

# GRADE FOUR GRADE LEVEL STANDARDS

## ENGLISH LANGUAGE ARTS

### LANGUAGE

- ◆ Follow agreed-upon rules for class discussion and/or in self-run small group discussions.
- ◆ Contribute knowledge to class discussion in order to develop ideas for a class project and generate interview questions to be used as part of the project.
- ◆ Give oral presentations about experiences or interests using eye contact, proper place, adequate volume, and clear pronunciation.
- ◆ Make informal presentations that have a recognizable organization (sequencing, summarizing).
- ◆ Express an opinion of a literary work or film in an organized way, with supporting detail.
- ◆ Use teacher-developed assessment criteria to prepare their presentations.
- ◆ Identify the meaning of common prefixes (un-,re-,dis-).
- ◆ Identify the meaning of common idioms and figurative phrases.
- ◆ Identify playful uses of language (puns, jokes, palindromes).
- ◆ Determine the meaning of unknown words using their context.
- ◆ Recognize and use words with multiple meanings (sentence, school, hard) and be able to determine which meaning is intended from the context of the sentence.
- ◆ Determine meanings of words and alternate word choices using a dictionary or thesaurus.
- ◆ Identify and apply the meaning of the term's antonym, synonym, and homophone.
- ◆ Recognize the subject-predicate relationship in sentences.
- ◆ Identify the four basic parts of speech (adjective, noun, verb, adverb).
- ◆ Identify correct mechanics (end marks, commas for series, capitalization), correct usage (subject and verb agreement in a simple sentence) and correct sentence structure (elimination of sentence fragments).
- ◆ Identify words or word parts from other languages that have been adopted into the English language.
- ◆ Recognize dialect in the conversational voices in American folk tales.
- ◆ Identify formal and informal language use in advertisements read, heard, and/or seen.

### READING & LITERATURE

- ◆ Use letter-sound knowledge to decode written English.
- ◆ Read grade-appropriate imaginative/literary and informational/expository text with comprehension (see General Standard).
- ◆ Read aloud grade-appropriate imaginative/literary and informational/expository text fluently, accurately, and with comprehension, using appropriate timing, change in voice, and expression.

#### For imaginative/literary texts:

- ◆ Identify and show the relevance of foreshadowing clues.
- ◆ Identify sensory details and figurative language.
- ◆ Identify the speaker of a poem or story.
- ◆ Make judgments about setting, characters, and events and support them with evidence from the text.

#### For informational/expository texts:

- ◆ Locate facts that answer the reader's questions.
- ◆ Distinguish cause from effect.
- ◆ Distinguish fact from opinion or fiction.
- ◆ Summarize main ideas and supporting details.
- ◆ Identify similarities and differences between the characters or events in a literary work and the actual experience in an author's life.
- ◆ Distinguish among forms of literature such as poetry, fiction, nonfiction, and drama and apply this knowledge as a strategy for reading and writing.
- ◆ Identify themes as lessons in folktales, fables, and Greek myths for children.
- ◆ Identify and analyze the elements of plot, character, and setting in the stories they read and write.
- ◆ Identify and use knowledge of common textual features (paragraphs, topic sentences, concluding sentences, glossary).
- ◆ Identify and use knowledge of common graphic features (charts, maps, diagrams, illustrations).
- ◆ Identify and use knowledge of common organizational structures (chronological order).
- ◆ Locate facts that answer the reader's questions.
- ◆ Distinguish cause from effect.
- ◆ Distinguish fact from opinion.
- ◆ Summarize main ideas and supporting details.

- ◆ Identify rhyme and rhythm, repetition, similes, and sensory images in poems.
- ◆ Identify imagery, figurative language, rhythm, or flow when responding to literature.
- ◆ Identify and analyze the elements of plot and character, as presented through dialogue in scripts that are read, viewed, written, or performed.
- ◆ Plan and perform readings of selected texts for an audience, using clear diction and voice quality (volume, tempo, pitch, tone appropriate to the selection, and use teacher-developed assessment criteria to prepare presentations.

## **COMPOSITION**

### **For imaginative/literary writing:**

- ◆ Write stories that have a beginning, middle, and end and contain details of setting.
- ◆ Write short poems that contain simple sense details.

### **For informational/expository writing:**

- ◆ Write brief summaries of information gathered through research.
- ◆ Write a brief interpretation or explanation of a literary or informational text using evidence from the text as support.
- ◆ Write an account based on personal experience that has a clear focus and sufficient supporting detail.
- ◆ Use appropriate language for different audiences (other students, parents) and purposes (letter to a friend, thank you note, invitation).
- ◆ Revise writing to improve level of detail after determining what could be added or deleted.
- ◆ Improve word choice by using dictionaries.
- ◆ Write legibly in cursive, leaving space between letters in a word and between words in a sentence.
- ◆ Use knowledge of correct mechanics (end marks, commas for series, capitalization), usage (subject and verb agreement in a simple sentence), and sentence structure (elimination of fragments) when writing and editing.
- ◆ Use knowledge of letter sounds, word parts, word segmentation, and syllabication to monitor and correct spelling.
- ◆ Spell most commonly used homophones correctly in their writing (there, they're, their, two, too, to).
- ◆ Organize plot events of a story in an order that leads to a climax.
- ◆ Organize ideas for a brief response to a reading.
- ◆ Organize ideas for an account of personal experience in a way that makes sense.
- ◆ Identify and apply steps in conducting and reporting research:
  - a) Define the need for information and formulate open-ended research questions.
  - b) Initiate a plan for searching for information.
  - c) Locate resources.
  - d) Evaluate the relevance of the information.
  - e) Interpret, use, and communicate the information.
  - f) Evaluate the research project as a whole.
- ◆ As a group, develop and use scoring guides or rubrics to improve organization and presentation of written and oral projects.

## **MATH**

### **NUMBER SENSE & OPERATION**

- ◆ Exhibit an understanding of the base ten number system by reading, modeling, writing, and interpreting whole numbers to at least 100,000; demonstrating an understanding of the values of the digits; and comparing and ordering the numbers
- ◆ Represent, order, and compare large numbers (to at least 100,000) using various forms, including expanded notation.
- ◆ Demonstrate an understanding of fractions as parts of unit wholes, as parts of a collection, and as locations on the number line.
- ◆ Select, use, and explain models to relate common fractions ( $\frac{1}{2}$ ,  $\frac{1}{3}$ ,  $\frac{1}{4}$ ,  $\frac{1}{5}$ ,  $\frac{1}{6}$ ,  $\frac{1}{8}$ ,  $\frac{1}{10}$ ), mixed numbers and decimals, and order them.
- ◆ Identify and generate through models equivalent forms of common decimals and fractions less than one whole (halves, quarters, fifths, and tenths).
- ◆ Select, use, and explain various meaning and models of multiplication and division of whole numbers. Understand and use the inverse relationship between the two operations.
- ◆ Select, use, and explain the principals of commutative, associative, and identity properties of operations on whole numbers in problem situations.
- ◆ Select, use, and explain the principles of commutative, associative, and identity properties of operations on whole numbers in problem situations.
- ◆ Select and use appropriate operations (addition, subtraction, multiplication, and division) to solve problems, including those involving money.
- ◆ Know multiplication facts through  $10 \times 10$  and related division facts. Use these facts to solve related multiplication problems (e.g.,  $e \times 5$  is related to  $30 \times 50$ ,  $300 \times 5$ , and  $30 \times 500$ ).
- ◆ Round whole numbers through 100,000 to the nearest 10, 100, 1000, 10,000, and 100,000.
- ◆ Select and use a variety of strategies (e.g., front-end, rounding, and regrouping) to estimate quantities, measures, and the results of whole-number computations up to three-digit whole numbers and amounts of money to \$1000, and to judge the reasonableness of the answer.

- ◆ Apply a variety of mental math and estimation strategies to problems involving multiplication and division up to 2 digit whole numbers and amounts of money up to \$100.
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## **MEASUREMENT**

- ◆ Using concrete materials, carry out simple unit conversions within a system of measurement, e.g., hours to minutes, cents to dollars, yards to feet or inches, etc.
- ◆ Estimate and find area and perimeter of a rectangle, triangle, or irregular shape using diagrams, models, and grids or by measuring.
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## **DATA AND PROBABILITY**

- ◆ Collect, organize, display and analyze data.
- ◆ Represent the possible outcomes for a simple chance situation, e.g., the probability of drawing a red marble from a bag containing three red marbles and four green marbles.

## **PATTERNS, RELATIONS, AND ALGEBRA**

- ◆ Use pictures, models, tables, charts, graphs, words, number sentences, and mathematical notations to interpret mathematical relationships.
- ◆ Determine values of variables in an equation.

## **GEOMETRY**

- ◆ Compare and analyze attributes and other features (e.g., number of sides, faces, corners, right angles, diagonals, and symmetry) of two- and three-dimensional geometric shapes.
- ◆ Describe, model, draw, compare, and classify two- and three-dimensional shapes, e.g., circles, polygons—especially triangles and quadrilaterals—cubes, spheres, and pyramids.
- ◆ Recognize similar figures.
- ◆ Identify angles as acute, right, or obtuse.
- ◆ Describe and draw intersecting, parallel, and perpendicular lines.
- ◆ Describe and apply techniques such as reflections (flips).
- ◆ Identify and describe line symmetry in two-dimensional shapes.

## **SOCIAL STUDIES**

### **HISTORY**

- ◆ Describe the diverse nature of the American people by identifying the distinctive contributions to American culture.

### **GEOGRAPHY**

- ◆ Use a map and globe skills to determine absolute locations (latitude and longitude) of places studied.
- ◆ Identify the locations of the North and South Poles, the Equator, Prime Meridian and the Northern, Southern, Eastern and Western Hemispheres.
- ◆ Interpret a map using information from its title, compass rose, scale and legend.
- ◆ Observe and describe national historic sites and describe their function and significance.
- ◆ On a map of the world, locate North America. On a map of North America, locate the United States, the Atlantic and Pacific Oceans, and other important bodies of water and mountain ranges.
- ◆ On a map of North America, locate the present boundaries of the United States (including Alaska and Hawaii). Locate the Northeastern, Middle Atlantic, Southeastern, Midwestern, Southwestern and Northwestern regions of the United States.
- ◆ Identify the states and state capitals.
- ◆ Describe the climate, major physical features and major natural resources in each region.
- ◆ Identify and describe unique features of the United States: for example, the Grand Canyon.

### **ECONOMICS**

- ◆ Define and give examples of natural resources in the United States.
- ◆ Give examples of limited and unlimited resources and explain how scarcity compels people and communities to make choices about goods and services, giving up some things to get other things.

## **SCIENCE**

### **EARTH & SPACE SCIENCE**

- ◆ Explain how air temperature, moisture, wind speed and direction, and precipitation make up the weather in a particular place and time.
- ◆ Distinguish among the various forms of precipitation (rain, snow, sleet, and hail), making connections to the weather in a particular place and time.
- ◆ Differentiate between weather and climate.
- ◆ Describe how water on earth cycles in different forms and in different locations, including underground and in the atmosphere.
- ◆ Give examples of how the cycling of water, both in and out of the atmosphere, has an effect on climate.
- ◆ Recognize that the earth revolves around (orbits) the sun in a year's time and that the earth rotates on its axis once approximately every 24 hours. Make connections between the rotation of the earth and day/night, and the apparent movement of the sun, moon, and stars across the sky.
- ◆ Describe the changes that occur in the observable shape of the moon over the course of a month.

#### **LIFE SCIENCE (BIOLOGY)**

- ◆ Classify plants and animals according to the physical characteristics they share.
- ◆ Identify the structures in plants (leaves, roots, flowers, stem, bark, wood) that are responsible for food production, support, water, transport, reproduction growth and protection.
- ◆ Recognize that plants and animals go through predictable life cycles that include birth, growth, development, reproduction, and death.
- ◆ Describe the major stages that characterize the life cycle of the frog and butterfly as they go through metamorphosis.
- ◆ Give examples of how inherited characteristics may change over time as adaptations to changes in the environment that enable organisms to survive, e.g., shape of beak or feet, placement of eyes on the head, length of neck, shape of teeth, color.
- ◆ Describe how organisms meet some of their needs in an environment by using behaviors (patterns of activities) in response to information (stimuli) received from the environment. Recognize that some animal behaviors are instinctive (e.g., turtles burying their eggs), and others are learned (e.g., humans building fires for warmth, chimpanzees learning how to use tools).
- ◆ Describe how energy derived from the sun is used by plants to produce sugars (photosynthesis) and is transferred within a food chain from producers (plants) to consumers to decomposers.

#### **PHYSICAL SCIENCE (CHEMISTRY & PHYSICS)**

- ◆ Differentiate between properties of objects (e.g., size, shape, weight) and properties of materials (e.g., color, texture, hardness).
- ◆ Compare and contrast solids, liquids, and gases based on the basic properties of each of these states of matter.
- ◆ Describe how water can be changed from one state to another by adding or taking away heat.

### **ART**

#### **MEDIA, MATERIALS AND TECHNIQUES**

- ◆ Use a variety of materials and media, for example, crayons, chalk, paint, clay, various kinds of papers, textiles and yarns and understand how to use them to produce different visual effects.
- ◆ Create artwork in a variety of two-dimensional (2D) and three-dimensional (3D) media, for example: 2D - drawing, painting, collage, printmaking, weaving; 3D - plastic (malleable) materials such as clay and paper, wood or found objects for assemblage and construction.
- ◆ Learn and use appropriate vocabulary related to methods, materials and techniques.
- ◆ Learn to take care of materials and tools and to use them safely.

#### **ELEMENTS AND PRINCIPALS OF DESIGN**

- ◆ For color, explore and experiment with the use of color in dry and wet media
  - a. Identify primary and secondary colors and gradations of black, white and gray in the environment and artwork.
  - b. Explore how color can convey mood and emotion. For example, students mix light and dark values of colors and predict the results of overlapping and blending primary colors.
- ◆ For line, explore the use of line in 2D and 3D work. Identify a wide variety of types of lines in the environment and artwork. For example, students take a walk around the school and note jagged, straight, curved thick and thin lines.
- ◆ For texture, explore the use of texture in 2D and 3D works. Identify a wide variety of types of textures, for example, smooth, rough and bumpy in the environment and in artwork. Create representations of textures in drawings, paintings, rubbings or relief.
- ◆ For shape and form, explore the use of shapes and forms in 2D and 3D works. Manipulate deliberate choice between organic versus geometric. Identify simple shapes of different sizes; for example, circles, squares, triangles and forms; for example spheres, cones, and cubes, in the environment and artwork.
- ◆ For pattern and symmetry, explore the use of patterns and symmetrical forms and shapes in 2D and 3D works. Identify patterns and symmetrical forms and shapes in the environment and artwork. Explain and demonstrate ways in which patterns and symmetrical shapes can be made. For example, a student folds and cuts paper to achieve symmetry, or makes printed patterns.
- ◆ For space and composition, explore composition by creating artwork with a center of interest, repetition and/or balance. Demonstrate an understanding of foreground, middle ground and background. Define and identify occurrences of balance, rhythm, repetition, variety and emphasis.

#### **OBSERVATION, ABSTRACTION, INVENTION AND EXPRESSION**

- ◆ Create 2D and 3D artwork from direct observation. For example, students draw a still life of flowers or fruit, action studies of their classmates in sports poses, or sketches of the class pet having a snack or nap.

- ◆ Create 2D and 3D expressive artwork that explores abstraction. For example, a student simplifies an image by making decisions about essential colors, lines or textures.
- ◆ Create 2D and 3D artwork from memory or imagination to tell a story or embody an idea of fantasy. For example, students draw members of a family from memory; illustrate a character in a folktale or play; build a clay model of an ideal place to play; or make images that convey ideas such as friendship

#### **DRAFTING, REVISING AND EXHIBITING**

- Select a work or works created during the year and discuss them with a parent, classmate or teacher, explaining how the work was made and why it was chosen for discussion. For example, a first grader
  - ◆ chooses a painting and tells how she mixed colors and talks about decisions she made.
  - ◆ Select works for exhibition and work as a group to create a display.
  - ◆ As a class, develop and use criteria for informal classroom discussions about art.

#### **CRITICAL RESPONSE**

- ◆ In the course of making and viewing art, learn ways of discussing it, such as by making a list of all the images seen in artwork (visual inventory); and identifying kinds of color, line, texture, shapes and forms in the work.
- ◆ Classify artworks into general categories, such as painting, printmaking, collage, sculpture, pottery, textiles, architecture, photography and film.
- ◆ Describe similarities and differences in works, and present personal responses to the subject matter, materials, techniques and use of design elements in artworks.
- ◆ Explain strengths and weaknesses in their own work and share comments constructively and supportively with in the group.

### **MUSIC**

#### **PERFORMANCE SKILLS**

- ◆ Produce a steady beat; know sixteenth note rhythm; sing more complex parts matching pitch and holding the part using singing syllables solfège; perform simple set and folk dances, play musical games; start-stop a group using conductor skills.

#### **MUSICAL CONCEPTS**

- ◆ Read notes on the treble clef staff; learn and read 2 parts using expression marks in increasing complexity; explain how the elements of rhythm, beat and pitch are used.
- ◆ Learn music vocabulary of elements of music; terms used with harmony (partner songs, ostinato), 3/4 meter.
- ◆ Be familiar with the historical background of Beethoven and the African-American multicultural traditions.
- ◆ View and discuss the acoustical classification and study of instruments. Understand how sound is produced explore/begin science of acoustics. Create instrument which makes sound pitched/unpitched instruments deliberate choice.

#### **CREATING**

- ◆ Improvise as a necessary step in composition, in large and small group settings.
- ◆ Compose a 16-beat minimum composition with rhythmic accompaniment.
- ◆ Move creatively in an appropriate manner to the mood and style of a piece.
- ◆ Perform student compositions.

### **PHYSICAL EDUCATION**

- ◆ Demonstrate sportsmanship through verbal and non-verbal behavior for all activities.
- ◆ Demonstrate positive feelings toward physical activity.

#### **Personal Fitness: Gymnastics**

- ◆ Demonstrate the ability to transfer weight from hands to feet at a variety of speeds.
- ◆ Analyze and correct performance problems.
- ◆ Excel in controlling body weight during a variety of activities.
- ◆ Demonstrate the ability to control the body while balancing on a variety of apparatus.

#### **Personal Fitness: Dance (Aerobic)**

- ◆ Develop and increase muscular strength through appropriate activity.
- ◆ Identify health benefits that can be gained from participation in physical activity.

#### **Personal Fitness: Tennis Skills**

- ◆ Consistently demonstrate and use appropriate grip and swing while participating in tennis activities.

#### **Personal Fitness: Track and Field**

- ◆ Interact with other students in the celebration of personal success as well as the achievements of others

- ◆ Demonstrate the use of mature form while practicing jumping for distance as well as height.

**Group Fitness: Dance (Creative/Folk)**

- ◆ Demonstrate a creative dance sequence with a repeatable pattern.

**Group Fitness: Basketball**

- ◆ Recognize the critical elements of a throw and provide other students with feedback.
- ◆ Demonstrate proper technique while dribbling and passing a basketball to a moving receiver.

**Group Fitness: Football**

- ◆ Recognize the critical elements of a throw and provide other students with feedback.
- ◆ Demonstrates the ability to throw, catch and kick using mature form.

**Group Fitness: Lacrosse**

- ◆ Analyze and correct individual performance problems.

**Group Fitness: Soccer, Pillo Polo, Volleyball, Softball, Whiffleball, Kickball**

- ◆ Demonstrate appropriate grip and wing while participating in striking activities.
- ◆ Show improvement in striking activities over the course of the unit.
- ◆ Analyze and correct individual performance problems.

**HEALTH**

- ◆ Understand and describe the difference between communicable and non-communicable diseases.
- ◆ Recognize symptoms of illness.
- ◆ Explain the purpose and function of proper hygiene like washing one's hands
- ◆ Describe how the body fights germs and disease naturally and with medicines and immunizations.
- ◆ Demonstrate awareness of safety rules for home, bus, car, school, and sports.
- ◆ Describe what resource to use in an emergency.
- ◆ Recognize personal responsibility in avoiding accidents.
- ◆ Identify positive and negative feelings and emotions.
- ◆ Demonstrate ways to appropriately express positive and negative feelings.
- ◆ Recognize social competencies within a school community.
- ◆ Develop strategy for healthy choice when presented with a problem situation.
- ◆ Understand how choices directly affect the body.
- ◆ Identify the parts of the nervous system with appropriate technical terms.
- ◆ Communicate how a message travels within the central nervous system.
- ◆ Name the parts of the respiratory system and describe function.
- ◆ Explain connection between respiratory system with circulatory system.
- ◆ Identify some external factors and personal choices that affect functioning of the respiratory system.
- ◆ Explain how to locate own pulse.
- ◆ Locate and label specific parts of the circulatory system.
- ◆ Illustrate the heart and blood path through it.
- ◆ Explain the relationship of circulatory system with the respiratory system.
- ◆ Define the difference between prescription drugs and over-the-counter drugs.
- ◆ Describe the difference between use and abuse of legal drugs.
- ◆ Explain the effect of tobacco and smoke on the body.
- ◆ Explain how to read a product label.
- ◆ Describe the message being sent to consumers by manufacturers through advertisements.
- ◆ Describe and explain the Food Pyramid.
- ◆ Recognize that some foods are better for the body than others.
- ◆ Explain how food amounts change at different times in life.