Fourth Grade Guaranteed and Viable Curriculum

August 22 – October 23, 2018

Reading and Writing

Key Ideas and Details – RL.4.1 (Literature)

Refer to details and examples when explaining what the text says explicitly and when drawing inferences from the text.

Key Ideas and Details – RI.4.1 (Informational)

Refer to details and examples in a text when explaining what the text says explicitly and when drawing inferences from the text.

Math

Operations and Algebraic Thinking – 4.QA.3

Use the four operations with whole numbers to solve problems.

3. Solve multistep word problems posed with whole numbers and having whole-number answers using the four operations, including problems in which remainders must be interpreted. Represent these problems using equations with a letter standing for the unknown quantity. Assess the reasonableness of answers using mental computation and estimation strategies including rounding.

October 24 – December 10, 2018

Reading and Writing

Key Ideas and Details – RL.4.2 (Literature)
Determine a theme of a story, drama, or poem from details in the text; summarize the text.
Key Ideas and Details – RI.4.2 (Informational)
Determine the main idea of a text and explain how it is supported by key details; summarize the text.
Text Types and Purposes – W.4.1
Write opinion pieces on topics or texts, supporting a point of view with reasons and information.
a. Introduce a topic or text clearly, state an opinion, and create an organizational structure in which related ideas are grouped to support the writer's purpose.
b. Provide reasons that are supported by facts and details.
c. Link opinion and reasons using words and phrases (e.g., for instance, in order to, in addition).
d. Use precise language and domain-specific vocabulary to support the opinion piece.
e. Provide a concluding statement or section related to the opinion presented.

Math

Numbers and Operations – Fractions – 4.NF.3 and 4.NF.4A
Build fractions from unit fractions by applying and extending previous understandings of operations on whole numbers.

3. Understand a fraction a/b with a > 1 as a sum of fractions 1/b.
a. Understand addition and subtraction of fractions as joining and separating parts referring to the same whole.
b. Decompose a fraction into a sum of fractions with the same denominator in more than one way, recording each decomposition by an equation. Justify decompositions, e.g., by using a visual fraction model. Examples: 3/8 = 1/8 + 1/8 + 1/8 ; 3/8 = 1/8 + 2/8 ; 2 1/8 = 1 + 1 + 1/8 = 8/8 + 8/8 + 1/8.
c. Add and subtract mixed numbers with like 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.
d. Solve word problems involving addition and subtraction of fractions referring to the same whole and having like denominators, e.g., by using visual fraction models and equations to represent the problem.

4. Apply and extend previous understandings of multiplication to multiply a fraction by a whole number.
a. Understand a fraction a/b as a multiple of 1/b. For example, use a visual fraction model to represent 5/4 as the product 5 × (1/4), recording the conclusion by the equation 5/4 = 5 × (1/4).

December 11 – February 20, 2018

Reading and Writing

Key Ideas and Details – RL.4.3 (Literature)
Describe in depth a character, setting, or event in a story or drama, drawing on specific details in the text (e.g., a character's thoughts, words, or actions).

Vocabulary Acquisition and Use – L.4.5
Demonstrate understanding of figurative language, word relationships, and nuances in word meanings. a. Explain the meaning of simple similes and metaphors (e.g., as pretty as a picture) in context. b. Recognize and explain the meaning of common idioms, adages, and proverbs. c. Demonstrate understanding of words by relating them to their opposites (antonyms) and to words with similar but not identical meanings (synonyms).

Text Types and Purposes – W.4.3
Write narratives to develop real or imagined experiences or events using effective technique, descriptive details, and clear event sequences.
a. Orient the reader by establishing a situation and introducing a narrator and/or characters; organize an event sequence that unfolds naturally.
b. Use dialogue and description to develop experiences and events or show the responses of characters to situations.
c. Use a variety of transitional words and phrases to manage the sequence of events.
d. Use concrete words and phrases and sensory details to convey experiences and events precisely.
e. Provide a conclusion that follows from the narrated experiences or events.

Math

Number and Operations—Fractions 4.NF.1 and 4.NF.2
Extend understanding of fraction equivalence and ordering.
1. Explain why a fraction a/b is equivalent to a fraction $(n \times a)/(n \times b)$ by using visual fraction models, with attention to how the number and size of the parts differ even though the two fractions themselves are the same size. Use this principle to recognize and generate equivalent fractions.

2. Compare two fractions with different numerators and different denominators, e.g., by creating common denominators or numerators, or by comparing to a benchmark fraction such as 1/2. Recognize that 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.

Numbers and Operations – Fractions – 4.NF.5, 4.NF.6 and 4.NF.7
Understand decimal notation for fractions and compare decimal fractions.
5. Express a fraction with denominator 10 as an equivalent fraction with denominator 100 and use this technique to add two fractions with respective denominators 10 and 100.4 For example, express 3/10 as 30/100, and add 3/10 + 4/100 = 34/100.

6. Use decimal notation for fractions with denominators 10 or 100. For example, rewrite 0.62 as 62/100; describe a length as 0.62 meters; locate 0.62 on a number line diagram.

7. Compare two decimals to hundredths by reasoning about their size. Recognize that comparisons are valid only when the two decimals refer to the same whole. Record the results of comparisons with the symbols >, =, or <, and justify the conclusions, e.g., by using a visual model.

February 21 – April 22, 2018

Reading and Writing

Craft and Structure – RL.4.6 (Literature)
Compare and contrast the point of view from which different stories are narrated, including the difference between first- and third-person narrations.

Craft and Structure – RI.4.6 (Informational)
Compare and contrast a firsthand and secondhand account of the same event or topic; describe the differences in focus and the information provided.

Math

Measurement and Data – 4.MD.1, 4.MD.2, 4.MD.3, 4.MD.4, 4.MD.5
Solve problems involving measurement and conversion of measurements from a larger unit to a smaller unit.
1. Know relative sizes of measurement units within one system of units including km, m, cm; kg, g; lb., oz.; l, ml; hr., min, sec. Within a single system of measurement, express measurements in a larger unit in terms of a smaller unit. Record measurement equivalents in a two- column table. For example, know that 1 ft is 12 times as long as 1 in. Express the length of a 4 ft snake as 48 in. Generate a conversion table for feet and inches listing the number pairs (1, 12), (2, 24), (3, 36), ...

2. Use the four operations to solve word problems involving distances, intervals of time, liquid volumes, masses of objects, and money, including problems involving simple fractions or decimals, and problems that require expressing measurements given in a larger unit in terms of a smaller unit. Represent measurement quantities using diagrams such as number line diagrams that feature a measurement scale.

3. Apply the area and perimeter formulas for rectangles in real world and mathematical problems. For example, find the width of a rectangular room given the area of the flooring and the length, by viewing the area formula as a multiplication equation with an unknown factor.

Represent and interpret data.
4. 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 information presented in line plots. For example, from a line plot find and interpret the difference in length between the longest and shortest specimens in an insect collection.

Geometric measurement: understand concepts of angle and measure angles.
5. Recognize angles as geometric shapes that are formed wherever two rays share a common endpoint, and understand concepts of angle measurement:
a. An angle is measured with reference to a circle with its center at the common endpoint of the rays, by considering the fraction of the circular arc between the points where the two rays intersect the circle. An angle that turns through 1/360 of a circle is called a “one-degree angle,” and can be used to measure angles.
b. An angle that turns through one-degree angles is said to have an angle measure of n degrees.

April 23 – May 17, 2018

Reading and Writing

Integration of Knowledge and Ideas – RL.4.9 (Literature)
Compare and contrast the treatment of similar themes and topics (e.g., opposition of good and evil) and patterns of events (e.g., the quest) in stories, myths, and traditional literature from different cultures.

Integration of Knowledge and Ideas – RL.4.9 (Informational)
Integrate information from two texts on the same topic in order to write or speak about the subject knowledgeably

Text Types and Purposes – W.4.2
Write informative/explanatory texts to examine a topic and convey ideas and information clearly.
a. Introduce a topic clearly and group related information in paragraphs and sections; include formatting (e.g., headings), illustrations, and multimedia when useful to aiding comprehension.
b. Develop the topic with facts, definitions, concrete details, quotations, or other information and examples related to the topic.
c. Link ideas within categories of information using words and phrases (e.g., another, for example, also, because).
d. Use precise language and domain-specific vocabulary to inform about or explain the topic.
e. Provide a concluding statement or section related to the information or explanation presented.

Math

Geometry – 4.G.1 and 4.G.2
Draw and identify lines and angles, and classify shapes by properties of their lines and angles.
1. Draw points, lines, line segments, rays, angles (right, acute, obtuse), and perpendicular and parallel lines. Identify these in two-dimensional figures.

2. Classify two-dimensional figures based on the presence or absence of parallel or perpendicular lines, or the presence or absence of angles of a specified size. Recognize right triangles as a category and identify right triangles.

3. Recognize a line of symmetry for a two-dimensional figure as a line across the figure such that the figure can be folded along the line into matching parts. Identify line-symmetric figures and draw lines of symmetry.