 1/2, and 1). Recognize comparisons are valid only when the two fractions refer to the same whole. Record the results of comparisons with symbols >, =, or <, and justify the conclusions (e.g., by using a visual fraction model). **4.CA.5**: Solve real-world problems with whole numbers involving multiplicative comparison (e.g., by using drawings and equations with a symbol for the unknown number to represent the problem), distinguishing multiplicative comparison from additive comparison. (In grade 4, division problems should not include a remainder.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: MARCH	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 8: Fraction Concepts **14 days with 2 buffer days + 2 test days** **TOPIC 9: Fraction Operations and Customary Measurement** **10 days with 5 buffer days**	**4.CA.2**: Find whole-number quotients and remainders with up to four-digit dividends and one-digit divisors, using strategies based on place value, the properties of operations, and/or the relationship between multiplication and division. Describe the strategy and explain the reasoning. **TOPIC 8 Lessons: The 12 lessons within Topic 8 will focus on:** Fractions, length, & number lines, equivalent fractions, simplifying fractions, comparing fractions, decomposing fractions, mixed numbers & improper fractions, comparing mixed numbers, adding & subtracting fractions with like & unlike denominators, and adding mixed numbers with like denominators. **—------Begin Topic 9—-------** **4.CA.6:** Add and subtract fractions with common denominators using visual fraction models. Decompose non-unit fractions to represent them as iterations of unit fractions. **4.CA.8**: Solve real-world problems involving addition and subtraction of fractions referring to the same whole and having common denominators (e.g., by using visual fraction models and equations to represent the problem). **4.NS.4**: Compare two fractions with different numerators and different denominators (e.g., by creating common denominators or numerators, or by comparing to a benchmark, such as 0, ½, and 1). Explain why comparisons are valid only when the two fractions refer to the same whole. Record the results of comparisons with symbols >, =, or <, and justify the conclusions (e.g., by using a visual fraction model). **4.M.1:** Measure length to the nearest quarter-inch, eighth-inch, and millimeter. **4.M.2**: Know relative sizes of measurement units within one system of units, including km, m, cm; kg, g; lb, oz; l, ml; hr, min, sec. Express measurements in a larger unit in terms of a smaller unit within a single system of measurement. Record measurement equivalents in a two column table. **4.M.3:** Use the four operations (addition, subtraction, multiplication and division) to solve real-world problems involving distances, intervals of time, volumes, masses of objects, and money. Include addition and subtraction problems involving simple fractions and problems that require expressing measurements given in a larger unit in terms of a smaller unit. **TOPIC 9 Lessons: The 10 lessons within Topic 7 will focus on:** Relating solid & plane figures, lines, rays, angles, point, line segments, right, acute, obtuse and straight angles, parallel, perpendicular, & intersecting lines, protractors, triangles, quadrilaterals, circles, lines of symmetry, perimeter & area of regular & irregular shapes, congruent figures and motion, and volume.	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard**: *List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: APRIL	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 10: Decimals and Metric Measurement **10 days with 5 buffer days**	**4.NS.5**: Write tenths and hundredths in decimal and fraction notations. Use words, models, standard form, and expanded form to represent decimal numbers to hundredths. Mentally calculate fraction and decimal equivalents for halves and fourths (e.g., ½ = 0.5 = 0.50, 7/4 = 1 ¾ = 1.75) **4.NS.6:** Compare two decimals to hundredths by reasoning about their size based on the same whole. Record the results of comparisons with the symbols >, =, or <, and justify the conclusions (e.g., by using a visual model). **4.M.1:** Measure length to the nearest quarter-inch, eighth-inch, and millimeter. **4.M.3:** Use the four operations (addition, subtraction, multiplication and division) to solve real-world problems involving distances, intervals of time, volumes, masses of objects, and money. Include addition and subtraction problems involving simple fractions and problems that require expressing measurements given in a larger unit in terms of a smaller unit. **4.M.2**: Within given measurement systems, convert larger units to smaller units, including km, m, cm; kg, g; lb, oz; l, ml; hr, min, sec., and use these conversions to solve real-world problems. **GOAL - FINISH BEFORE 3RD WEEK OF APRIL!!**	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**

Time: *When and for how long will the content be taught*	**Standard***: List the exact standard as adopted or our locally adopted skill*	**Topic:** *Brief explanation of what you will be doing to teach this standard*	**Assessments:** *How and when students will be assessed*
MONTH: MAY	**STANDARDS**	**TEACHING METHODS**	**ASSESSMENTS**
TOPIC 11: Graphing and Probability **10 days with 5 buffer days**	**4.CA.5**: Solve real-world problems with whole numbers involving multiplicative comparison (e.g., by using drawings and equations with a symbol for the unknown number to represent the problem), distinguishing multiplicative comparison from additive comparison. (In grade 4, division problems should not include a remainder). **4.DA.1**: Formulate questions that can be addressed with data. Collect, organize, and graph data from observations, surveys, and experiments using line plots with whole number intervals, single-and scaled bar graphs, and frequency tables. Solve real-world problems by analyzing and interpreting the data using grade-level computation and comparison strategies. **4.DA.2:** Make a line plot to display a data set of measurements in fractions of a unit (1/2, 1/4, 1/8). Solve problems involving addition and subtraction of fractions by using data displayed in line plots. **4.CA.9**: Describe the relationship between two terms and use it to find a second number when a first number is given. Generate a number pattern that follows a given rule. **ENDANGERED ANIMAL PROJECTS - GOOGLE SLIDES**	**IXL** **MATH BOOK** **TEACHER CREATED WORKSHEETS** **MANIPULATIVES** **WORKBOOK PAGES** **GOOGLE CLASSROOM** **TEACHER PAY TEACHER RESOURCES** **MATH WORKSHEETS 4 KIDS**	**ENVISION DAILY REVIEW SHEETS** **EXIT TICKETS** **LESSON QUIZ** **GOOGLE CLASSROOM QUIZ** **TOPIC TEST** **Assessing throughout chapter and at the end of each chapter**