

# CURRICULUM *Correlation*

*Waterford Reading  
Academy:  
Math & Science*

**100%**

*Utah Core State  
Standards for  
Mathematics  
2016 & Science  
with Engineering  
Education  
(SEEd) 2023*

*\*Correlation content includes both Waterford Digital Resources and Waterford Teacher Resources.*

# TABLE OF CONTENTS

<b>MATHEMATICS</b> .....	<b>1</b>
<b>KINDERGARTEN</b> .....	<b>1</b>
Counting and Cardinality (K.CC).....	1
Operations and Algebraic Thinking (K.OA).....	3
Number and Operations in Base Ten (K.NBT).....	5
Measurement and Data (K.MD).....	5
Geometry (K.G).....	7
<b>GRADE 1</b> .....	<b>8</b>
Operations and Algebraic Thinking (1.OA).....	8
Number and Operations in Base Ten (1.NBT).....	11
Measurement and Data (1.MD).....	13
Geometry (1.G).....	15
<b>GRADE 2</b> .....	<b>17</b>
Operations and Algebraic Thinking (2.OA).....	17
Number and Operations in Base Ten (2.NBT).....	18
Measurement and Data (2.MD).....	21
Geometry (2.G).....	24

<b>SCIENCE</b> .....	<b>25</b>
<b>KINDERGARTEN</b> .....	<b>25</b>
K.1: Weather Patterns.....	25
K.2: Living Things and Their Surroundings.....	26
K.3: Forces, Motion, and Interactions.....	28
<b>GRADE 1</b> .....	<b>29</b>
1.1: Seasons and Space Patterns.....	29
1.2: The Needs of Living Things and Their Offspring.....	30
1.3: Light and Sound.....	31
<b>GRADE 2</b> .....	<b>32</b>
2.1: Changes In The Earth's Surface.....	32
2.2: Living Things and Their Habitats.....	33
2.3: Properties of Matter.....	34
<b>WATERFORD BOOKS AND RELATED ACTIVITIES</b> .....	<b>36</b>
<b>WATERFORD FAMILY ENGAGEMENT RESOURCES</b> .....	<b>37</b>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>MATHEMATICS</b>		
<b>KINDERGARTEN</b>		
<b>Counting and Cardinality (K.CC)</b>		
<b>Know number names and the counting sequence.</b>		
<p>K.CC.1 Count to 100 by ones and by tens.</p>	<ul style="list-style-type: none"> <li>• Counting Songs (See titles at end of document.)</li> <li>• Finger Counting</li> <li>• Object Counting</li> <li>• Count with 5-Frames</li> <li>• Number _ Counting (e.g., Number 2 Counting)</li> <li>• Skip Counting</li> </ul>	<ul style="list-style-type: none"> <li>• Count to 100 by ones and tens.pdf: Count to 100 by ones and tens.                             <ul style="list-style-type: none"> <li>- Missing Numbers</li> <li>- Count On By 1</li> <li>- Numbers 1-5</li> <li>- Numbers 6-10</li> <li>- Math Newsletters</li> <li>- Count By 10s</li> <li>- Numbers 60-69</li> <li>- I Can Count to 100</li> </ul> </li> </ul>
<p>K.CC.2 Count forward beginning from a given number within the known sequence (instead of having to begin at 1).</p>	<ul style="list-style-type: none"> <li>• Counting Songs (See titles at end of document.)</li> <li>• Count On</li> <li>• Counting Puzzle</li> <li>• Dot-to-Dot</li> </ul>	<ul style="list-style-type: none"> <li>• Counting forward.pdf: Count forward beginning with a given number within the known sequence.                             <ul style="list-style-type: none"> <li>- Let's Count On</li> <li>- Toss and Count</li> <li>- Count On by 1</li> <li>- Math Newsletter: Count On</li> <li>- Flashcards</li> </ul> </li> </ul>
<p>K.CC.3 Read and write numbers using base ten numerals from 0 to 20. Represent a number of objects with a written numeral, in or out of sequence (0 represents a count of no objects).</p>	<ul style="list-style-type: none"> <li>• Number _ Counting (e.g., Number 2 Counting)</li> <li>• Number Tracing</li> <li>• Finger Counting</li> <li>• Object Counting</li> <li>• Count with 5-Frames</li> <li>• Make and Count Groups</li> </ul>	<ul style="list-style-type: none"> <li>• Writing from 0 to 20.pdf: Write numbers from 0 to 20. Represent a number of objects with a written numeral.                             <ul style="list-style-type: none"> <li>- Numbers Practice: 1-20</li> <li>- Numbers 1-5</li> <li>- Add groups</li> <li>- Count on by 1</li> <li>- Number Writing Practice: 0-20</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Count to tell the number of objects.</b>		
<p>K.CC.4 Understand the relationship between numbers and quantities; connect counting to cardinality.</p>	<ul style="list-style-type: none"> <li>• Counting Songs (See titles at end of document.)</li> <li>• Make and Count Groups</li> <li>• Number _ Counting (e.g., Number 2 Counting)</li> <li>• Finger Counting</li> <li>• Object Counting</li> <li>• Count with 5-Frames</li> <li>• One-to-one Correspondence</li> </ul>	<ul style="list-style-type: none"> <li>• Object Counting Basics.pdf: When counting objects, say the number names in the standard order, pairing each object with one and only one number name and each number name with one and only one object.                             <ul style="list-style-type: none"> <li>- Number Walk</li> </ul> </li> </ul>
<p>K.CC.4a When counting objects, say the numbers in the standard order. Pair each quantity of objects with one and only one number, and each number with the correct quantity of objects.</p>	<ul style="list-style-type: none"> <li>• Counting Songs (See titles at end of document.)</li> <li>• Number _ Counting (e.g., Number 2 Counting)</li> <li>• Finger Counting</li> <li>• Object Counting</li> <li>• Count with 5-Frames</li> <li>• Numbers Review</li> <li>• One-to-one Correspondence</li> </ul>	<ul style="list-style-type: none"> <li>• Object Counting Basics.pdf: When counting objects, say the number names in the standard order, pairing each object with one and only one number name and each number name with one and only one object.                             <ul style="list-style-type: none"> <li>- Number Walk</li> </ul> </li> </ul>
<p>K.CC.4b Understand that the last number said represents the number of objects counted. The number of objects is the same regardless of their arrangement or the order in which they were counted.</p>	<ul style="list-style-type: none"> <li>• Make and Count Groups</li> <li>• One-to-one Correspondence</li> <li>• Number _ Counting (e.g., Number 2 Counting)</li> <li>• Object Counting</li> <li>• Count with 5-Frames</li> </ul>	<ul style="list-style-type: none"> <li>• Object Counting Grouping.pdf: Understand that the last number name said tells the number of objects counted. The number of objects is the same regardless of their arrangement or the order in which they were counted.                             <ul style="list-style-type: none"> <li>- Mixed Up Counting</li> </ul> </li> </ul>
<p>K.CC.4c Understand that each successive number refers to a quantity that is one greater than the previous number.</p>	<ul style="list-style-type: none"> <li>• Make and Count Groups</li> <li>• One-to-one Correspondence</li> <li>• Number _ Counting (e.g., Number 2 Counting)</li> </ul>	<ul style="list-style-type: none"> <li>• Object Counting Succession.pdf: Understand that each successive number name refers to a quantity that is one larger.                             <ul style="list-style-type: none"> <li>- One by One</li> </ul> </li> </ul>
<p>K.CC.5 Use counting to answer questions about “how many.” For example, 20 or fewer objects arranged in a line, a rectangular array, or circle; 10 or fewer objects in a scattered configuration. Using a number from 1-20, count out that many objects.</p>	<ul style="list-style-type: none"> <li>• Make and Count Groups</li> <li>• Number _ Counting (e.g., Number 2 Counting)</li> <li>• Finger Counting</li> <li>• Object Counting</li> <li>• Count with 5-Frames</li> <li>• One-to-one Correspondence</li> </ul>	<ul style="list-style-type: none"> <li>• How many?.pdf: Count to answer “how many?” questions about as many as 20 things arranged in a line, a rectangular array, or a circle, or as many as 10 things in a scattered configuration; given a number from 1-20, count out that many objects.                             <ul style="list-style-type: none"> <li>- Hoop Addition</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Identify and compare quantities of objects and numerals.</b>		
<p>K.CC.6 Use matching or counting strategies to identify whether the number of objects in one group is greater than, less than, or equal to the number of objects in another group. Include groups with up to ten objects.</p>	<ul style="list-style-type: none"> <li>• Song: Greater Than, Less Than</li> <li>• Book: For the Birds</li> <li>• Greater Than, Less Than</li> <li>• More Than, Fewer Than</li> <li>• More Than</li> <li>• Fewer Than</li> </ul>	<ul style="list-style-type: none"> <li>• Greater, less, or equal.pdf: Identify whether the number of objects in one group is greater than, less than, or equal to the number of objects in another group.                             <ul style="list-style-type: none"> <li>- Beans and More</li> <li>- More Than Buttons</li> <li>- Short Names, Long Names</li> <li>- Noodle Necklaces</li> <li>- Groups Do Count!</li> <li>- More Than, Fewer Than, Equal</li> <li>- Which Has More? 1 &amp; 2</li> <li>- Fewer Than</li> <li>- More or Fewer</li> <li>- Greater or Less</li> <li>- More Than/Fewer Than Flashcard Sets</li> </ul> </li> </ul>
<p>K.CC.7 Compare two numbers between 1 and 10 presented as written numerals using “greater than,” “less than,” or “equal to.”</p>	<ul style="list-style-type: none"> <li>• Song: Greater Than, Less Than</li> <li>• Book: For the Birds</li> <li>• Greater Than, Less Than</li> <li>• More Than, Fewer Than</li> <li>• More Than</li> <li>• Fewer Than</li> </ul>	<ul style="list-style-type: none"> <li>• Comparing numbers.pdf: Compare two numbers between 1 and 10 presented as written numerals.                             <ul style="list-style-type: none"> <li>- More or Less Spinner</li> <li>- Catch Me If You Can!</li> <li>- Greater or Less</li> <li>- Less or Greater</li> <li>- Spinner</li> <li>- Board game</li> <li>- Number cards</li> </ul> </li> </ul>
<b>Operations and Algebraic Thinking (K.OA)</b>		
<b>Understand addition as putting together and adding to, and understand subtraction as taking apart and taking from.</b>		
<p>K.OA.1 Represent addition and subtraction with objects, fingers, mental images, simple drawings, or sounds. For example, use clapping, act out situations, and use verbal explanations, expressions, or equations.</p>	<ul style="list-style-type: none"> <li>• Songs: On the Bayou; Bakery Subtraction; Circus Subtraction; Subtract Those Cars</li> <li>• Book: Five Delicious Muffins</li> <li>• Add Groups</li> <li>• Subtract Groups</li> <li>• Act Out Addition</li> <li>• Act Out Subtraction</li> </ul>	<ul style="list-style-type: none"> <li>• Represent addition and subtraction with objects. pdf: Represent addition and subtraction with objects, fingers, mental images, drawings, sounds, acting out situations, verbal explanations, expressions, or equations.                             <ul style="list-style-type: none"> <li>- Addition Cubes</li> <li>- Addition Stories</li> <li>- Going Fishing</li> <li>- Let’s Count On</li> <li>- Act it out Stories</li> <li>- Manipulative Stories</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
Understand addition as putting together and adding to, and understand subtraction as taking apart and taking from <i>continued</i> .		
<p>K.OA.2 Solve addition and subtraction word problems within 10. Use objects or drawings to represent the problem.</p>	<ul style="list-style-type: none"> <li>• Songs: On the Bayou; Bakery Subtraction; Circus Subtraction; Subtract Those Cars</li> <li>• Book: Five Delicious Muffins</li> <li>• Add Groups</li> <li>• Subtract Groups</li> <li>• Act Out Addition</li> <li>• Act Out Subtraction</li> </ul>	<ul style="list-style-type: none"> <li>• Addition and subtraction word problems.pdf: Solve addition and subtraction word problems, and add and subtract within 10, e.g., by using objects or drawings to represent the problem.                             <ul style="list-style-type: none"> <li>- Addition Stories</li> <li>- Act It Out Stories</li> <li>- Manipulative Stories</li> <li>- Edible Stories</li> <li>- One, Two, Three, Show</li> <li>- Circus Subtraction</li> <li>- Partner Subtraction</li> <li>- Farmer’s Market</li> <li>- Green and Speckled Frogs</li> <li>- Cars and Trucks Subtraction</li> <li>- Yummy Subtraction</li> <li>- Act Out Addition</li> <li>- Act Out Subtraction</li> <li>- Addition Newsletter</li> <li>- Subtraction Newsletter</li> <li>- Subtraction Flashcards</li> </ul> </li> </ul>
<p>K.OA.3 Decompose numbers less than or equal to 10 into pairs in more than one way by using objects or drawings. Record each decomposition by a drawing or equation. For example, <math>5 = 2 + 3</math> and <math>5 = 4 + 1</math>.</p>	<ul style="list-style-type: none"> <li>• Make and Count Groups</li> <li>• Add Groups</li> <li>• Subtract Groups</li> <li>• Act Out Subtraction</li> </ul>	<ul style="list-style-type: none"> <li>• Decompose numbers.pdf: Decompose numbers less than or equal to 10 into pairs in more than one way, e.g., by using objects or drawings, and record each decomposition by a drawing or equation.                             <ul style="list-style-type: none"> <li>- Addition Cubes</li> <li>- Fact Families</li> </ul> </li> </ul>
<p>K.OA.4 Make sums of 10 using any number from 1 to 9. For example, <math>2 + 8 = 10</math>. Use objects or drawings to represent and record the answer.</p>	<ul style="list-style-type: none"> <li>• Make 10</li> <li>• Missing Addends</li> <li>• Count On</li> <li>• Act Out Addition</li> </ul>	<ul style="list-style-type: none"> <li>• Numbers that make 10.pdf: For any number from 1 to 9, find the number that makes 10 when added to the given number, e.g., by using objects or drawings, and record the answer with a drawing or equation.                             <ul style="list-style-type: none"> <li>- How Many More?</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
Understand addition as putting together and adding to, and understand subtraction as taking apart and taking from <i>continued</i> .		
<p>K.OA.5 Fluently add and subtract using numbers within 5.</p>	<ul style="list-style-type: none"> <li>• Songs: On the Bayou; Bakery Subtraction; Subtract Those Cars; Circus Subtraction</li> <li>• Book: Five Delicious Muffins</li> <li>• Add Groups</li> <li>• Subtract Groups</li> <li>• Minuends</li> <li>• Sums</li> <li>• Act Out Addition</li> <li>• Act Out Subtraction</li> </ul>	
<b>Number and Operations in Base Ten (K.NBT)</b>		
Compose and decompose numbers 11-19 to gain foundations for place value.		
<p>K.NBT.1 Compose and decompose numbers from 11-19 into ten ones and some further ones. Use objects or drawings and record each composition or decomposition by a drawing or equation. For example, <math>18 = 10 + 8</math>. Understand that these numbers are composed of ten ones and one, two, three, four, five, six, seven, eight, or nine ones.</p>	<ul style="list-style-type: none"> <li>• Place Value</li> </ul>	<ul style="list-style-type: none"> <li>• Tens and ones.pdf: Compose and decompose numbers from 11 to 19 into ten ones and some further ones, e.g., by using objects or drawings, and record each composition or decomposition by a drawing or equation; understand that these numbers are composed of ten ones and one, two, three, four, five, six, seven, eight, or nine ones.                             <ul style="list-style-type: none"> <li>- Place Value 11-19</li> </ul> </li> </ul>
<b>Measurement and Data (K.MD)</b>		
Describe and compare measurable attributes of objects.		
<p>K.MD.1 Describe measurable attributes of objects, such as length or weight. Describe several measurable attributes of a single object.</p>	<ul style="list-style-type: none"> <li>• Song: Measuring Plants</li> <li>• Length</li> </ul>	<ul style="list-style-type: none"> <li>• Measurable attributes.pdf: Describe measurable attributes of objects, such as length or weight. Describe several measurable attributes of a single object.                             <ul style="list-style-type: none"> <li>- Filling Table</li> <li>- Order It Up</li> <li>- Straw Rulers</li> <li>- Measuring Walk</li> <li>- Heavy or Light</li> <li>- Make A Balance</li> <li>- Measurable Attributes</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Describe and compare measurable attributes of objects <i>continued</i>.</b>		
<p>K.MD.2 Directly compare two objects with a measurable attribute in common, to see which object has “more of”/”less of” the attribute, and describe the difference. For example, directly compare the length of two pencils and describe one as shorter or longer.</p>	<ul style="list-style-type: none"> <li>• Songs: Savanna Size; Measuring Plants</li> <li>• Capacity</li> <li>• Length</li> <li>• Big and Little</li> <li>• Tall and Short</li> <li>• Heavy and Light</li> <li>• Size</li> </ul>	<ul style="list-style-type: none"> <li>• Comparing objects.pdf: Describe measurable attributes of objects, such as length or weight. Describe several measurable attributes of a single object.                             <ul style="list-style-type: none"> <li>- Filling Table</li> <li>- Order It Up</li> <li>- Straw Rulers</li> <li>- Measuring Walk</li> <li>- Heavy or Light</li> <li>- Make A Balance</li> <li>- Size Scavenger Hunt</li> <li>- Big and Little Sort</li> <li>- Boxes in a Line</li> <li>- Teddy Bear Line-Up</li> <li>- Magazine Sorting</li> <li>- Tall and Short</li> <li>- Big and Little</li> <li>- Tall and Short</li> <li>- Heavy and Light</li> <li>- Small, Medium, Large</li> <li>- Measuring Length</li> <li>- Measurable Attributes</li> </ul> </li> </ul>
<b>Classify objects and count the number of objects in each category.</b>		
<p>K.MD.3 Classify objects into given categories; count the numbers of objects in each category and sort the categories by count. Limit the category counts to less than or equal to 10.</p>	<ul style="list-style-type: none"> <li>• Songs: Same and Different; All Sorts of Laundry</li> <li>• Book: Buttons, Buttons</li> <li>• Sort</li> <li>• Make and Count Groups</li> </ul>	<ul style="list-style-type: none"> <li>• Classifying objects.pdf: Classify objects into given categories; count the numbers of objects in each category and sort the categories by count.                             <ul style="list-style-type: none"> <li>- Let’s Sort</li> <li>- Sort</li> </ul> </li> </ul>



UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Geometry (K.G)</b>		
Identify and describe shapes, including squares, circles, triangles, rectangles hexagons, cubes, cones, cylinders, and spheres.		
<p>K.G.1 Describe objects in the environment using names of shapes, and describe the relative positions of these objects using terms such as above, below, beside, in front of, behind, and next to.</p>	<ul style="list-style-type: none"> <li>Songs: Position Cat; Kites; Get Over the Bugs; Shapes, Shapes, Shapes</li> <li>Books: The Shape of Things; Imagination Shapes; Up in the Air</li> <li>Over, Under, Above, Below</li> <li>Inside, Outside, Between</li> <li>Circle, Square, Triangle, Rectangle</li> <li>Star, Semicircle, Octagon, Oval, Rhombus</li> <li>Solid Shapes</li> <li>World Shapes</li> <li>Above, Below, Next to, On</li> </ul>	<ul style="list-style-type: none"> <li>Describing objects.pdf: Describe objects in the environment using names of shapes, and describe the relative positions of these objects using terms such as above, below, beside, in front of, behind, and next to.                             <ul style="list-style-type: none"> <li>Shapes Scavenger Hunt</li> </ul> </li> </ul>
<p>K.G.2 Correctly name shapes regardless of their orientations or overall sizes.</p>	<ul style="list-style-type: none"> <li>Songs: Kites; Shapes, Shapes, Shapes; Corners and Sides</li> <li>Books: The Shape of Things; Imagination Shapes</li> <li>Circle, Square, Triangle, Rectangle</li> <li>Star, Semicircle, Octagon, Oval, Rhombus</li> <li>Simple Shapes</li> <li>Solid Shapes</li> <li>World Shapes</li> </ul>	<ul style="list-style-type: none"> <li>Shape recognition.pdf: Correctly name shapes regardless of their orientations or overall size.                             <ul style="list-style-type: none"> <li>Shapes Scavenger Hunt</li> <li>Shapes and Positioning</li> <li>Shapes Flashcard</li> </ul> </li> </ul>
<p>K.G.3 Identify shapes as two-dimensional (“flat”) or three-dimensional (“solid”).</p>	<ul style="list-style-type: none"> <li>Simple Shapes</li> <li>Solid Shapes</li> <li>Space Shapes</li> </ul>	<ul style="list-style-type: none"> <li>Two-dimensional shapes.pdf: Identify shapes as two-dimensional (lying in a plane, “flat”) or three-dimensional (“solid”).                             <ul style="list-style-type: none"> <li>Shapes and Positioning</li> </ul> </li> </ul>
Analyze, compare, create, and compose shapes.		
<p>K.G.4 Analyze, compare, and sort two- and three-dimensional shapes and objects, in different sizes and orientations, using informal language to describe their similarities, differences, and other attributes (for example, color, size, shape, number of sides).</p>	<ul style="list-style-type: none"> <li>Song: Corners and Sides</li> <li>Simple Shapes</li> <li>Space Shapes</li> <li>Similar Figures</li> </ul>	<ul style="list-style-type: none"> <li>Compare shapes.pdf: Analyze and compare two- and three-dimensional shapes, in different sizes and orientations, using informal language to describe their similarities, differences, parts (e.g., number of sides and vertices/“corners”) and other attributes (e.g., having sides of equal length).                             <ul style="list-style-type: none"> <li>Comparing Shapes</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<i>Analyze, compare, create, and compose shapes continued.</i>		
K.G.5 Model and create shapes from components such as sticks and clay balls.	<ul style="list-style-type: none"> <li>• Geoboard</li> <li>• Tangrams</li> </ul>	<ul style="list-style-type: none"> <li>• Model shapes.pdf: Model shapes in the world by building shapes from components (e.g., sticks and clay balls) and drawing shapes.                             <ul style="list-style-type: none"> <li>- Building Shapes</li> </ul> </li> </ul>
K.G.6 Compose simple shapes to form larger shapes. For example, “Can you join these two triangles with full sides touching to make a rectangle?”	<ul style="list-style-type: none"> <li>• Geoboard</li> <li>• Tangrams</li> </ul>	<ul style="list-style-type: none"> <li>• Form larger shapes.pdf: Compose simple shapes to form larger shapes.                             <ul style="list-style-type: none"> <li>- Combining Shapes</li> </ul> </li> </ul>
<b>GRADE 1</b>		
<b>Operations and Algebraic Thinking (1.OA)</b>		
<b>Represent and solve problems involving addition and subtraction within 20</b>		
1.OA.1 Use addition and subtraction within 20 to solve word problems involving situations of adding to, taking from, putting together, taking apart, and comparing, with unknowns in all positions. For example, use objects, drawings, and equations with a symbol for the unknown number to represent the problem.	<ul style="list-style-type: none"> <li>• Songs: Fact Families; Doubles</li> <li>• Book: Facts About Families</li> <li>• Addition and Subtraction Fact Families</li> <li>• Addition and Subtraction Relationship</li> </ul>	<ul style="list-style-type: none"> <li>• Word problems using subtraction within 20.pdf: Use addition and subtraction within 20 to solve word problems involving situations of adding to, taking from, putting together, taking apart, and comparing, with unknowns in all positions.                             <ul style="list-style-type: none"> <li>- Guess and Check</li> <li>- Model the Story</li> </ul> </li> </ul>
1.OA.2 Solve word problems that call for addition of three whole numbers whose sum is less than or equal to 20. For example, use objects, drawings, and equations with a symbol for the unknown number to represent the problem.	<ul style="list-style-type: none"> <li>• Add 3 One-digit Numbers</li> </ul>	<ul style="list-style-type: none"> <li>• Word problems adding 3 numbers.pdf: Solve word problems that call for addition of three whole numbers whose sum is less than or equal to 20.                             <ul style="list-style-type: none"> <li>- Draw a Picture</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Understand and apply properties of operations and the relationship between addition and subtraction.</b>		
<p>Apply properties of operations as strategies to add and subtract. For example: If <math>8 + 3 = 11</math> is known, then <math>3 + 8 = 11</math> is also known. (Commutative property of addition.) To add <math>2 + 6 + 4</math>, the second two numbers can be added to make a ten, so <math>2 + 6 + 4 = 2 + 10 = 12</math>. (Associative property of addition.) First grade students need not use formal terms for these properties.</p>	<ul style="list-style-type: none"> <li>Addition and Subtraction Relationship</li> <li>Addition and Subtraction Fact Families</li> <li>Subtraction Patterns</li> <li>Commutative Property of Addition</li> </ul>	<ul style="list-style-type: none"> <li>Strategies to add and subtract.pdf: Apply properties of operations as strategies to add and subtract.                             <ul style="list-style-type: none"> <li>- Adding and Subtracting Bugs</li> <li>- Concentration</li> <li>- Related Facts</li> </ul> </li> </ul>
<p>1.OA.4 Understand subtraction as an unknown-addend problem. For example, subtract <math>10 - 8</math> by finding the number that makes 10 when added to 8.</p>	<ul style="list-style-type: none"> <li>Missing Addends</li> <li>Subtraction Patterns</li> <li>Addition and Subtraction Fact Families</li> </ul>	<ul style="list-style-type: none"> <li>Understand subtraction as an unknown addend problem.pdf: Understand subtraction as an unknown-addend problem. Add and subtract within 20. Write each subtraction problem as an addition problem and solve it.</li> </ul>
<b>Represent and solve problems involving addition and subtraction within 20</b>		
<p>1.OA.5 Relate counting to addition and subtraction. For example, by counting on 2 to add 2.</p>	<ul style="list-style-type: none"> <li>Song: Counting On</li> <li>Books: Circus 20, Painting by Number</li> <li>Skip Count by 2</li> <li>Count On</li> </ul>	<ul style="list-style-type: none"> <li>Relate counting to addition and subtraction.pdf: Relate counting to addition and subtraction.                             <ul style="list-style-type: none"> <li>- Skip Counting Chant</li> <li>- Jump Rope Counting</li> <li>- Related Facts</li> <li>- Count by 2s; 5s; 10s</li> </ul> </li> </ul>
<p>1.OA.6 Add and subtract within 20.</p>	<ul style="list-style-type: none"> <li>Songs: Fact Families; Counting On</li> <li>Books: Facts about Families; Circus 20; Painting by Number</li> <li>Addition and Subtraction Fact Families</li> <li>Addition Sentences</li> <li>Subtraction Sentences</li> <li>Commutative Property of Addition</li> <li>Addition and Subtraction Relationship</li> <li>Missing Addends</li> <li>Missing Minuends and Subtrahends</li> <li>Subtraction Patterns</li> </ul>	<ul style="list-style-type: none"> <li>Add and subtract within 20.pdf: Add and subtract within 20, demonstrating fluency for addition and subtraction within 10.                             <ul style="list-style-type: none"> <li>- The Three Little Bears</li> <li>- Fact Family Bingo</li> <li>- A Graph of Fact Families</li> <li>- Bean Facts</li> <li>- Draw a Picture</li> <li>- Addition</li> <li>- Number Pyramid</li> <li>- Subtraction Sentences</li> <li>- Model the Story</li> <li>- Fact Families</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Represent and solve problems involving addition and subtraction within 20 <i>continued</i></b>		
<p>1.OA.6a Use strategies such as counting on; making ten (for example, <math>8 + 6 = 8 + 2 + 4 = 10 + 4 = 14</math>); decomposing a number leading to a ten (for example, <math>13 - 4 = 13 - 3 - 1 = 10 - 1 = 9</math>); using the relationship between addition and subtraction (for example, knowing that <math>8 + 4 = 12</math>, one knows <math>12 - 8 = 4</math>); and creating equivalent but easier or known sums (for example, adding <math>6 + 7</math> by creating the known equivalent <math>6 + 6 + 1 = 12 + 1 = 13</math>).</p>	<ul style="list-style-type: none"> <li>• Songs: Fact Families; Counting On</li> <li>• Books: Facts about Families; Circus 20; Painting by Number</li> <li>• Addition and Subtraction Fact Families</li> <li>• Addition Sentences</li> <li>• Subtraction Sentences</li> <li>• Commutative Property of Addition</li> <li>• Addition and Subtraction Relationship</li> <li>• Missing Addends</li> <li>• Missing Minuends and Subtrahends</li> <li>• Subtraction Patterns</li> </ul>	<ul style="list-style-type: none"> <li>• Add and subtract within 20.pdf: Add and subtract within 20, demonstrating fluency for addition and subtraction within 10.                             <ul style="list-style-type: none"> <li>- The Three Little Bears</li> <li>- Fact Family Bingo</li> <li>- A Graph of Fact Families</li> <li>- Bean Facts</li> <li>- Draw a Picture</li> <li>- Addition</li> <li>- Number Pyramid</li> <li>- Subtraction Sentences</li> <li>- Model the Story</li> <li>- Fact Families</li> </ul> </li> </ul>
<p>1.OA.6b By the end of Grade 1, demonstrate fluency for addition and subtraction within 10.</p>	<ul style="list-style-type: none"> <li>• Songs: Fact Families; Counting On</li> <li>• Book: Facts about Families</li> <li>• Addition and Subtraction Fact Families</li> <li>• Addition Sentences</li> <li>• Subtraction Sentences</li> <li>• Addition and Subtraction Relationship</li> <li>• Subtraction Patterns</li> </ul>	<ul style="list-style-type: none"> <li>• Add and subtract within 20.pdf: Add and subtract within 20, demonstrating fluency for addition and subtraction within 10.                             <ul style="list-style-type: none"> <li>- The Three Little Bears</li> <li>- Fact Family Bingo</li> <li>- A Graph of Fact Families</li> <li>- Bean Facts</li> <li>- Draw a Picture</li> <li>- Addition</li> <li>- Number Pyramid</li> <li>- Subtraction Sentences</li> <li>- Model the Story</li> <li>- Fact Families</li> </ul> </li> </ul>
<b>Work with addition and subtraction equations.</b>		
<p>1.OA.7 Understand the meaning of the equal sign, and determine whether equations involving addition and subtraction are true or false. For example, which of the following equations are true and which are false? <math>6 = 6</math>, <math>7 = 8 - 1</math>, <math>5 + 2 = 2 + 5</math>, <math>4 + 1 = 5 + 2</math>.</p>	<ul style="list-style-type: none"> <li>• Song: Fact Families</li> <li>• Book: Facts About Families</li> <li>• Addition and Subtraction Fact Families</li> <li>• Addition and Subtraction Relationship</li> <li>• Commutative Property of Addition</li> <li>• Addition Sentences</li> <li>• Subtraction Sentences</li> <li>• Greater Than, Less Than</li> <li>• More Than, Fewer Than</li> </ul>	<ul style="list-style-type: none"> <li>• Equal sign.pdf: Understand the meaning of the equal sign, and determine if equations involving addition and subtraction are true or false.                             <ul style="list-style-type: none"> <li>- Show Me!</li> <li>- Tricky Total</li> <li>- Domino Addition</li> <li>- Domino Subtraction</li> <li>- Playground Fact Snake</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<i>Work with addition and subtraction equations continued.</i>		
<p>1.OA.8 Determine the unknown whole number in an addition or subtraction equation relating three whole numbers. For example, determine the unknown number that makes the equation true in each of the equations <math>8 + ? = 11</math>, <math>5 = ? - 3</math>, <math>6 + 6 = ?</math></p>	<ul style="list-style-type: none"> <li>• Addition Sentences</li> <li>• Subtraction Sentences</li> <li>• Addition and Subtraction Fact Families</li> <li>• Missing Addends</li> <li>• Missing Minuends and Subtrahends</li> </ul>	
<b>Number and Operations in Base Ten (1.NBT)</b>		
<i>Extend the counting sequence.</i>		
<p>1.NBT.1 Count to 120, starting at any number less than 120. In this range, read and write numerals and represent a number of objects with a written numeral.</p>	<ul style="list-style-type: none"> <li>• Song: Counting On</li> <li>• Count On</li> <li>• Number Chart</li> </ul>	<ul style="list-style-type: none"> <li>• Count to 120.pdf: Count to 120, starting at any number less than 120. In this range, read and write numerals and represent a number of objects with a written numeral.                             <ul style="list-style-type: none"> <li>- Mystery Numbers</li> <li>- I Can Write Numbers to 99</li> <li>- Numbers 20-29; 30-39; 40-49; 50-59; 60-69</li> <li>- Counting to 89</li> <li>- Counting Charts:</li> <li>- I Can Count to 50; 100; 99; 120</li> </ul> </li> </ul>
<i>Understand place value.</i>		
<p>1.NBT.2 Understand that the two digits of a two-digit number represent amounts of tens and ones. Understand the following as special cases: a 10 can be thought of as a bundle of ten ones, called a “ten.”</p>	<ul style="list-style-type: none"> <li>• Song: Place Value</li> <li>• Place Value of 2-digit Numbers</li> <li>• Add with Manipulatives</li> </ul>	<ul style="list-style-type: none"> <li>• Tens as a bundle of ones.pdf: 10 can be thought of as a bundle of ten ones—called a “ten.”                             <ul style="list-style-type: none"> <li>- Popsicles to Ten</li> </ul> </li> </ul>
<p>1.NBT.2b The numbers from 11 to 19 are composed of a ten and one, two, three, four, five, six, seven, eight, or nine ones.</p>	<ul style="list-style-type: none"> <li>• Song: Place Value</li> <li>• Place Value of 2-digit Numbers</li> <li>• Add with Manipulatives</li> </ul>	<ul style="list-style-type: none"> <li>• 11-19 broken down.pdf: The numbers from 11 to 19 are composed of a ten and one, two, three, four, five, six, seven, eight, or nine ones.                             <ul style="list-style-type: none"> <li>- Toss It</li> <li>- Make a Number</li> <li>- Numbers Flashcards</li> <li>- Numbers 10-19</li> <li>- More Numbers 10-19</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Understand place value <i>continued</i>.</b>		
1.NBT.2c The numbers 10, 20, 30, 40, 50, 60, 70, 80, 90 refer to one, two, three, four, five, six, seven, eight, or nine tens (and 0 ones).	<ul style="list-style-type: none"> <li>• Place Value</li> <li>• Place Value of 2-digit Numbers</li> </ul>	<ul style="list-style-type: none"> <li>• Ten groupings.pdf: The numbers 10, 20, 30, 40, 50, 60, 70, 80, 90 refer to one, two, three, four, five, six, seven, eight, or nine tens (and 0 ones).                             <ul style="list-style-type: none"> <li>- Toss It</li> </ul> </li> </ul>
1.NBT.3 Compare two two-digit numbers based on meanings of the tens and ones digits, recording the results of comparisons with the symbols $>$ , $=$ , and $<$ .	<ul style="list-style-type: none"> <li>• Place Value</li> <li>• Greater Than, Less Than (2-digit Numbers)</li> </ul>	<ul style="list-style-type: none"> <li>• Compare two-digit numbers.pdf: Compare two two-digit numbers based on meanings of the tens and ones digits, recording the results of comparisons with the symbols <math>&gt;</math>, <math>=</math>, and <math>&lt;</math>.                             <ul style="list-style-type: none"> <li>- More or Less Spinner</li> <li>- Catch Me if You Can!</li> <li>- What Are You Looking For?</li> <li>- Two-Pile Sort</li> </ul> </li> </ul>
<b>Use place value understanding and properties of operations to add and subtract.</b>		
1.NBT.4 Add within 100, including adding a two-digit number and a one-digit number, and adding a two-digit number and a multiple of 10, using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method and explain the reasoning used. Understand that in adding two-digit numbers, one adds tens to tens and ones to ones, and that it is sometimes necessary to compose a ten.	<ul style="list-style-type: none"> <li>• Addition</li> <li>• Add Tens</li> <li>• Add with Manipulatives</li> <li>• Add Vertical Squares</li> <li>• Add with Beads</li> <li>• Addition and Subtraction Relationship</li> <li>• Add with Regrouping Concept</li> <li>• Add 2-digit and 1-digit Numbers with Regrouping</li> <li>• Add 2-digit Numbers without Regrouping</li> <li>• Add 2-digit Numbers with Regrouping</li> </ul>	<ul style="list-style-type: none"> <li>• Adding within 100.pdf: The numbers 10, 20, 30, 40, 50, 60, 70, 80, 90 refer to one, two, three, four, five, six, seven, eight, or nine tens (and 0 ones).                             <ul style="list-style-type: none"> <li>- Drawing Tens</li> <li>- Beans, Beans, and More Beans</li> <li>- The Kingdom of Popsicle Stick-Filled Purses</li> <li>- Straws and Macaroni</li> <li>- Bean Addition</li> <li>- Newsletter</li> <li>- Adding Tens and Ones</li> <li>- Color Adds Up</li> <li>- Cookies and Milk!</li> <li>- Addition of Two-Digit Numbers</li> <li>- Addition and Subtraction of Large Numbers</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
Use place value understanding and properties of operations to add and subtract <i>continued</i> .		
<p>1.NBT.5 Given a two-digit number, mentally find 10 more or 10 less than the number, without having to count; explain the reasoning used.</p>	<ul style="list-style-type: none"> <li>• Song: Skip Counting</li> <li>• Add</li> <li>• Subtract</li> <li>• Add Tens</li> <li>• Subtract Tens</li> <li>• Skip Count by 10</li> <li>• Number Chart</li> </ul>	<ul style="list-style-type: none"> <li>• Ten more or less.pdf: Given a two-digit number, mentally find 10 more or 10 less than the number, without having to count; explain the reasoning used.                             <ul style="list-style-type: none"> <li>- Ten-O</li> <li>- Toss It</li> <li>- Make a Number</li> <li>- Subtract 10</li> <li>- Flashcards</li> <li>- Bingo</li> <li>- Addition of Tens</li> </ul> </li> </ul>
<p>1.NBT.6 Subtract multiples of 10 in the range 10–90 from multiples of 10 in the range 10–90 (positive or zero differences), using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method and explain the reasoning used.</p>	<ul style="list-style-type: none"> <li>• Subtraction</li> <li>• Subtract Tens</li> <li>• Subtraction Patterns</li> <li>• Subtract</li> <li>• Place Value</li> <li>• Addition and Subtraction Relationship</li> <li>• Use Manipulatives</li> </ul>	<ul style="list-style-type: none"> <li>• Subtracting in 10s.pdf: Subtract multiples of 10 in the range 10–90 from multiples of 10 in the range 10–90.                             <ul style="list-style-type: none"> <li>- Ten-O</li> <li>- Bingo</li> <li>- Subtract Multiples of 10</li> </ul> </li> </ul>
<b>Measurement and Data (1.MD)</b>		
Measure lengths indirectly and by iterating length units.		
<p>1.MD.1 Order three objects by length; compare the lengths of two objects indirectly by using a third object.</p>	<ul style="list-style-type: none"> <li>• Length</li> <li>• Nonstandard Units of Length</li> </ul>	<ul style="list-style-type: none"> <li>• Order by length.pdf: Order three objects by length; compare the lengths of two objects indirectly by using a third object.                             <ul style="list-style-type: none"> <li>- Estimating Length</li> <li>- A Fruit and Vegetable Measure</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Measure lengths indirectly and by iterating length units <i>continued</i>.</b>		
<p>1.MD.2 Express the length of an object as a whole number of length units, by laying multiple copies of a shorter object (the length unit) end to end; understand that the length measurement of an object is the number of same-size length units that span it with no gaps or overlaps. Limit to contexts where the object being measured is spanned by a whole number of length units with no gaps or overlaps.</p>	<ul style="list-style-type: none"> <li>• Length</li> <li>• Nonstandard Units of Length</li> </ul>	<ul style="list-style-type: none"> <li>• Length Measurement.pdf: Express the length of an object as a whole number of length units, by laying multiple copies of a shorter object (the length unit) end to end; understand that the length measurement of an object is the number of same-size length units that span it with no gaps or overlaps.                             <ul style="list-style-type: none"> <li>- Measures of Me</li> <li>- Measure a Handful</li> <li>- Estimating Length</li> <li>- A Fruit and Vegetable</li> <li>- Measure Up!</li> <li>- Inches/Centimeters Rulers</li> </ul> </li> </ul>
<b>Tell and write time.</b>		
<p>1.MD.3 Tell and write time in hours and half-hours using analog and digital clocks.</p>	<ul style="list-style-type: none"> <li>• Song: Clock Hands</li> <li>• Book: Mr. Romano’s Secret: A Time Story</li> <li>• Tell Time to the Hour</li> <li>• Tell Time to the Half-Hour</li> </ul>	<ul style="list-style-type: none"> <li>• Hours and Half-hours.pdf: Tell and write time in hours and half-hours using analog and digital clocks.                             <ul style="list-style-type: none"> <li>- What Comes After, Before, Or Between?</li> <li>- Make Your Own Clock</li> <li>- Learning to Tell Time</li> <li>- Matching Time</li> <li>- What Numbers Are Missing?</li> <li>- What Time Is It?</li> <li>- Time of Day</li> <li>- Clock flashcards</li> </ul> </li> </ul>



UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Represent and interpret data.</b>		
<p>1.MD.4 Organize, represent, and interpret data with up to three categories; ask and answer questions about the total number of data points, how many in each category, and how many more or less are in one category than in another.</p>	<ul style="list-style-type: none"> <li>• Songs: Tallying; Graphing</li> <li>• Books: One More Cat; The Booneville Nine</li> <li>• Tally Marks</li> <li>• Graphs</li> <li>• Make a Table</li> </ul>	<ul style="list-style-type: none"> <li>• Data Categorization.pdf: Organize, represent, and interpret data with up to three categories; ask and answer questions about the total number of data points, how many in each category, and how many more or less are in one category than in another.                             <ul style="list-style-type: none"> <li>- Ice-Cream Sundae</li> <li>- Make a Real Object Graph</li> <li>- Make a Weather Bar Graph</li> <li>- Weather Flashcards</li> <li>- Our Favorite Foods</li> <li>- Make a Graph</li> <li>- Make a Table</li> <li>- How Many?</li> <li>- Bugs!</li> <li>- Use Graphs and Tables</li> <li>- How Big Is Your Family?</li> </ul> </li> </ul>
<b>Identify the value of coins.</b>		
<p>1.MD.5 Identify the values of pennies, nickels, dimes and quarters, and know their comparative values. (For example, a dime is of greater value than a nickel.) Use appropriate notation to designate a coin's value. (For example, 5¢.)</p>	<ul style="list-style-type: none"> <li>• Songs: Money; Save Your Pennies</li> <li>• Coin Identification</li> <li>• Coin Value</li> </ul>	<ul style="list-style-type: none"> <li>• Coin Identification: Identify U.S. coins, including pennies, nickels, dimes, and quarters, and understand their relative values. Determine the value of a collection of U.S. coins up to one dollar.                             <ul style="list-style-type: none"> <li>- Coin Hopscotch</li> <li>- Counting Money</li> <li>- Coin Corners—Review</li> </ul> </li> </ul>
<b>Geometry (1.G)</b>		
<b>Reason with shapes and their attributes.</b>		
<p>1.G.1 Distinguish between defining attributes (for example, triangles are closed and three-sided) versus non-defining attributes (for example, color, orientation, overall size); build and draw shapes that possess defining attributes.</p>	<ul style="list-style-type: none"> <li>• Songs: Corners and Sides; Kites</li> <li>• Geoboard</li> <li>• Space Shapes</li> </ul>	<ul style="list-style-type: none"> <li>• Attributes.pdf: Distinguish between defining attributes versus non-defining attributes; build and draw shapes to possess defining attributes.                             <ul style="list-style-type: none"> <li>- Sorting Shapes</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<i>Reason with shapes and their attributes continued.</i>		
1.G.2 Compose shapes.	<ul style="list-style-type: none"> <li>• Song: Shapes, Shapes, Shapes</li> <li>• Simple Shapes</li> <li>• Space Shapes</li> <li>• Geoboard</li> <li>• Tangrams</li> </ul>	
1.G.2a Compose two-dimensional shapes (rectangles, squares, trapezoids, triangles, half-circles, and quarter-circles) to create a composite shape, and compose new shapes from the composite shape.	<ul style="list-style-type: none"> <li>• Song: Shapes, Shapes, Shapes</li> <li>• Simple Shapes</li> <li>• Rectangle, Triangle, Circle, Square</li> <li>• Geoboard</li> <li>• Tangrams</li> </ul>	
1.G.2b Compose three-dimensional shapes (cubes, right rectangular prisms, right circular cones, and right circular cylinders) to create a composite shape, and compose new shapes from the composite shape. First grade students do not need to learn formal names such as “right rectangular prism.”	<ul style="list-style-type: none"> <li>• Song: Kites; Corners and Sides</li> <li>• Star, Semicircle, Octagon, Rhombus</li> <li>• Solid Shapes</li> <li>• Space Shapes</li> <li>• World Shapes</li> </ul>	
1.G.3 Partition circles and rectangles into two and four equal shares; describe the shares using the words halves, fourths, and quarters; and use the phrases half of, fourth of, and quarter of. Describe the whole as two or four of the shares. Understand that, for these examples, decomposing into more equal shares creates smaller shares.	<ul style="list-style-type: none"> <li>• Song: Fractions</li> <li>• Books: Halves and Fourths and Thirds; Half For You and Half For Me</li> <li>• Equal-part Fractions</li> <li>• Label Parts of Fractions</li> </ul>	<ul style="list-style-type: none"> <li>• Equal shares.pdf: Partition circles and rectangles into two and four equal shares, describe the shares using the words halves, fourths, and quarters, and use the phrases half of, fourth of, and quarter of. Describe the whole as two of, or four of the shares. Understand for these examples that decomposing into more equal shares creates smaller shares.                         <ul style="list-style-type: none"> <li>- Make It Equal</li> <li>- Fraction Friends</li> <li>- Fraction Train</li> <li>- Halves, Thirds, Fourths</li> <li>- Equal Parts</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>GRADE 2</b>		
<b>Operations and Algebraic Thinking (2.OA)</b>		
<b>Represent and solve problems involving addition and subtraction.</b>		
<p>2.OA.1 Use addition and subtraction within 100 to solve one- and two-step word problems involving situations of adding to, taking from, putting together, taking apart, and comparing with unknowns in all positions, for example, by using drawings and equations with a symbol for the unknown number to represent the problem.</p>	<ul style="list-style-type: none"> <li>• Book: Painting by Number</li> <li>• Addition</li> <li>• Subtraction</li> <li>• Missing Addends and Subtrahends</li> <li>• Subtraction Sentences</li> <li>• Addition and Subtraction Facts</li> </ul>	<ul style="list-style-type: none"> <li>• One- and two-step word problems within 100. pdf: Use addition and subtraction within 100 to solve one- and two-step word problems involving situations of adding to, taking from, putting together, taking apart, and comparing, with unknowns in all positions, e.g., by using drawings and equations with a symbol for the unknown number to represent the problem.                         <ul style="list-style-type: none"> <li>- Animal Math</li> <li>- Picture Problems</li> <li>- Color the Chart</li> <li>- Think About it Differently</li> <li>- Act it Out</li> <li>- Guess and Check</li> </ul> </li> </ul>
<b>Fluently add and subtract within 20.</b>		
<p>2.OA.2 Fluently add and subtract within 20.</p>	<ul style="list-style-type: none"> <li>• Songs: Fact Families; Doubles</li> <li>• Subtraction Patterns</li> <li>• Addition Facts to 20</li> </ul>	<ul style="list-style-type: none"> <li>• Adding and subtracting within 20.pdf: Fluently add and subtract within 20 using mental strategies. By end of grade 2, know from memory all sums of two one-digit numbers.                         <ul style="list-style-type: none"> <li>- Flashcards:</li> <li>- Addition—horizontal and vertical</li> <li>- Subtraction—horizontal and vertical</li> </ul> </li> </ul>
<p>2.OA.2a Add and subtract within 20 using mental strategies such as counting on; making ten (for example, <math>8 + 6 = 8 + 2 + 4 = 10 + 4 = 14</math>); decomposing a number leading to a ten (for example, <math>13 - 4 = 13 - 3 - 1 = 10 - 1 = 9</math>); using the relationship between addition and subtraction (for example, knowing that <math>8 + 4 = 12</math>, one knows <math>12 - 8 = 4</math>); and creating equivalent but easier or known sums (for example, adding <math>6 + 7</math> by creating the known equivalent <math>6 + 6 + 1 = 12 + 1 = 13</math>).</p>	<ul style="list-style-type: none"> <li>• Songs: Fact Families; Doubles</li> <li>• Subtraction Patterns</li> <li>• Addition Facts to 20</li> </ul>	<ul style="list-style-type: none"> <li>• Add and subtract within 20.pdf: Add and subtract within 20, demonstrating fluency for addition and subtraction within 10.                         <ul style="list-style-type: none"> <li>- The Three Little Bears</li> <li>- Fact Family Bingo</li> <li>- A Graph of Fact Families</li> <li>- Bean Facts</li> <li>- Draw a Picture</li> <li>- Addition</li> <li>- Number Pyramid</li> <li>- Subtraction Sentences</li> <li>- Model the Story</li> <li>- Fact Families</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Fluently add and subtract within 20 <i>continued</i>.</b>		
2.OA.2b By the end of Grade 2, know from memory all sums of two one-digit numbers.	<ul style="list-style-type: none"> <li>Addition Facts to 20</li> </ul>	<ul style="list-style-type: none"> <li>Adding and subtracting within 20.pdf: Fluently add and subtract within 20 using mental strategies. By end of grade 2, know from memory all sums of two one-digit numbers.                             <ul style="list-style-type: none"> <li>Flashcards:                                     <ul style="list-style-type: none"> <li>Addition—horizontal and vertical</li> <li>Subtraction—horizontal and vertical</li> </ul> </li> </ul> </li> </ul>
<b>Work with equal groups of objects to gain foundations for multiplication.</b>		
2.OA.3 Determine whether a group of objects (up to 20) has an odd or even number of members, (for example, by pairing objects or counting them by twos). Write an equation to express an even number as a sum of two equal addends.	<ul style="list-style-type: none"> <li>Song: Odd Todd and Even Steven</li> <li>Skip Count by 2</li> <li>Addition Facts</li> </ul>	<ul style="list-style-type: none"> <li>Odd and even recognition.pdf: Determine whether a group of objects (up to 20) has an odd or even number of members.                             <ul style="list-style-type: none"> <li>Missing Patterns</li> <li>Counting by 2s</li> <li>What's My Number?</li> </ul> </li> </ul>
2.OA.4 Use addition to find the total number of objects arranged in rectangular arrays with up to 5 rows and up to 5 columns; write an equation to express the total as a sum of equal addends.	<ul style="list-style-type: none"> <li>Addition</li> <li>Multiply Using Repeated Addition</li> <li>Multiply Using Arrays</li> </ul>	
<b>Number and Operations in Base Ten (2.NBT)</b>		
<b>Understand place value.</b>		
2.NBT.1 Understand that the three digits of a three-digit number represent amounts of hundreds, tens, and ones; for example, 706 equals 7 hundreds, 0 tens, and 6 ones. Understand the following as special cases: a 100 can be thought of as a bundle of ten tens called a “hundred.”	<ul style="list-style-type: none"> <li>Song: Place Value</li> <li>Place Value</li> <li>Place Value of 3-digit Numbers</li> </ul>	<ul style="list-style-type: none"> <li>Thinking of 100 as a bundle of ten 10s.pdf: 100 can be thought of as a bundle of ten tens—called a “hundred.”                             <ul style="list-style-type: none"> <li>The Kingdom of Popsicle Stick-Filled Purses</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<i>Understand place value continued.</i>		
2.NBT.1b The numbers 100, 200, 300, 400, 500, 600, 700, 800, 900 refer to one, two, three, four, five, six, seven, eight, or nine hundreds (and 0 tens and 0 ones).	<ul style="list-style-type: none"> <li>• Song: Place Value</li> <li>• Place Value</li> <li>• Place Value of 3-digit Numbers</li> </ul>	<ul style="list-style-type: none"> <li>• Grouping hundreds.pdf: The numbers 100, 200, 300, 400, 500, 600, 700, 800, 900 refer to one, two, three, four, five, six, seven, eight, or nine hundreds (and 0 tens and 0 ones).                             <ul style="list-style-type: none"> <li>- My Three-Digit Numbers</li> </ul> </li> </ul>
2.NBT.2 Count within 1,000; skip-count by fives, tens, and hundreds.	<ul style="list-style-type: none"> <li>• Song: Skip Counting</li> <li>• Book: Jump Rope Rhymes</li> <li>• Skip Count</li> <li>• Skip Count by 10</li> <li>• Skip Count by 5</li> <li>• Number Sequences and Patterns</li> </ul>	<ul style="list-style-type: none"> <li>• Counting within 1000.pdf: Count within 1,000; skip-count by 5s, 10s, and 100s.                             <ul style="list-style-type: none"> <li>- Chart Patterns</li> <li>- My 199 Picture; 200 Picture; 299 Picture; 300 Picture; 399 Picture; 400 Picture; 499 Picture; 500 Picture; 599 Picture; 600 Picture; 699 Picture; 700 Picture</li> <li>- 900 Chart</li> </ul> </li> </ul>
2.NBT.3 Read and write numbers to 1,000 using base-ten numerals, number names, and expanded form.	<ul style="list-style-type: none"> <li>• Sequences of 2-digit Numbers</li> <li>• Sequences of 3-digit Numbers</li> <li>• Number Chart</li> <li>• Place Value</li> </ul>	<ul style="list-style-type: none"> <li>• Read and write numbers to 1000.pdf: Read and write numbers to 1000 using base-ten numerals, number names, and expanded form.                             <ul style="list-style-type: none"> <li>- Cube Trails</li> <li>- Race for a Flat</li> <li>- High/Low Number Cube Throw</li> <li>- Lucky Five</li> </ul> </li> </ul>
2.NBT.4 Compare two three-digit numbers based on meanings of the hundreds, tens, and ones digits, using $>$ , $=$ , and $<$ symbols to record the results of comparisons.	<ul style="list-style-type: none"> <li>• Greater Than, Less Than (3-digit Numbers)</li> <li>• Place Value of 3-digit Numbers</li> </ul>	<ul style="list-style-type: none"> <li>• Less than, equal to, or greater than.pdf: Compare two three-digit numbers based on meanings of the hundreds, tens, and ones digits, using <math>&gt;</math>, <math>=</math>, and <math>&lt;</math> symbols to record the results of comparisons.                             <ul style="list-style-type: none"> <li>- More or Less</li> <li>- The Hands Have It!</li> <li>- Larger or Smaller?</li> <li>- Comparing Number Cards</li> <li>- Number Cards</li> <li>- <math>&lt;</math>, <math>&gt;</math>, <math>=</math> Cards</li> <li>- Greater Than, Less Than, Equal To</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
Use place value understanding and properties of operations to add and subtract.		
<p>2.NBT.5 Fluently add and subtract within 100 using strategies based on place value, properties of operations, and/or the relationship between addition and subtraction.</p>	<ul style="list-style-type: none"> <li>• Place Value</li> <li>• Addition and Subtraction Relationship</li> <li>• Commutative Properties of Addition</li> <li>• Addition</li> <li>• Subtraction</li> <li>• Add without Regrouping</li> <li>• Add with Regrouping</li> <li>• Subtract without regrouping</li> <li>• Subtract with Regrouping</li> </ul>	<ul style="list-style-type: none"> <li>• Add and subtract within 100.pdf: Fluently add and subtract within 100 using strategies based on place value, properties of operations, and/or the relationship between addition and subtraction.                             <ul style="list-style-type: none"> <li>- Addition of Two-Digit Numbers</li> <li>- Tic Tac Toe</li> <li>- Subtraction of Two-Digit Numbers</li> </ul> </li> </ul>
<p>2.NBT.6 Add up to four two-digit numbers using strategies based on place value and properties of operations.</p>	<ul style="list-style-type: none"> <li>• Add Two-digit Numbers with Regrouping</li> <li>• Commutative Properties of Addition</li> <li>• Place Value</li> </ul>	<ul style="list-style-type: none"> <li>• Adding four 2-digit numbers.pdf: Add up to four two-digit numbers using strategies based on place value and properties of operations.                             <ul style="list-style-type: none"> <li>- Add Four Two-Digit Numbers</li> </ul> </li> </ul>
<p>2.NBT.7 Add and subtract within 1,000 using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method. Understand that in adding or subtracting three-digit numbers, one adds or subtracts hundreds and hundreds, tens and tens, and ones and ones, and that it is sometimes necessary to compose or decompose tens or hundreds.</p>	<ul style="list-style-type: none"> <li>• Place Value</li> <li>• Addition and Subtraction Relationship</li> <li>• Commutative Properties of Addition</li> <li>• Addition</li> <li>• Subtraction</li> <li>• Add without Regrouping</li> <li>• Add with Regrouping</li> <li>• Subtract without regrouping</li> <li>• Subtract with Regrouping</li> <li>• Act Out Addition</li> <li>• Act Out Subtraction</li> </ul>	<ul style="list-style-type: none"> <li>• Add and subtract within 1000.pdf: Add and subtract within 1,000, using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method. Understand that in adding or subtracting three-digit numbers, one adds or subtracts hundreds and hundreds, tens and tens, ones and ones; and sometimes it is necessary to compose or decompose tens or hundreds.                             <ul style="list-style-type: none"> <li>- Choose and Add</li> <li>- Mix and Match Addition</li> <li>- Expanded Subtraction</li> <li>- Subtracting Repeats</li> <li>- 999</li> <li>- Prediction</li> <li>- Up and Away</li> <li>- Regrouping Treasure Hunt</li> <li>- Play Ball</li> <li>- Squirrel Facts</li> <li>- Number Cards</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Use place value understanding and properties of operations to add and subtract <i>continued</i>.</b>		
2.NBT.8 Mentally add 10 or 100 to a given number 100-900, and mentally subtract 10 or 100 from a given number 100-900.	<ul style="list-style-type: none"> <li>• Skip Count</li> <li>• Place Value</li> <li>• Number Chart</li> <li>• Number Patterns</li> </ul>	<ul style="list-style-type: none"> <li>• Mentally adding or subtracting 10 or 100.pdf: Mentally add 10 or 100 to a given number 100–900, and mentally subtract 10 or 100 from a given number 100–900.                             <ul style="list-style-type: none"> <li>- Spin and Solve</li> </ul> </li> </ul>
2.NBT.9 Explain why addition and subtraction strategies work, using place value and the properties of operations. Explanations may be supported by drawings or objects.	<ul style="list-style-type: none"> <li>• Addition</li> <li>• Subtraction</li> <li>• Add with Regrouping Concept</li> <li>• Subtract with Regrouping Concept</li> <li>• Place Value</li> <li>• Number Line</li> <li>• Addition and Subtraction Relationship</li> <li>• Commutative Properties of Addition</li> <li>• Act Out Addition</li> <li>• Act Out Subtraction</li> </ul>	<ul style="list-style-type: none"> <li>• Explaining addition and subtraction strategies.pdf: Explain why addition and subtraction strategies work, using place value and the properties of operations.                             <ul style="list-style-type: none"> <li>- Cube Trails</li> <li>- Race for a Flat</li> <li>- High/Low Number Cube Throw</li> <li>- Lucky Five</li> <li>- Hundreds, Tens, Ones Chart</li> <li>- Numbers Cards</li> </ul> </li> </ul>
<b>Measurement and Data (2.MD)</b>		
<b>Measure and estimate lengths in standard units.</b>		
2.MD.1 Measure the length of an object by selecting and using appropriate tools such as rulers, yardsticks, meter sticks, and measuring tapes.	<ul style="list-style-type: none"> <li>• Song: Measuring Plants</li> <li>• Book: Birds at My House</li> <li>• Length</li> <li>• Measurement Tools</li> <li>• Standard Units of Length</li> </ul>	<ul style="list-style-type: none"> <li>• Measurement tools.pdf: Measure the length of an object by selecting and using appropriate tools such as rulers, yardsticks, meter sticks, and measuring tapes.                             <ul style="list-style-type: none"> <li>- Ready, Set, Measure</li> <li>- Treasure Hunt</li> <li>- Centimeter ruler</li> <li>- Inch Ruler</li> <li>- Let’s Measure in Centimeters!</li> <li>- Let’s Measure in Inches!</li> </ul> </li> </ul>
2.MD.2 Measure the length of an object twice, using length units of different lengths for the two measurements; describe how the two measurements relate to the size of the unit chosen.	<ul style="list-style-type: none"> <li>• Length</li> <li>• Standard Units of Length</li> <li>• Measurement Tools</li> </ul>	<ul style="list-style-type: none"> <li>• Measuring the same object two ways.pdf: Measure the length of an object twice, using length units of different lengths for the two measurements; describe how the two measurements relate to the size of the unit chosen.                             <ul style="list-style-type: none"> <li>- Ready, Set, Measure</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Measure and estimate lengths in standard units <i>continued</i>.</b>		
2.MD.3 Estimate lengths using units of inches, feet, centimeters, and meters.	<ul style="list-style-type: none"> <li>• Song: Measuring Plants</li> <li>• Length</li> <li>• Standard Units of Length</li> <li>• Measurement Tools</li> </ul>	<ul style="list-style-type: none"> <li>• Estimating lengths.pdf: Estimate lengths using units of inches, feet, centimeters, and meters.                             <ul style="list-style-type: none"> <li>- Ready, Set, Measure</li> <li>- Treasure Hunt</li> <li>- Let's Measure in Centimeters!</li> <li>- Let's Measure in Inches!</li> <li>- Measuring Perimeter</li> </ul> </li> </ul>
2.MD.4 Measure to determine how much longer one object is than another, expressing the length difference in terms of a standard length unit. For example, after measuring a pencil and a crayon, a student uses the measurements to determine that the pencil is two inches longer than the crayon.	<ul style="list-style-type: none"> <li>• Length</li> <li>• Standard Units of Length</li> </ul>	<ul style="list-style-type: none"> <li>• Measure length.pdf: Measure to determine how much longer one object is than another, expressing the length difference in terms of a standard length unit.                             <ul style="list-style-type: none"> <li>- Ready, Set, Measure</li> <li>- Treasure Hunt</li> </ul> </li> </ul>
<b>Relate addition and subtraction to length.</b>		
2.MD.5 Use addition and subtraction within 100 to solve word problems involving lengths that are given in the same units. For example, use drawings (such as drawings of rulers) and equations with a symbol for the unknown number to represent the problem.	<ul style="list-style-type: none"> <li>• Book: Yangshi's Perimeter</li> <li>• Addition</li> <li>• Subtraction</li> <li>• Length</li> <li>• Standard Units of Length</li> </ul>	<ul style="list-style-type: none"> <li>• One- and two-step word problems within 100. pdf: Use addition and subtraction within 100 to solve word problems involving lengths that are given in the same units, e.g., by using drawings and equations with a symbol for the unknown number to represent the problem.                             <ul style="list-style-type: none"> <li>- Animal Math</li> <li>- Picture Problems</li> <li>- Color the Chart</li> <li>- Think About it Differently</li> </ul> </li> </ul>
2.MD.6 Represent whole numbers as lengths from 0 on a number line diagram with equally spaced points corresponding to the numbers 0, 1, 2... Represent whole number sums and differences within 100 on a number line diagram.	<ul style="list-style-type: none"> <li>• Number Line</li> <li>• Length</li> </ul>	



UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Work with time and money.</b>		
<p>2.MD.7 Tell and write time from analog and digital clocks to the nearest five minutes, using a.m. and p.m.</p>	<ul style="list-style-type: none"> <li>• Songs: Telling Time; Clock Hands</li> <li>• Tell Time</li> <li>• Tell Time to Five Minutes</li> <li>• Tell Time to the Quarter Hour</li> <li>• Tell Time to the Minute</li> <li>• Tell Time to the Hour</li> <li>• Tell Time to the Half-hour</li> </ul>	<ul style="list-style-type: none"> <li>• Tell and write time.pdf: Tell and write time from analog and digital clocks to the nearest five minutes, using a.m. and p.m.                             <ul style="list-style-type: none"> <li>- Matching Clocks</li> <li>- Cartoon Captions</li> <li>- Time to 5 Minutes</li> </ul> </li> </ul>
<p>2.MD.8 Solve word problems involving dollar bills, quarters, dimes, nickels, and pennies, using \$ and ¢ symbols appropriately. For example, if you have 2 dimes and 3 pennies, how many cents do you have?</p>	<ul style="list-style-type: none"> <li>• Songs: Money; Save Your Pennies</li> <li>• Book: Bugs For Sale</li> <li>• Coin Identification</li> <li>• Coin Value</li> <li>• Quarters</li> <li>• Count Dimes, Nickels, and Pennies</li> <li>• Count Quarters, Dimes, Nickels, and Pennies</li> <li>• Count Nickels and Pennies or Dimes and Pennies</li> <li>• Make Change</li> <li>• Count Coins</li> <li>• Count Bills and Coins</li> <li>• Equivalent Sums of Money</li> </ul>	<ul style="list-style-type: none"> <li>• Solve money word problems.pdf: Solve word problems involving dollar bills, quarters, dimes, nickels, and pennies, using \$ and ¢ symbols appropriately.                             <ul style="list-style-type: none"> <li>- Supermarket Hunt</li> <li>- Shopping for My Family</li> <li>- Money Combinations</li> <li>- Money Sums</li> <li>- Pizza Parlor</li> <li>- How Much Back?</li> <li>- Coin Count</li> <li>- Bills and Coins</li> <li>- Let's Count Coins</li> <li>- Money Addition</li> <li>- Change is Good!</li> <li>- Make 45¢</li> </ul> </li> </ul>
<b>Represent and interpret data.</b>		
<p>2.MD.9 Generate measurement data by measuring lengths of several objects to the nearest whole unit, or by making repeated measurements of the same object. Show the measurements by making a line plot, where the horizontal scale is marked off in whole-number units.</p>	<ul style="list-style-type: none"> <li>• Measurement Tools</li> </ul>	<ul style="list-style-type: none"> <li>• Generating measurement data.pdf: Generate measurement data by measuring lengths of several objects to the nearest whole unit, or by making repeated measurements of the same object. Show the measurements by making a line plot, where the horizontal scale is marked off in whole-number units.                             <ul style="list-style-type: none"> <li>- Measuring Inches</li> <li>- Ready, Set, Measure</li> <li>- Let's Measure in Centimeters!</li> <li>- Let's Measure in Inches!</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>Represent and interpret data <i>continued</i>.</b>		
<p>2.MD.10 Draw a picture graph and a bar graph (with single-unit scale) to represent a data set with up to four categories. Solve simple put-together, take-apart, and comparison problems using information presented in a bar graph.</p>	<ul style="list-style-type: none"> <li>• Song: Graphing</li> <li>• Graphing</li> <li>• Picture Graphs</li> <li>• Bar Graphs</li> <li>• Use Graphs and Tables</li> </ul>	<ul style="list-style-type: none"> <li>• Graphs.pdf: Draw a picture graph and a bar graph (with single-unit scale) to represent a data set with up to four categories. Solve simple put-together, take-apart, and compare problems using information presented in a bar graph.                             <ul style="list-style-type: none"> <li>- Questions and Answers</li> <li>- Library Book Survey</li> <li>- Playground Survey</li> <li>- Rock Collections</li> <li>- Use Graphs and Tables</li> </ul> </li> </ul>
<b>Geometry (2.G)</b>		
<b>Reason with shapes and their attributes.</b>		
<p>2.G.1 Recognize and draw shapes having specified attributes, such as a given number of angles or a given number of equal faces. Sizes are compared directly or visually, not compared by measuring. Identify triangles, quadrilaterals, pentagons, hexagons, and cubes.</p>	<ul style="list-style-type: none"> <li>• Songs: Shapes, Shapes, Shapes; Corners and Sides; Kites</li> <li>• Book: The Shape of Things</li> <li>• Space Shapes</li> <li>• World Shapes</li> <li>• Geoboard</li> </ul>	<ul style="list-style-type: none"> <li>• Draw shapes.pdf: Recognize and draw shapes having specified attributes, such as a given number of angles or a given number of equal faces. Identify triangles, quadrilaterals, pentagons, hexagons, and cubes.                             <ul style="list-style-type: none"> <li>- Making Shapes</li> <li>- Shapes Review</li> </ul> </li> </ul>
<p>2.G.2 Partition a rectangle into rows and columns of same-size squares and count to find the total number of squares.</p>	<ul style="list-style-type: none"> <li>• Song: Fractions</li> <li>• Fractions of Regions</li> </ul>	
<p>2.G.3 Partition circles and rectangles into two, three, or four equal shares; describe the shares using the words halves, thirds, half of, a third of, etc.; and describe the whole as two halves, three thirds, or four fourths. Recognize that equal shares of identical wholes need not have the same shape.</p>	<ul style="list-style-type: none"> <li>• Song: Fractions</li> <li>• Books: Halves and Fourths and Thirds; The Fraction Twins</li> <li>• Fractions</li> <li>• Label Parts of Fractions</li> <li>• Fractions of Regions</li> <li>• Fractions of Groups</li> </ul>	<ul style="list-style-type: none"> <li>• Fractions.pdf: Partition circles and rectangles into two, three, or four equal shares, describe the shares using the words halves, thirds, half of, a third of, etc., and describe the whole as two halves, three thirds, four fourths. Recognize that equal shares of identical wholes need not have the same shape.                             <ul style="list-style-type: none"> <li>- Frenzied Fraction Fun</li> <li>- Fabulous Fractions</li> </ul> </li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>SCIENCE (SEED)</b>		
<b>KINDERGARTEN</b>		
<b>K.1: Weather Patterns</b>		
<p>K.1.1 Obtain, evaluate, and communicate information about local, observable weather conditions to describe patterns over time. Emphasize the students' collection and sharing of data. Examples of data could include sunny, cloudy, windy, rainy, cold, or warm. (ESS2.D)</p>	<ul style="list-style-type: none"> <li>• Song: Seasons</li> <li>• Book: That's What I Like: A Book About Seasons</li> <li>• Weather</li> <li>• Calendar/Graph Weather</li> <li>• Weather Patterns</li> <li>• Clouds</li> <li>• Spring</li> <li>• Summer</li> <li>• Fall</li> <li>• Winter</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Weather; The Weather Around Us</li> <li>• Weather Cards</li> </ul>
<p>K.1.2 Obtain, evaluate, and communicate information on the effect of forecasted weather patterns on human behavior. Examples could include how humans respond to local forecasts of typical and severe weather such as extreme heat, high winds, flash floods, thunderstorms, or snowstorms. (ESS3.B)</p>	<ul style="list-style-type: none"> <li>• Songs: Precipitation; Storms</li> <li>• Book: Whatever the Weather</li> <li>• Weather</li> <li>• Weather Tools</li> <li>• Calendar/Graph Weather</li> <li>• Weather Affects People and Animals</li> <li>• Weather Experiment</li> <li>• Lightning Safety</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Weather; The Weather Around Us</li> <li>• Weather Cards</li> </ul>
<p>K.1.3 Carry out an investigation using the five senses, to determine the effect of sunlight on different surfaces and materials. Examples could include measuring temperature, through touch or other methods, on natural and man-made materials in various locations throughout the day. (PS3.B)</p>	<ul style="list-style-type: none"> <li>• Song: Five Senses</li> <li>• Sight</li> <li>• Hearing</li> <li>• Touch</li> <li>• Smell</li> <li>• Taste</li> <li>• Sun</li> <li>• Science Tools</li> </ul>	

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>K.1: Weather Patterns <i>continued</i></b>		
<p>K.1.4 Design a solution that will reduce the warming effect of sunlight on an area. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare and test designs.(PS3.B, ETS1.A, ETS1.B, ETS1.C)</p>	<p>Waterford encourages everyone to have writing, drawing, and art materials available for children’s creations.</p>	
<b>K.2: Living Things and Their Surroundings</b>		
<p>K.2.1 Obtain, evaluate, and communicate information to describe patterns of what living things (plants and animals, including humans) need to survive. Emphasize the similarities and differences between the survival needs of all living things. Examples could include that plants depend on air, water, minerals, and light to survive, or animals depend on plants or other animals to survive. (LS1.C)</p>	<ul style="list-style-type: none"> <li>• Songs: Water; Food From Plants</li> <li>• Books: Mela’s Water Pot; Everybody Needs to Eat</li> <li>• Sun</li> <li>• Plants</li> <li>• Water</li> <li>• Plants and Animals Need Air</li> <li>• Plants Need Water</li> <li>• Animals Need Water</li> <li>• Healthy Plants’ Needs</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Water for Plants</li> </ul> <p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Green and Growing</li> </ul>
<p>K.2.2 Obtain, evaluate, and communicate information about patterns in the relationships between the needs of different living things (plants and animals, including humans) and the places they live. Emphasize that living things need water, air, and resources and that they live in places that have the things they need. Examples could include investigating plants grown in various locations and comparing the results or comparing animals with the places they live. (LS2.B, ESS3.A)</p>	<ul style="list-style-type: none"> <li>• Songs: Four Ecosystems; Plants Are Growing</li> <li>• Book: Where in the World Would You Go Today?</li> <li>• Ecosystems</li> <li>• Animal Behavior</li> <li>• Oceans</li> <li>• Mountains</li> <li>• Deserts</li> <li>• Rainforests</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Our Earth; Places on Earth</li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
K.2: Living Things and Their Surroundings <i>continued</i>		
<p>K.2.3 Standard K.2.3 Obtain, evaluate, and communicate information about how living things (plants and animals, including humans) affect their surroundings to survive. Examples could include squirrels digging in the ground to hide their food, plant roots breaking concrete, or humans building shelters. (ESS2.E)</p>	<ul style="list-style-type: none"> <li>• Books: Turtle’s Pond; Winter Snoozers; Birds At My House</li> </ul>	
<p>K.2.4 Design and communicate a solution to address the effects that living things (plants and animals, including humans) experience while trying to survive in their surroundings. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare designs. Emphasize students working from a plant, animal, or human perspective. Examples could include a plant growing to get more sunlight, a beaver building a dam, or humans caring for the Earth by reusing and recycling natural resources. (ESS3.C, ETS1.A, ETS1.B, ETS1.C)</p>	<ul style="list-style-type: none"> <li>• Songs: Pollution Rap; Food From Plants</li> <li>• Books: Mela’s Water Pot; Everybody Needs to Eat; Little Tree; Turtle’s Pond</li> <li>• Pollution and Recycling</li> <li>• Care of Earth</li> <li>• Care of Water</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Water for Plants</li> </ul> <p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Green and Growing</li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>K.3: Forces, Motion, and Interactions</b>		
<p>K.3.1 Plan and conduct an investigation to compare the effects of different strengths or different directions of forces on the motion of an object. Emphasize forces as a push and pull on an object. The idea of strength should be kept separate from the idea of direction. Non-contact forces, such as magnets and static electricity, will be taught in Grades 3 through 5. (PS2.A, PS2.B, PS2.C, PS3.C)</p>	<ul style="list-style-type: none"> <li>• Song: Push and Pull</li> <li>• Book: Mr. Mario's Neighborhood</li> <li>• Push and Pull</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: How It Works</li> </ul>
<p>K.3.2 Analyze data to determine how a design solution causes a change in the speed or direction of an object with a push or a pull. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare and test designs. Examples of problems requiring a solution could include having a marble or other object move a certain distance, follow a particular path, or knock down other objects. (PS2.A, PS2.B, PS2.C, PS3.C, ETS1.A, ETS1.B, ETS1.C)</p>	<ul style="list-style-type: none"> <li>• Song: Push and Pull</li> <li>• Book: Mr. Mario's Neighborhood</li> <li>• Push and Pull</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: How It Works</li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>GRADE 1</b>		
<b>1.1: Seasons and Space Patterns</b>		
<p>1.1.1 Obtain, evaluate, and communicate information about the movement of the Sun, Moon, and stars to describe predictable patterns. Examples of patterns could include how the Sun and Moon appear to rise in one part of the sky, move across the sky, and set; or how stars, other than the Sun, are visible at night but not during the day. (ESS1.A)</p>	<ul style="list-style-type: none"> <li>• Songs: The Moon; Sun Blues</li> <li>• Book: Moon Song</li> <li>• Sun</li> <li>• Moon</li> <li>• Constellations</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: The Moon</li> </ul> <p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: The Sky Above Us</li> </ul>
<p>1.1.2 Obtain, evaluate, and communicate information about the patterns observed at different times of the year to relate the amount of daylight to the time of year. Emphasize the variation in daylight patterns at different times of the day and different times of the year. Examples could include varying locations and regions throughout the state, country, and world. (ESS1.B)</p>	<ul style="list-style-type: none"> <li>• Book: That’s What I Like: A Book About Seasons</li> <li>• Spring</li> <li>• Summer</li> <li>• Fall</li> <li>• Winter</li> </ul>	
<p>1.1.3 Design a device that measures the varying patterns of daylight. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare and test designs. Examples could include sundials for telling the time or tracking the movement of shadows throughout the day. (ESS1.B, ETS1.A, ETS1.B, ETS1.C)</p>	<ul style="list-style-type: none"> <li>• Book: My Family Campout</li> <li>• Light Exploration</li> <li>• Properties of Light</li> </ul>	

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>1.2: The Needs of Living Things and Their Offspring</b>		
<p>1.2.1 Plan and carry out an investigation to determine the effect of sunlight and water on plant growth. Emphasize investigations that test one variable at a time. (LS1.C)</p>	<ul style="list-style-type: none"> <li>• Song: Plants Are Growing</li> <li>• Sun</li> <li>• Water</li> <li>• Plant Experiment</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Light for Plants; Water for Plants</li> </ul> <p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Green and Growing</li> </ul>
<p>1.2.2 Construct an explanation by observing patterns of external features of living things that survive in different locations. Emphasize how plants and nonhuman animals, found in specific surroundings, share similar physical characteristics. Examples could include that plants living in dry areas are more likely to have thick outer coatings that hold in water, animals living in cold locations have longer and thicker fur, or most desert animals are awake at night. (LS1.A, LS1.D)</p>	<ul style="list-style-type: none"> <li>• Songs: Four Ecosystems; Plants Are Growing</li> <li>• Books: Where in the World Would You Go Today?; Animal Bodies</li> <li>• Functions of Plant Parts</li> <li>• Oceans</li> <li>• Mountains</li> <li>• Deserts</li> <li>• Rainforests</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Animals</li> </ul>
<p>1.2.3 Obtain, evaluate, and communicate information about the patterns of plants and nonhuman animals that are alike, but not exactly like, their parents. An example could include that most carrots are orange and shaped like a cone but may be different sizes or have differing tastes. (LS3.A, LS3.B)</p>	<ul style="list-style-type: none"> <li>• Books: George and Jack; A Seed Grows</li> <li>• Amphibians</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Traits</li> </ul>
<p>1.2.4 Construct an explanation of the patterns in the behaviors of parents and offspring which help offspring to survive. Examples of behavioral patterns could include the signals that offspring make such as crying, chirping, and other vocalizations or the responses of the parents such as feeding, comforting, and protecting the offspring. (LS1.B)</p>	<ul style="list-style-type: none"> <li>• Song: Animal Bodies</li> <li>• Animal Behavior</li> <li>• Animal Bodies</li> <li>• Mammals</li> </ul>	



UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
1.3: Light and Sound		
<p>1.3.1 Plan and carry out an investigation to show the cause and effect relationship between sound and vibrating matter. Emphasize that vibrating matter can make sound and that sound can make matter vibrate. (PS4.A)</p>	<ul style="list-style-type: none"> <li>• Song: Sound</li> <li>• Book: What Sounds Say</li> <li>• Sound Waves</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Sound</li> </ul>
<p>1.3.2 Use a model to show the effect of light on objects. Emphasize that objects can be seen when light is available to illuminate them or if they give off their own light. (PS4.B)</p>	<ul style="list-style-type: none"> <li>• Books: My Family Campout; Lightning Bugs</li> <li>• Light Properties</li> <li>• Properties of Light</li> </ul>	
<p>1.3.3 Plan and carry out an investigation to determine the effect of materials in the path of a beam of light. Emphasize that light can travel through some materials, can be reflected off some materials, and some materials block light causing shadows. Examples of materials could include clear plastic, wax paper, cardboard, or a mirror. (PS4.B)</p>	<ul style="list-style-type: none"> <li>• Book: My Family Campout</li> <li>• Light Properties</li> <li>• Properties of Light</li> </ul>	
<p>1.3.4 Design a device in which the structure of the device uses light or sound to solve the problem of communicating over a distance. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare and test designs. Examples of devices could include a light source to send signals, paper-cup-and-string telephones, or a pattern of drum beats. (PS4.C, ETS1.A, ETS1.B, ETS1.C)</p>	<ul style="list-style-type: none"> <li>• Song: Inventing</li> <li>• Books: I Want to Be a Scientist Like Thomas Edison; Inventions All Around</li> </ul>	

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>GRADE 2</b>		
<b>2.1: Changes In The Earth’s Surface</b>		
<p>2.1.1 Develop and use models illustrating the patterns of landforms and water on Earth. Examples of models could include valleys, canyons, or floodplains and could depict water in the solid or liquid state. (ESS2.B)</p>	<ul style="list-style-type: none"> <li>• Songs: Four Ecosystems; I Am Part of All I See</li> <li>• Books: Where in the World Would You Go Today?; Water Is All Around</li> <li>• Oceans</li> <li>• Mountains</li> <li>• Deserts</li> <li>• Rainforests</li> <li>• Water</li> </ul>	
<p>2.1.2 Construct an explanation about changes in Earth’s surface that happen quickly or slowly. Emphasize the contrast between fast and slow changes. Examples of fast changes could include volcanic eruptions, earthquakes, or landslides. Examples of slow changes could include the erosion of mountains or the shaping of canyons. (ESS1.C)</p>	<ul style="list-style-type: none"> <li>• Songs: The Four Seasons; Rock Cycle</li> <li>• Books: That’s What I Like: A Book About Seasons; Whatever the Weather; Fossils Under Our Feet</li> <li>• Rock Cycle</li> <li>• Fossils</li> <li>• Spring</li> <li>• Summer</li> <li>• Fall</li> <li>• Winter</li> <li>• Water</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Rocks</li> </ul>
<p>2.1.3 Design solutions to slow or prevent wind or water from changing the shape of land. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare and test designs. Examples of solutions could include retaining walls, dikes, windbreaks, shrubs, trees, and grass to hold back wind, water, and land. (ESS2.A, ESS2.C, ETS1.A, ETS1.B, ETS1.C)</p>	<p>Waterford encourages everyone to have writing, drawing, and art materials available for children’s creations.</p>	

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>2.2: Living Things and Their Habitats</b>		
<p>2.2.1 Obtain, evaluate, and communicate information about patterns of living things (plants and animals, including humans) in different habitats. Emphasize the diversity of living things in land and water habitats. Examples of patterns in habitats could include descriptions of temperature or precipitation and the types of plants and animals found in land habitats. (LS2.C, LS4.C, LS4.D)</p>	<ul style="list-style-type: none"> <li>• Songs: Animal Bodies; Four Ecosystems</li> <li>• Books: Animal Bodies; Where in the World Would You Go Today?</li> <li>• Ecosystems</li> <li>• Animal Bodies</li> <li>• Animal Behavior</li> <li>• Oceans</li> <li>• Mountains</li> <li>• Deserts</li> <li>• Rainforests</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: Places on Earth</li> </ul>
<p>2.2.2 Plan and carry out an investigation of the structure and function of plant and animal parts in different habitats. Emphasize how different plants and animals have different structures to survive in their habitat. Examples could include the shallow roots of a cactus in the desert or the seasonal changes in the fur coat of a wolf. (LS1.A, LS4.A, LS4.D)</p>	<ul style="list-style-type: none"> <li>• Songs: Animal Bodies; Plants Are Growing</li> <li>• Book: Animal Bodies</li> <li>• Ecosystems</li> <li>• Animal Bodies</li> <li>• Animal Behavior</li> <li>• Plant Parts</li> </ul>	
<p>2.2.3 Develop and use a model that mimics the function of an animal dispersing seeds or pollinating plants. Examples could include plants that have seeds with hooks or barbs that attach themselves to animal fur, feathers, or human clothing, or dispersal through the wind, or consumption of fruit and the disposal of the pits or seeds. (LS2.A)</p>	<p>Waterford encourages everyone to have writing, drawing, and art materials available for children’s creations.</p>	

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>2.2: Living Things and Their Habitats <i>continued</i></b>		
<p>2.2.4 Design a solution to a human problem by mimicking the structure and function of plants and/or animals and how they use their external parts to help them survive, grow, and meet their needs. Define the problem by asking questions and gathering information, convey designs through sketches, drawings, or physical models, and compare and test designs. Examples could include a human wearing a jacket to mimic the fur of an animal or a webbed foot to design a better swimming fin. (LS1.A, LS1.D, ETS1.A, ETS1.B, ETS1.C)</p>	<ul style="list-style-type: none"> <li>• Books: I Wish I Had Ears Like a Bat; Animal Bodies; Fawn Eyes</li> <li>• Deserts</li> </ul>	
<b>2.3: Properties of Matter</b>		
<p>2.3.1 Plan and carry out an investigation to classify different kinds of materials based on patterns in their observable properties. Examples could include sorting materials based on similar properties such as strength, color, flexibility, hardness, texture, or whether the materials are solids or liquids. (PS1.A)</p>	<ul style="list-style-type: none"> <li>• Songs: Matter; Solid or Liquid</li> <li>• Book: Pancakes Matter</li> <li>• Changes in Matter</li> <li>• Solid and Liquid</li> <li>• Solid, Liquid, Gas</li> <li>• Materials</li> <li>• Movement of Heat</li> <li>• States of Water</li> <li>• Rocks</li> </ul>	
<p>2.3.2 Construct an explanation showing how the properties of materials influence their intended use and function. Examples could include using wood as a building material because it is lightweight and strong or the use of concrete, steel, or cotton due to their unique properties. (PS1.A)</p>	<ul style="list-style-type: none"> <li>• Book: Warm Soup for Dedushka</li> <li>• Materials</li> <li>• Density Experiment</li> <li>• Movement of Heat</li> <li>• Heat Movement</li> </ul>	<p><b>Engagement:</b></p> <ul style="list-style-type: none"> <li>• Learning Together: How It Works</li> </ul>

UTAH STANDARDS	WATERFORD DIGITAL RESOURCES	WATERFORD TEACHER RESOURCES
<b>2.3: Properties of Matter <i>continued</i></b>		
<p>2.3.3 Develop and use a model to describe how an object, made of a small set of pieces, can be disassembled and reshaped into a new object with a different function. Emphasize that a great variety of objects can be built from a small set of pieces. Examples of pieces could include wooden blocks or building bricks. (PS1.A)</p>	<ul style="list-style-type: none"> <li>• Song: Inventing</li> <li>• Books: Inventions All Around; I Want to Be a Scientist Like Wilbur and Orville Wright</li> <li>• Inventions</li> </ul>	<ul style="list-style-type: none"> <li>• More to Explore Experiment: Recycling; Simple Machines</li> </ul>
<p>2.3.4 Obtain, evaluate, and communicate information about changes in matter caused by heating or cooling. Emphasize that some changes can be reversed and some cannot. Examples of reversible changes could include freezing water or melting crayons. Examples of irreversible changes could include cooking an egg or burning wood. (PS1.B)</p>	<ul style="list-style-type: none"> <li>• Books: Warm Soup for Dedushka; Pancakes Matter</li> <li>• Changes in Matter</li> <li>• Movement of Heat</li> <li>• States of Water</li> <li>• Heat Changes Water</li> <li>• Matter Experiment</li> </ul>	

## PRE-MATH & SCIENCE

### Math Books

Zero In My Toybox; One Day on the Farm; Two Feet; Look for Three; Four Fine Friends; Grandpa's Great Athlete: A Book About 5; Hide and Seek Six; Just Seven; Eight at the Lake; 9 Cat Night; Ten for My Machine; The Search for Eleven; The Tasty Number Twelve; Thirteen in My Garden; Fourteen Camel Caravan; Fifteen on a Spring Day; Dinner for Sixteen; The Seventeen Machine; Eighteen Carrot Stew; Nineteen Around the World; Twenty Clay Children; Poor Wandering 1; Snowy Twos Day; 1, 2, 3, 4 in the Jungle; Give Me 5; Suzy Ladybug; 7 Train; 8 Octopus Legs; Highway 9; 10 Astronauts; When I Saw 11; I Love the Number 12; 13 Clues; 14 Camels; Fun 15; 16 Ants; Counting to 17; 18 Carrot Stew; 19 Around the World; 20 Fingers and Toes

### Science Books

That's What I Like: A Book about Seasons; I Want to Be a Scientist Like Jane Goodall; Mr. Mario's Neighborhood; Mela's Water Pot; I Want to Be a Scientist Like Wilbur and Orville Wright; Follow the Apples!; I Want to Be a Scientist Like George Washington Carver; Guess What I Am; Where in the World Would You Go Today?; Star Pictures; I Wish I Had Ears Like a Bat; Creepy Crawlers

### Counting Songs

Asian Counting, Marching Band Counting, Flower Counting, Country Counting, Dixieland Counting, Funky Counting, Reggae Counting, Salsa Counting, Techno Counting, Bagpipe Counting, Counting on the Mountain

## Number Songs

Count to 31; Hotel 100; Zero Is a Big Round Hole; Poor Wandering 1; Snowy Twos Day; 1, 2, 3, 4 in the Jungle; Give Me 5; Suzy Ladybug; 7 Train; 8 Octopus Legs; Highway 9; 10 Astronauts; When I Saw 11; I Love the Number 12; 13 Clues; 14 Camels; Fun 15; 16 Ants; Counting to 17; 18 Carrot Stew; 19 Around the World; 20 Fingers and Toes

## BASIC MATH & SCIENCE

### Math & Science Books

One More Cat; Can You Guess? A Story for Two Voices; I Want to Be a Scientist Like Carl Linnaeus; I Want to Be a Scientist Like Antoni van Leeuwenhoek; Whatever the Weather; I Want to Be a Mathematician Like Sophie Germain; Water Is All Around; Mr. Romano's Secret: A Time Story; A Seed Grows; How Long is a Minute?; Marty's Mixed-up Mom; I Want to Be a Scientist Like Louis Pasteur; Pancakes Matter; Jump Rope Rhymes; Facts About Families; Fifteen Bayou Band; Hooray, Hooray for the One Hundredth Day!; Symmetry and Me; Animal Bodies; Everybody Needs to Eat; The Circus Came to Town; I Want to Be a Mathematician Like Thales; Bugs for Sale; Heads or Tails; Your Backyard; The Birds, the Beasts and the Bat; Halves and Fourths and Thirds; We All Exercise; Circus 20; Red Rock, River Rock; Painting by Number; I Want to Be a Scientist Like Joanne Simpson; Navajo Beads; Where in the World Would You Go Today?; I Want to Be a Scientist Like Wilbur and Orville Wright

## FLUENT MATH & SCIENCE

### Math & Science Books

The Snow Project; Chloe's Cracker Caper; What Sounds Say; Fossils Under Our Feet; The Boonville Nine; I Want to Be a Scientist Like Alexander von Humboldt; I Want to Be a Scientist Like Marie Curie; I Want to Be a Scientist Like Stephen Hawking; George and Jack; The Old Maple Tree; A Dinosaur's First Day; I Want to Be a Scientist Like Isaac Newton; My Family Campout; I Want to Be a Scientist Like Thomas Edison; Warm Soup for Dedushka; How Did the Chicken Cross the Road?; Inventions All Around; The Beginning of Numbers; I Want to Be a Mathematician Like Ada Byron Lovelace; Lightning Bells; Tyrannosaurus X 1; Halves and Fourths and Thirds; Navajo Beads; Red Rock, River Rock; I Want to Be a Mathematician Like Srinivasa Ramanujan; The Fraction Twins; Yangshi's Perimeter; I Want to Be a Mathematician Like Archimedes; Birds at My House; Painting by Number; The Fable Fair



## SUPPORT

*Professional Services offers a continuum of customizable services. Learn more [here](#).*

## CONTINUAL DEVELOPMENT

As a nonprofit research institute, [Waterford.org](http://Waterford.org) is continually developing resources with the latest research findings. Please note that this correlation is accurate as of the date on the cover.

## SPANISH FAMILY ENGAGEMENT RESOURCES

All Waterford books and many of the resources available to families at [mentor.waterford.org](http://mentor.waterford.org) can be found in Spanish or with Spanish support.

## SONGS

### Beginning Math Songs

Odd Todd and Even Steven; Salsa Counting; On the Bayou—Addition; Subtract Those Cars; More Than, Fewer Than; A Nice Addition; Marching Band Counting; Doubles 1-5; Multiply by 0

### Nursery Songs and Rhymes

Rhyming Words; A: The Apple Tree; B: Bluebird, Bluebird; C: Pat-a-Cake; D: Hey Diddle, Diddle; E: One Elephant Went Out to Play; F: The Farmer in the Dell; G: Ten Little Goldfish; H: All the Pretty Little Horses; I: Mother, Mother, I Am Ill; J: Jack and Jill; K: Three Little Kittens; L: Mary Had a Little Lamb; M: Little Miss Muffett; N: I Touch My Nose Like This (Spanish); O: Polly, Put the Kettle On; P: This Little Pig; Q: Quack, Quack, Quack; R: Little Rabbit (Chinese); S: Eensy, Weensy Spider; T: Tortillas, Tortillas (Spanish); U: The Bus; V: My Valentine; W: Wee Willie Winkie; X: A-hunting We Will Go; Y: Yankee Doodle

### Beginning Reading Songs

Comma, Comma, Comma; Homophone Monkey; Antonym Ant; Apples and Bananas; Old MacDonald's Vowels; ABC Show and Tell Sounds; ABC Tongue Twisters; ABC Picture Sounds; Sheep in the Shadows; C-K Rap; S Steals the Z; Blends; Blicky Licky Land; Apostrophe Pig; Capital Letters—Days; Charley Chick; Adjectives Describe; Lazy Letter Q; Nouns; Verbs; Adverbs; Irregular Verbs; Preposition Cat; Verbs that Link; Consonants; Pronouns, Sneaky Magic E; Silent Letters—G-H; Silent Letters—W; Drop Magic E; Bossy Mr. R; P-H and G-H Say Fff; Schwa Sound; Double the Fun; Strange Spelling; More Than One; Reading Detective—Peek at the Story

Many of these songs are available on the [Waterford.org YouTube channel](https://www.youtube.com/channel/UC...).

## WEEKLY HOMELINK NEWSLETTERS

Weekly newsletters (28 in all) are available for teachers to share with families. The newsletters explain what children are learning during the week and provide resources and activities to involve families.

## MATH HOMELINK NEWSLETTERS

Match, Position, Shapes, Counting, Patterns Sort, Size, Number Sense (1-10), Order (1-10), Count On, Measurement (length), Count Down, Addition (10), Numbers 11-15, Numbers 16-20

## SCIENCE HOMELINK NEWSLETTERS

The World Around Us (5 senses), Living Things (living v. non-living), Plants, Vertebrates, Invertebrates, The Sky Above Us (sun, moon, stars), Our Earth (recycle, ecosystems), How it Works (push/pull, solid/liquid, magnets, materials)

## READING HOMELINK NEWSLETTERS

### Alphabet Knowledge

#### Comprehension and Vocabulary

Sum Up: Remember Order, Sum Up: Remember Details, Peek at the Story, Guess and Check, Connect to Me, Build Knowledge

### Readiness Skills Letters

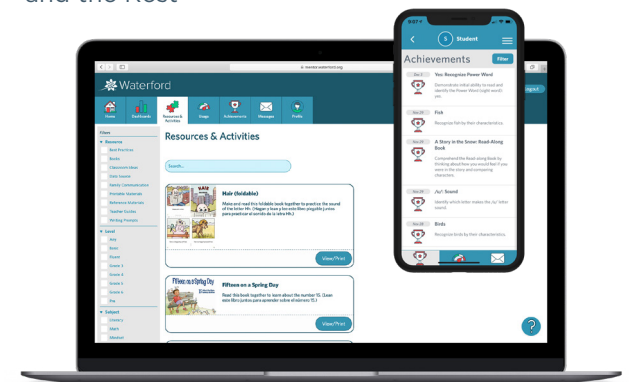
Naming Parts of the Body; First, Next, Last; One-to-One Correspondence; Opposites; Look at Details (identify same and different)

### Phonological Awareness Letters

What Is Rhyming?, Which Words Rhyme?, Sentences Are Made Up of Words, Making Compound Words, Breaking Compound Words, What Is a Syllable?, Put Syllables Together to Make Words, Break Words into Syllables, The First Sound in a Word, Words with the Same First Sound, Making Words from First Sounds and the Rest

## WATERFORD MENTOR

*Waterford Mentor is a secure website where families can log in to see their child's usage and learning achievements. Waterford families also receive short messages with ideas on how to engage in their child's learning and have access to hundreds of resources and activities.*



Waterford Mentor is available online and in the Mentor app (for iOS and Android).