

SCIENCE

Nature of Science

- defines a problem, uses appropriate reference materials to support scientific understanding, plans and carries out scientific investigations of various types such as: systematic observations, experiments requiring the identification of variables, collecting and organizing data, interpreting data in charts, tables, and graphics, analyze information, make predictions, and defend conclusions
- recognizes and explains the need for repeated experimental trials
- identifies a control group and explains its importance in an experiment
- recognizes and explains that when scientific investigations are carried out, the evidence produced by those investigations should be replicable by others

Earth and Space Science

- recognizes the major common characteristics of all planets and compare/contrast the properties of inner and outer planets
- distinguishes among the following objects of the Solar System—Sun, planets, moons, asteroids, comets—and identifies Earth's position in it
- creates a model to explain the parts of the water cycle. Water can be a gas, a liquid, or a solid and can go back and forth from one state to another
- recognizes how air temperature, barometric pressure, humidity, wind speed and direction, and precipitation determine the weather in a particular place and time
- designs a family preparedness plan for natural disasters and identify the reasons for having such a plan

Physical Science

- compares and contrasts the basic properties of solids, liquids, and gases, such as mass, volume, color, texture, and temperature
- investigates and identifies materials that will dissolve in water and those that will not and identifies the conditions that will speed up or slow down the dissolving process
- explores the scientific theory of atoms (also called atomic theory) by recognizing that all matter is composed of parts that are too small to be seen without magnification
- investigates and explains that an electrically charged object can attract an uncharged object and can either attract or repel another charged object without any contact between the objects
- investigates and illustrates the fact that the flow of electricity requires a closed circuit (a complete loop)
- identifies familiar forces that cause objects to move, such as pushes or pulls, including gravity acting on falling objects

Life Science

- identifies the organs in the human body and describe their functions, including the skin, brain, heart, lungs, stomach, liver, intestines, pancreas, muscles and skeleton, reproductive organs, kidneys, bladder, and sensory organs
- describes how, when the environment changes, differences between individuals allow some plants and animals to survive and reproduce while others die or move to new locations
- compares and contrasts adaptations displayed by animals and plants that enable them to survive in different environments such as life cycles variations, animal behaviors, and physical characteristics

*** Ideas for Helping Your Child at Home ***

- ☺ Parents can ask their children how they would test an experiment and create hypothesis for a scientific question
- ☺ Reading information texts together
- ☺ While cooking pasta, have your child observe how water in a pot boils, create vapor, and then condenses into water droplets. Discuss how this models the water cycle
- ☺ Have your child help to make powdered beverages (lemonade, Kool Aid, etc.) and discuss how the powder changes the beverage

What Your Child is Expected to Learn...



5th Grade

A Representative Sample of Expectations by Grade Level

For a complete list of the state-adopted standards, please go to the keyword search tab at: <http://www.cpalms.org/Standards/FLStandardSearch.aspx>

Dear Parents,

The mission of Brevard Public Schools is “to serve every student with excellence as the standard.” Our elementary schools work toward this goal each school day by ensuring that every child has exciting and meaningful learning experiences. We expect all of our students to learn and demonstrate increasingly complex skills as they progress through the grades toward the goal of becoming responsible and productive adults. Toward this end, I am pleased to share with you a representative sample of the learning expectations for your child this year. These sample learning expectations are stated within the B.E.S.T ELA/Math state standards from the Florida Department of Education.

These benchmarks and standards provide focus and consistency for teachers and students and offer parents and community members a clear view of a school's expectations for student learning. The parent's role in supporting children's educational progress is increasingly important in our rapidly changing world. I urge you to review these expectations and to take advantage of opportunities to provide rewarding learning experiences for your child each day.

I wish your child a successful school year!

Sincerely,

Dr. Wendy Smith

Dr. Wendy Smith, Director
Elementary Programs

For a complete list of standards, go to the subject area links at:
<https://www.brevardschools.org/o/bps/page/grade-level-expectations>

What Your Child is Expected to Learn in Fifth Grade 2024-2025

ENGLISH LANGUAGE ARTS

Reading

- reads grade-level text fluently and accurately
- analyzes how setting, events, conflict, and characterization contribute to the plot
- explains the development of stated or implied theme(s)
- describes how an author develops a character’s perspective
- explains how figurative language and other poetic elements work together in a poem
- explains how text structures and/or features contribute to the meaning
- explains how details support the implied or stated central idea(s)
- analyzes an author’s purpose and/or perspective
- tracks the development of an argument, identifying specific claim(s), evidence, and reasoning
- analyzes how figurative language contributes to meaning
- makes inferences to support comprehension
- summarizes a text to enhance comprehension
- compares and contrasts primary and secondary sources related to the same topic

Communication

- demonstrates fluent and legible cursive
- engages in collaborative discussions
- uses appropriate voice and tone when speaking and writing
- cites evidence to explain and justify reasoning
- presents information orally in a logical sequence with nonverbal cues (ex. posture, tone, expression), appropriate volume, clear pronunciation, and appropriate pacing
- writes detailed narratives, opinions, and expository products
- improves writing by planning, revising, and editing
- follows the rules of standard English grammar, punctuation, capitalization, and spelling appropriate to the grade level (students are expected to use conventions from previous years):
 - *uses principal modals to indicate the mood of a verb*
 - *uses appositives, main clauses, and subordinate clauses*
 - *recognizes and corrects inappropriate shifts in tense and number*
 - *uses conjunctions correctly to join words and phrases in a sentence*
- conducts research to answer a question, organizing information about the topic, using multiple reliable and valid sources

Vocabulary

- applies knowledge of Greek and Latin roots and affixes, recognizing the connection between affixes and parts of speech, to determine the meanings of unfamiliar words in grade-level content
- uses context clues, figurative language, word relationships, reference materials, and/or background knowledge to determine the meaning of multiple-meaning and unknown words and phrases, appropriate to 5th grade
- uses grade-level academic vocabulary appropriately in speaking and writing

*** Ideas for Helping Your Child at Home ***

- ☺ Read to and with your child using a variety of texts
- ☺ Encourage discussions at mealtimes, in the car, etc.
- ☺ Involve your child in family chores
- ☺ Encourage your child to respond to text through writing, drawing, etc. to convey the understanding of the main idea
- ☺ Take your child to the library
- ☺ Make a variety of text available to your child at home

MATHEMATICS

Number Sense and Operations

- expresses how the value of a digit in a multi-digit number with decimals to the thousandths changes if the digit moves one or more places to the left or right.
- reads and writes multi-digit numbers with decimals to the thousandths using standard form, word form, and expanded form.
- composes and decomposes multi-digit numbers with decimals to the thousandths in multiple ways using the values of the digits in each place; demonstrates the compositions or decompositions using objects, drawings, and expressions or equations.
- plots, orders, and compares multi-digit numbers with decimals up to the thousandths.
- rounds multi-digit numbers with decimals to the thousandths to the nearest hundredth, tenth, or whole number.
- multiplies multi-digit whole numbers including using a standard algorithm with procedural fluency.
- divides multi-digit whole numbers, up to five digits by two digits, including using a standard algorithm with procedural fluency, and represents remainders as fractions.
- adds and subtracts multi-digit numbers with decimals to the thousandths, using a standard algorithm with procedural fluency.
- explores the multiplication and division of multi-digit numbers with decimals to the hundredths using estimation, rounding, and place value.
- multiplies and divides a multi-digit number with decimals to the tenths by one-tenth and one-hundredth with procedural reliability.

Fractions

- given a mathematical or real-world problem, represents the division of two whole numbers as a fraction.
- adds and subtracts fractions with unlike denominators, including mixed numbers and fractions greater than one, with procedural reliability.
- extends previous understanding of multiplication to multiply a fraction by a fraction, including mixed numbers and fractions greater than one, with procedural reliability.
- when multiplying a given number by a fraction less than one or a fraction greater than one, predicts and explains the relative size of the product to the given number without calculating.
- extends previous understanding of division to explore the division of a unit fraction by a whole number and a whole number by a unit fraction.

Algebraic Reasoning

- solves multi-step real-world problems involving any combination of the four operations with whole numbers, including problems in which remainders must be interpreted within terms of the context.
- solves real-world problems involving the addition, subtraction, or multiplication of fractions, including mixed numbers and fractions greater than one.
- solves real-world problems involving division of a unit fraction by a whole number and a whole number by a unit fraction.
- translates written real-world and mathematical descriptions into numerical expressions and numerical expressions into written mathematical descriptions.
- evaluates multi-step numerical expressions using order of operations.
- determines and explains whether an equation involving any of the four operations is true or false.
- given a mathematical or real-world context, determines an equation involving any of the four operations to determine the unknown whole number with the unknown in any position.
- given a numerical pattern, identifies and writes a rule that can describe the pattern as an expression.
- given a rule for a numerical pattern, uses a two-column table to record the inputs and outputs.

Measurement

- solves multi-step real-world problems that involve converting measurement units to equivalent measurements within a single system of measurement.
- solves multi-step real-world problems involving money using decimal notation.

Geometric Reasoning

- classifies triangles or quadrilaterals into different categories based on shared defining attributes; explains why a triangle or quadrilateral would or would not belong to a category.
- identifies and classifies three-dimensional figures into categories based on their defining attributes; figures are limited to right pyramids, right prisms, right circular cylinders, right circular cones, and spheres.
- finds the perimeter and area of a rectangle with fractional or decimal side lengths using visual models and formulas.
- explores volume as an attribute of three-dimensional figures by packing them with unit cubes without gaps; finds the volume of a right rectangular prism with whole-number side lengths by counting unit cubes.
- finds the volume of a right rectangular prism with whole-number side lengths using a visual model and a formula.
- solves real-world problems involving the volume of right rectangular prisms, including problems with an

unknown edge length, with whole-number edge lengths using a visual model or a formula; writes an equation with a variable for the unknown to represent the problem.

- identifies the origin and axes in the coordinate system; plots and labels ordered pairs in the first quadrant of the coordinate plane.
- represents mathematical and real-world problems by plotting points in the first quadrant of the coordinate plane and interpreting coordinate values of points in the context of the situation.

Data Analysis and Probability

- collects and represents numerical data, including fractional and decimal values, using tables, line graphs, or line plots.
- interprets numerical data, with whole-number values, represented with tables or line plots by determining the mean, mode, median, or range.

*** Ideas for Helping Your Child at Home ***

- ☺ Engage your child in situations that require thinking and problem-solving
- ☺ Ask your child to share the strategies s/he used when solving problems
- ☺ Have your child measure various objects and then order them according to these measurements
- ☺ Discuss various graphs found in newspapers
- ☺ Ask your child to do some of the hands-on activities s/he is doing in class with you

SOCIAL STUDIES

American History

- uses primary and secondary resources to understand history
- compares cultural aspects of Pre-Columbian North America
- describes the exploration and settlement patterns of North America
- compares characteristics of colonization of North America
- identifies and explains significant events of the American Revolution and the birth of the new nation
- identifies and explains significant events of growth and westward expansion in the United States

Geography

- constructs maps, charts, and graphs to display geographic information
- describes factors that influenced boundary changes within the United States
- describes natural events that impacted human and physical environments in the United States
- uses geographic knowledge and skills in real-life problem solving

Economics

- identifies how trade promoted economic growth in North America
- describes characteristics of a market economy
- recognizes the positive and negative effects of trade among Native Americans, European explorers, and colonists

Civics and Government

- understands the foundations of government, law, and the American Political system
- knows key elements of documents created to support the United States (Declaration of Independence, Articles of Confederation, the Constitution, and Bill of Rights)
- compares forms of political participation in the colonial period to today
- evaluates the importance of civic responsibilities in American democracy
- describes the organizational structure and powers of the federal government as defined in Articles I, II, and III of the U.S. Constitution

*** Ideas for Helping Your Child at Home ***

- ☺ Read a novel based on American history with your child and discuss the story together.
- ☺ Visit national monuments and historical sites with your child
- ☺ Read the Constitution to your child and talk about how it organized our national government and its functions
- ☺ Discuss current events with your child