Roy & Dora

Whitman Academy

Grade Three

Standards Booklet

This booklet was developed for parents and teachers as part of The Roy & Dora Whitman Academy commitment to high standards of educational excellence. We want parents to be able to partner with us to support their children's achievement of the knowledge, skills and understandings that should be accomplished by the end of each grade level. The Roy & Dora Whitman Academy standards were developed by adapting the United States' Common Core Standards and the United Kingdom's National Curriculum Standards and incorporating Christian worldview and local Jordanian culture.

This booklet of standards aids parents in understanding the report cards that are sent out each month. Parents can look at the standards and interpret how their child is working at, below or above the grade level expectations.

Teachers use the standards as a benchmark for their own instruction and assessment of students' learning, to ensure that they are supporting and challenging all students.

If parents have any questions or comments, they can contact the class teacher or department head.

Contents

English Language

Reading
Ask and answer questions to demonstrate understanding of a text, referring explicitly to the text as the basis for the answers.
Recount stories, including fables, folktales, and myths from diverse cultures; determine the central message, lesson, or moral and explain how it is conveyed through key details in the text.
Describe characters in a story (e.g., their traits, motivations, or feelings) and explain how their actions contribute to the sequence of events
Determine the meaning of words and phrases as they are used in a text, distinguishing literal from nonliteral language.
Refer to parts of stories, dramas, and poems when writing or speaking about a text, using terms such as chapter, scene, and stanza; describe how each successive part builds on earlier sections.
Distinguish their own point of view from that of the narrator or those of the characters.
Explain how specific aspects of a text's illustrations contribute to what is conveyed by the words in a story (e.g., create mood, emphasize aspects of a character or setting)
Compare and contrast the themes, settings, and plots of stories written by the same author about the same or similar characters (e.g., in books from a series)
By the end of the year, read and comprehend literature, including stories, dramas, and poetry, at the high end of the grades 2-3 text complexity band independently and proficiently.
Determine the main idea of a text; recount the key details and explain how they support the main idea.
Describe the relationship between a series of historical events, scientific ideas or concepts, or steps in technical procedures in a text, using language that pertains to time, sequence, and cause/effect.
Determine the meaning of general academic and domain-specific words and phrases in a text relevant to a *grade 3 topic or subject area*.
Use text features and search tools (e.g., key words, sidebars, hyperlinks) to locate information relevant to a given topic efficiently.
Distinguish their own point of view from that of the author of a text.

Use information gained from illustrations (e.g., maps, photographs) and the words in a text to demonstrate understanding of the text (e.g., where, when, why, and how key events occur).
Describe the logical connection between particular sentences and paragraphs in a text (e.g., comparison, cause/effect, first/second/third in a sequence).
Compare and contrast the most important points and key details presented in two texts on the same topic.
By the end of the year, read and comprehend informational texts, including history/social studies, science, and technical texts, at the high end of the grades 2-3 text complexity band independently and proficiently.
Know and apply grade-level phonics and word analysis skills in decoding words. • Identify and know the meaning of the most common prefixes and derivational suffixes. • Decode words with common Latin suffixes. • Decode multi-syllable words. • Read grade-appropriate irregularly spelled words.
Read with sufficient accuracy and fluency to support comprehension. • Read grade-level text with purpose and understanding. • Read grade-level prose and poetry orally with accuracy, appropriate rate, and expression on successive readings. • Use context to confirm or self-correct word recognition and understanding, rereading as necessary.
Writing
Write opinion pieces on topics or texts, supporting a point of view with reasons. • Introduce the topic or text they are writing about, state an opinion, and create an organizational structure that lists reasons. • Provide reasons that support the opinion. • Use linking words and phrases (e.g., *because*, *therefore*, *since*, *for example*) to connect opinion and reasons. • Provide a concluding statement or section.
Write informative/explanatory texts to examine a topic and convey ideas and information clearly. • Introduce a topic and group related information together; include illustrations when useful to aiding comprehension. • Develop the topic with facts, definitions, and details. • Use linking words and phrases (e.g., *also*, *another*, *and*, *more*, *but*) to connect ideas within categories of information. • Provide a concluding statement or section.

Write narratives to develop real or imagined experiences or events using effective technique, descriptive details, and clear event sequences. • Establish a situation and introduce a narrator and/or characters; organize an event sequence that unfolds naturally. • Use dialogue and descriptions of actions, thoughts, and feelings to develop experiences and events or show the response of characters to situations. • Use temporal words and phrases to signal event order. • Provide a sense of closure.
With guidance and support from adults, produce writing in which the development and organization are appropriate to task and purpose.
With guidance and support from peers and adults, develop and strengthen writing as needed by planning, revising, and editing.
With guidance and support from adults, use technology to produce and publish writing (using keyboarding skills) as well as to interact and collaborate with others.
Conduct short research projects that build knowledge about a topic.
Recall information from experiences or gather information from print and digital sources; take brief notes on sources and sort evidence into provided categories.
Write routinely over extended time frames (time for research, reflection, and revision) and shorter time frames (a single sitting or a day or two) for a range of discipline-specific tasks, purposes, and audiences.
Speaking and Listening
Engage effectively in a range of collaborative discussions (one-on-one, in groups, and teacher-led) with diverse partners on *grade 3 topics and texts*, building on others' ideas and expressing their own clearly. • Come to discussions prepared, having read or studied required material; explicitly draw on that preparation and other information known about the topic to explore ideas under discussion. • Follow agreed-upon rules for discussions (e.g., gaining the floor in respectful ways, listening to others with care, speaking one at a time about the topics and texts under discussion). • Ask questions to check understanding of information presented, stay on topic, and link their comments to the remarks of others. • Explain their own ideas and understanding in light of the discussion.
Determine the main ideas and supporting details of a text read aloud or information presented in diverse media and formats, including visually, quantitatively, and orally.
Ask and answer questions about information from a speaker, offering appropriate elaboration and detail.
Report on a topic or text, tell a story, or recount an experience with appropriate facts and relevant, descriptive details, speaking clearly at an understandable pace.

Create engaging audio recordings of stories or poems that demonstrate fluid reading at an understandable pace; add visual displays when appropriate to emphasize or enhance certain facts or details.
Speak in complete sentences when appropriate to task and situation in order to provide requested detail or clarification.
Grammar and Punctuation
Demonstrate command of the conventions of standard English grammar and usage when writing or speaking. • Explain the function of nouns, pronouns, verbs, adjectives, and adverbs in general and their functions in particular sentences. • Use abstract nouns (e.g., *childhood*). • Form and use regular and irregular plural nouns. • Form and use regular and irregular verbs. • Form and use the simple (e.g., *I walked; I walk; I will walk*) verb tenses. • Ensure subject-verb and pronoun-antecedent agreement.* • Form and use comparative and superlative adjectives and adverbs, and choose between them depending on what is to be modified. • Use coordinating and subordinating conjunctions. • Produce simple, compound, and complex sentences.
Demonstrate command of the conventions of standard English capitalization, punctuation, and spelling when writing. • Capitalize appropriate words in titles. • Use commas in addresses. • Use commas and quotation marks in dialogue. • Form and use possessives. • Use conventional spelling for high-frequency and other studied words and for adding suffixes to base words (e.g., *sitting, smiled, cries, happiness*). • Use spelling patterns and generalizations (e.g., word families, position-based spellings, syllable patterns, ending rules, meaningful word parts) in writing words. • Consult reference materials, including beginning dictionaries, as needed to check and correct spellings.
Use knowledge of language and its conventions when writing, speaking, reading, or listening. • Choose words and phrases for effect.* • Recognize and observe differences between the conventions of spoken and written standard English.

Determine or clarify the meaning of unknown and multiple-meaning word and phrases based on grade 3 reading and content, choosing flexibly from a range of strategies.

- Use sentence-level context as a clue to the meaning of a word or phrase.
- Determine the meaning of the new word formed when a known affix is added to a known word (e.g., *agreeable/disagreeable, comfortable/uncomfortable, care/careless, heat/preheat*).
- Use a known root word as a clue to the meaning of an unknown word with the same root (e.g., *company, companion*).
- Use glossaries or beginning dictionaries, both print and digital, to determine or clarify the precise meaning of key words and phrases.

Demonstrate understanding of figurative language, word relationships and nuances in word meanings.

- Distinguish the literal and nonliteral meanings of words and phrases in context (e.g., *take steps*).
- Identify real-life connections between words and their use (e.g., describe people who are *friendly* or *helpful*).
- Distinguish shades of meaning among related words that describe states of mind or degrees of certainty (e.g., *knew, believed, suspected, heard, wondered*).

Acquire and use accurately grade-appropriate conversational, general academic, and domain-specific words and phrases, including those that signal spatial and temporal relationships (e.g., *After dinner that night we went looking for them*).

Math

Operations and Algebraic Thinking
Interpret products of whole numbers, e.g., interpret 5 × 7 as the total number of objects in 5 groups of 7 objects each. *For example, describe a context in which a total number of objects can be expressed as 5 × 7*.
Interpret whole-number quotients of whole numbers, e.g., interpret 56 ÷ 8 as the number of objects in each share when 56 objects are partitioned equally into 8 shares, or as a number of shares when 56 objects are partitioned into equal shares of 8 objects each. *For example, describe a context in which a number of shares or a number of groups can be expressed as 56 ÷ 8*.
Use multiplication and division within 100 to solve word problems in situations involving equal groups, arrays, and measurement quantities, e.g., by using drawings and equations with a symbol for the unknown number to represent the problem.
Determine the unknown whole number in a multiplication or division equation relating three whole numbers. *For example, determine the unknown number that makes the equation true in each of the equations 8 × ? = 48, 5 = _ ÷ 3, 6 × 6 = ?*
Apply properties of operations as strategies to multiply and divide.2 *Examples: If 6 × 4 = 24 is known, then 4 × 6 = 24 is also known. (Commutative property of multiplication.) 3 × 5 × 2 can be found by 3 × 5 = 15, then 15 × 2 = 30, or by 5 × 2 = 10, then 3 × 10 = 30. (Associative property of multiplication.) Knowing that 8 × 5 = 40 and 8 × 2 = 16, one can find 8 × 7 as 8 × (5 + 2) = (8 × 5) + (8 × 2) = 40 + 16 = 56. (Distributive property.)*
Understand division as an unknown-factor problem. *For example, find 32 ÷ 8 by finding the number that makes 32 when multiplied by 8*.
Fluently multiply and divide within 100, using strategies such as the relationship between multiplication and division (e.g., knowing that 8 × 5 = 40, one knows 40 ÷ 5 = 8) or properties of operations. By the end of Grade 3, know from memory all products of two one-digit numbers.
Solve two-step word problems using the four operations. Represent these problems using equations with a letter standing for the unknown quantity. Assess the reasonableness of answers using mental computation and estimation strategies including rounding.
Identify arithmetic patterns (including patterns in the addition table or multiplication table), and explain them using properties of operations. *For example, observe that 4 times a number is always even, and explain why 4 times a number can be decomposed into two equal addends*.
Number and Operations in Base Ten
Use place value understanding to round whole numbers to the nearest 10 or 100.
Fluently add and subtract within 1000 using strategies and algorithms based on place value, properties of operations, and/or the relationship between addition and subtraction.

Multiply one-digit whole numbers by multiples of 10 in the range 10-90 (e.g., 9 × 80, 5 × 60) using strategies based on place value and properties of operations.
Numbers and Operations in Fractions
Understand a fraction 1/*b* as the quantity formed by 1 part when a whole is partitioned into *b* equal parts; understand a fraction *a*/*b* as the quantity formed by *a* parts of size 1/*b*.
Understand a fraction as a number on the number line; represent fractions on a number line diagram.
Represent a fraction 1/*b* on a number line diagram by defining the interval from 0 to 1 as the whole and partitioning it into *b* equal parts. Recognize that each part has size 1/*b* and that the endpoint of the part based at 0 locates the number 1/*b* on the number line.
Represent a fraction *a*/*b* on a number line diagram by marking off a lengths 1/*b* from 0. Recognize that the resulting interval has size *a*/*b* and that its endpoint locates the number *a*/*b* on the number line.
Explain equivalence of fractions in special cases, and compare fractions by reasoning about their size.
Understand two fractions as equivalent (equal) if they are the same size, or the same point on a number line.
Recognize and generate simple equivalent fractions, e.g., 1/2 = 2/4, 4/6 = 2/3. Explain why the fractions are equivalent, e.g., by using a visual fraction model.
Express whole numbers as fractions, and recognize fractions that are equivalent to whole numbers. *Examples: Express 3 in the form 3 = 3/1; recognize that 6/1 = 6; locate 4/4 and 1 at the same point of a number line diagram*.
Compare two fractions with the same numerator or the same denominator by reasoning about their size. Recognize that comparisons are valid only when the two fractions refer to the same whole. Record the results of comparisons with the symbols >, =, or <, and justify the conclusions, e.g., by using a visual fraction model.
Measurement and Data
Tell and write time to the nearest minute and measure time intervals in minutes. Solve word problems involving addition and subtraction of time intervals in minutes, e.g., by representing the problem on a number line diagram.
Measure and estimate liquid volumes and masses of objects using standard units of grams (g), kilograms (kg), and liters (l).1 Add, subtract, multiply, or divide to solve one-step word problems involving masses or volumes that are given in the same units, e.g., by using drawings (such as a beaker with a measurement scale) to represent the problem.
Draw a scaled picture graph and a scaled bar graph to represent a data set with several categories. Solve one- and two-step "how many more" and "how many less" problems using information presented in scaled bar graphs. *For example, draw a bar graph in which each square in the bar graph might represent 5 pets*.

Generate measurement data by measuring lengths using rulers marked with halves and fourths of an inch. Show the data by making a line plot, where the horizontal scale is marked off in appropriate units— whole numbers, halves, or quarters.
Recognize area as an attribute of plane figures and understand concepts of area measurement. • A square with side length 1 unit, called "a unit square," is said to have "one square unit" of area, and can be used to measure area. • A plane figure which can be covered without gaps or overlaps by *n* unit squares is said to have an area of *n* square units.
Measure areas by counting unit squares (square cm, square m, square in, square ft, and improvised units).
Relate area to the operations of multiplication and addition. • Find the area of a rectangle with whole-number side lengths by tiling it, and show that the area is the same as would be found by multiplying the side lengths. • Multiply side lengths to find areas of rectangles with whole-number side lengths in the context of solving real world and mathematical problems, and represent whole-number products as rectangular areas in mathematical reasoning. • Use tiling to show in a concrete case that the area of a rectangle with whole-number side lengths *a* and *b* + *c* is the sum of *a* × *b* and *a* × *c*. Use area models to represent the distributive property in mathematical reasoning. • Recognize area as additive. Find areas of rectilinear figures by decomposing them into non-overlapping rectangles and adding the areas of the non-overlapping parts, applying this technique to solve real world problems.
Solve real world and mathematical problems involving perimeters of polygons, including finding the perimeter given the side lengths, finding an unknown side length, and exhibiting rectangles with the same perimeter and different areas or with the same area and different perimeters.
Geometry
Understand that shapes in different categories (e.g., rhombuses, rectangles, and others) may share attributes (e.g., having four sides), and that the shared attributes can define a larger category (e.g., quadrilaterals). Recognize rhombuses, rectangles, and squares as examples of quadrilaterals, and draw examples of quadrilaterals that do not belong to any of these subcategories.
Partition shapes into parts with equal areas. Express the area of each part as a unit fraction of the whole. *For example, partition a shape into 4 parts with equal area, and describe the area of each part as 1/4 of the area of the shape*.

Science

Physical Science
Structure and Properties of Matter Objects have many observable properties, including size, weight, shape, color, temperature, and the ability to react with other substances. Those properties can be measured using tools, such as rulers, balances, and thermometers. Objects are made of one or more materials, such as paper, wood, and metal. Objects can be described by the properties of the materials from which they are made, and those properties can be used to separate or sort a group of objects or materials. Materials are composed of parts that are too small to be seen without magnification. Materials can exist in different states — solid, liquid, and gas—and each state has distinct physical properties.
Changes of Properties of Matter Things can be done to materials to change some of their properties (heating, freezing, mixing, cutting, dissolving, bending), but not all materials respond the same way to what is done to them. The mass of a material remains constant whether it is together, in parts, or in a different state.
Motions and Forces The position of an object can be described by locating it relative to another object or the background. An object's motion can be described by tracing and measuring its position over time. Things move in many different ways (e.g., straight line, zigzag, vibration, circular motion). The position and motion of objects can be changed by a force. The size of the change is related to the strength of the force and to the mass of the object. Gravity causes things near the Earth fall to the ground unless something holds them up. Electrically charged materials pull on all other materials and can attract or repel other charged materials. Magnets attract and repel each other and certain kinds of other materials without touching them.

Interactions of Energy and Matter

Moving objects have energy. Energy can also be stored in various ways and converted to different forms.

Heat can be produced in many ways, such as burning, rubbing, or mixing one substance with another. Heat is often produced as a byproduct when one form of energy is converted to another form (e.g. when machines and living organisms convert stored energy to motion). Heat can move from one object to another by conduction and some materials conduct heat better than others.

Sound is produced by vibrating objects. The pitch of the sound can be varied by changing the rate of vibration.

Light travels in a straight line until it strikes an object. Light can be reflected by a mirror, refracted by a lens, or absorbed by an object.

Electricity in circuits can produce light, heat, sound, and magnetic effects. Electrical circuits require a complete loop through which an electrical current can pass.

Life Science

Structure of Cells and Organisms

Organisms have basic needs. For example, animals need air, water, nutrients, and light. Organisms can survive only in environments in which their needs can be met, and they have features that help them live in different environments.

Each plant or animal has different structures that serve different functions in growth, survival, and reproduction. For example, humans have distinct body structures for walking, holding, seeing, and talking.

Reproduction and Heredity

Plants and animals have life cycles that include being born, developing into adults, reproducing, and eventually dying. The details of this life cycle are different for different organisms.

Plants and animals closely resemble their parents, but differences exist among individuals of the same kind of plant or animal.

Many characteristics of an organism are inherited from the parents of the organism, but other characteristics result from an individual's interactions with the environment. Inherited characteristics include the color of flowers and the number of limbs of an animal. Other features, such as the ability to ride a bicycle, are learned through interactions with the environment and cannot be passed on to the next generation.

Regulation and Behavior of Organisms

The behavior of individual organisms is influenced by internal cues (such as hunger) and by external cues (such as a change in the environment). Humans and other organisms have senses that help them detect internal and external cues.

Diversity and Adaptations of Organisms

Living things can be grouped in different ways (e.g. plants/animals, bones/no bones, insects/spiders, live on land/live in water). These groupings have different purposes.

There are similarities and differences in the appearance and behavior of plants and animals.

Some kinds of organisms that once lived on Earth have completely disappeared (e.g. dinosaurs, trilobites, mammoths, horsetail trees).

Populations and Ecosystems

Plants, animals, and the non-living things around them make up an ecosystem. Different types of ecosystems support different kinds of organisms.

The transfer of energy, such as through the consumption of food, is essential to all living organisms. Organisms are part of food chains and food webs. All animals depend on plants, which make their own food with sunlight, water, and air. Some animals eat plants for food. Other animals eat animals that eat the plants.

An organism's patterns of behavior are related to the nature of that organism's environment, including the kinds and numbers of other organisms present, the availability of food and resources, and the physical characteristics of the environment. When the environment changes, some plants and animals survive and reproduce, and others die or move to new locations.

Personal Health

Safety and security are basic needs of humans. Safety involves freedom from danger, risk, or injury. Security involves feelings of confidence and lack of anxiety and fear. Student understandings include following safety rules for home and school, preventing abuse and neglect, avoiding injury, knowing whom to ask for help, and when and how to say no.

Individuals have some responsibility for their own health. Students should engage in personal care - dental hygiene, cleanliness, and exercise - that will maintain and improve health. Understandings include how communicable diseases, such as colds, are transmitted and some of the body's defence mechanisms that prevent or overcome illness.

Nutrition is essential to health. Students should understand how the body uses food and how various foods contribute to health. Recommendations for good nutrition include eating a variety of foods, eating less sugar, and eating less fat.

Different substances can damage the body and how it functions. Such substances include tobacco, alcohol, over-the-counter medicines, and illicit drugs. Some substances, such as prescription drugs, can be beneficial, but any substance can be harmful if used inappropriately.

Earth and Space Science
Earth's Composition and Structure Earth materials are solid rocks and soils, water, and the gases of the atmosphere. The varied materials have different physical and chemical properties which make them useful in different ways; for example, as building materials, as sources of fuel, or for growing the plants we use as food. Earth materials provide many of the resources that humans use. Rock is composed of different combinations of minerals. Rocks come in many different shapes and sizes (e.g. boulders, pebbles, sand). Smaller rocks come from the breakage and weathering of larger rocks and bedrock. Soils are composed of weathered rock, living organisms, and products of plants and animals. Soils have properties of color and texture, capacity to retain water, and ability to support the growth of many kinds of plants, including those in our food supply. The surface of the earth changes. Some changes are due to slow processes, such as erosion and weathering, and some changes are due to rapid processes, such as landslides, volcanic eruptions, and earthquakes. Fossils provide evidence about the plants and animals that lived long ago and the nature of the environment at that time. Fossils can be compared to one another and to living organisms to observe their similarities and differences.
Atmospheric Processes and the Water Cycle The sun provides the light and heat necessary to maintain the temperature of the Earth. Air is a substance that surrounds us, takes up space, and moves around us as wind. Water exists in the air in different forms, such as in clouds and fog as tiny droplets and in rain, snow, and hail. It changes from one form to another through freezing, condensation, precipitation, and evaporation. Weather changes from day to day and over the seasons. Weather can be described by measurable quantities, such as temperature, wind direction and speed, and precipitation.

Natural Resources and Environmental Change

Resources are things that we get from the living and nonliving environment to meet the needs and wants of a population. Some resources are basic materials, such as air, water, and soil; some are produced from basic resources, such as food, fuel, and building materials; and some resources are nonmaterial, such as quiet places, beauty, security, and safety.

The supply of many resources is limited. If used, resources can be extended through recycling and decreased use.

All organisms cause changes in the environment where they live. Some of these changes are detrimental to the organism or other organisms, whereas others are beneficial.

Humans depend on their natural and constructed environments. Humans change environments in ways that can be either beneficial or detrimental for themselves and other organisms. God has given man the responsibility to make sure His ecosystems are maintained at healthy levels and not destroyed. Pollution is a change in the environment that can influence the health, survival, or activities of organisms, including humans.

Some environmental changes occur slowly, and others occur rapidly. Changing environments in small increments over long periods will have different consequences than changing environments in large increments over short periods.

Composition and Structure of the Universe

The Sun, Moon, stars, clouds, birds, and airplanes all have properties, locations, and movements that can be observed and described.

Objects in the sky have patterns of movement. Night and day are caused by the Earth's rotation on its axis. The Sun appears to move across the sky from east to west every day, but its position in the sky changes slowly over the seasons.

The Moon appears sometimes at night and sometimes during the day. It moves across the sky on a daily basis much like the sun. The observable shape of the moon changes from day to day in a cycle that lasts about a month.

The Earth is one of several planets that orbit the Sun, and the Moon orbits the Earth. Planets look like stars, but over time they appear to move through the constellations.

The patterns of stars in the sky stay the same, although they appear to slowly move from east to west across the sky nightly, and different stars can be seen in different seasons.

Astronomical objects in space are massive in size and are separated from one another by vast distances. There are innumerable stars in the universe, but they are so distant they look like points of light.

Skills

Scientific Inquiry

Ask a question about objects, organisms, and events in the environment which can be answered with scientific knowledge and their own observations. Answer their questions by seeking information from reliable sources of scientific information and from their own observations and investigations.

Plan and conduct an investigation. In the earliest years, investigations are largely based on systematic observations. Later, they are simple experiments based on a fair test.

Employ simple equipment and tools to gather data and extend the senses. Record data in drawings, tables and graphs.

Use data to construct a reasonable explanation and make predictions. Learn what constitutes evidence, and judge the merits or strength of the data and information that is used to make explanations. Support and check explanations using the knowledge and evidence obtained in an investigation, scientific knowledge, experiences and observations of others.

Communicate investigations and explanations, and critique and analyze their work and the work of other students. This communication might be spoken, drawn, or written.

Technological Design

Identify a simple problem, explaining the problem in their own words and identifying a specific task and solution related to the problem.

Propose a solution to build something or get something to work better, including describing and communicating their ideas. Recognize that designing a solution might have constraints, such as cost, materials, time, space, or safety.

Work individually and collaboratively on products or designs, and use suitable tools, techniques, and quantitative measurements when appropriate. Balance simple constraints in problem solving.

Evaluate a product or design, both their own and that of others, by considering how well a product or design met the challenge to solve a problem. Use measurements and include constraints and other criteria in the evaluations when possible. Modify designs based on the results of evaluations.

Communicate the design process and product through oral, written, and pictorial means. Communication could include show and tell, group discussions, short written reports, or pictures.

General Lab Skills

- Follow basic safety procedures in investigations.
- Make careful observations.
- Measure time using a stopwatch.
- Measure length using a ruler.
- Measure mass using a double-pan balance.
- Measure volume using a graduated cylinder.
- Measure temperature using a thermometer.
- Observe objects and organisms with magnifiers.
- Observe the finer details of plants and animals with a microscope.

Social Studies

Geographical Knowledge and Skills
Extend their knowledge and understanding of the location and characteristics of a range of the world's most significant human and physical features.
develop their use of geographical knowledge, understanding and skills to enhance their locational and place knowledge.
Locational knowledge • locate the world's countries, using maps, concentrating on their environmental regions, key physical and human characteristics, countries, and major cities • name and locate Jordan, its geographical regions and their identifying human and physical characteristics, key topographical features (including hills, mountains, coasts and rivers), and land-use patterns; and understand how some of these aspects have changed over time. • identify the position and significance of latitude, longitude, Equator, Northern Hemisphere, Southern Hemisphere, the Tropics of Cancer and Capricorn, Arctic and Antarctic Circle, the Prime/Greenwich Meridian and time zones (including day and night).
Place knowledge • understand geographical similarities and differences through the study of human and physical geography of two contrasting regions of the world.

Human and physical geography
• describe and understand key aspects of:
  • physical geography, including: climate zones, biomes and vegetation belts, rivers, mountains, volcanoes and earthquakes, and the water cycle.
  • human geography, including: types of settlement and land use, economic activity including trade links, and the distribution of natural resources including energy, food, minerals and water.

Geographical skills and fieldwork • use maps, atlases, globes and digital/computer mapping to locate countries and describe features studied. • use the 8 points of a compass, 4- and 6-figure grid references, symbols and key to build their knowledge of the world. • use fieldwork to observe, measure, record and present the human and physical features in the local area using a range of methods, including sketch maps, plans and graphs, and digital technologies.
Historical Knowledge and Skills
Know and understand the history of Jordan and the wider world as a coherent, chronological narrative, from the earliest times to the present day: how people's lives have shaped the world.
Know and understand significant aspects of the history of the wider world: the nature of ancient civilisations; the expansion and dissolution of empires; characteristic features of past societies; achievements and follies of mankind.
Gain and deploy a historically grounded understanding of abstract terms such as 'empire', 'civilisation', 'parliament' and 'peasantry'.

Understand historical concepts such as continuity and change, cause and consequence, similarity, difference and significance, and use them to make connections, draw contrasts, analyse trends, frame historically valid questions and create their own structured accounts, including written narratives and analyses.
Understand the methods of historical enquiry, including how evidence is used rigorously to make historical claims, and discern how and why contrasting arguments and interpretations of the past have been constructed.
Gain historical perspective by placing their growing knowledge into different contexts: understanding the connections between local, regional, national and international history; between cultural, economic, military, political, religious and social history; and between short- and long-term timescales.
Develop a chronologically secure knowledge and understanding of local and world history, establishing clear narratives within and across the periods they study.
Note connections, contrasts and trends over time and develop the appropriate use of historical terms.
Regularly address and sometimes devise historically valid questions about change, cause, similarity and difference, and significance.
Construct informed responses that involve thoughtful selection and organisation of relevant historical information.
Understand how our knowledge of the past is constructed from a range of sources.

Art

Create sketchbooks to record observations and use them to review and revisit ideas.
Improve mastery of art and design techniques, including drawing, painting and sculpture with a range of materials.
Learn about great artists, architects and designers in history.
Develop techniques, including control and use of materials, with creativity, experimentation and increasing awareness of different kinds of art, craft and design.

Information Technology

Use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour, identify a range of ways to report concerns about content and contact.
Select, use and combine a variety of software on a range of digital services to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information.
Manipulate text by: changing the case, aligning the text, using bullet points and numbering, using the <ctrl> key, inserting and formatting text boxes.
Manipulate images by: drawing with different shapes and lines, ordering and grouping objects, recognise effective layout, combine text and images and lay out objects effectively.
Use presentation software, including: plan a branching story, create slide templates, organise slides with hyperlinks, add themes, transitions and animation to a presentation, use action settings, insert video and audio, evaluate slide layout and make improvements.
Use search technologies effectively, appreciate how results are elected and ranked, and be discerning in evaluating digital content.
Understand computer networks, including the internet; how they can provide multiple services such as the World Wide Web, and the opportunities they offer for communication and collaboration.

PE (Physical Education)

Apply and develop a broad range of skills, learning how to use them in different ways and to link them to make actions and sequences of movement.
Develop an understanding of how to improve in different physical activities and sports and learn how to evaluate and recognise their own success.
Use running, jumping, throwing and catching in isolation and in combination.
Play competitive games, modified where appropriate, and apply basic principles suitable for attacking and defending.
Develop flexibility, strength, technique, control and balance [for example, through athletics and gymnastics].
Perform dances using a range of movement patterns.
Take part in outdoor and adventurous activity challenges both individually and within a team.
Compare their performances with previous ones and demonstrate improvement to achieve their personal best.

If swimming is taught, children should be taught to: • swim competently, confidently and proficiently over a distance of at least 25 metres • use a range of strokes effectively [for example, front crawl/freestyle, backstroke and breaststroke]. • perform safe self-rescue in different water-based situations.

Music

Play and perform in solo and ensemble context, using their voices and playing musical instruments with increasing accuracy, fluency, control and expression.
Improvise and compose music for a range of purposes using the interrelated dimensions of music.
Listen with attention to detail and recall sounds with increasing aural memory.
Use and understand staff and other musical notations.
Appreciate and understand a wide range of high-quality live and recorded music drawn from different traditions and from great composers and musicians.
Develop an understanding of the history of music.

Arabic

Classical
Read, write and correctly pronounce all letters (long and short), one and multi-syllable words, *al* words, sun and moon letters and the signs.
Count from 1 to 50.
Use and understand topic words in sentences: families, household objects, animals, winter, spring and greetings.
Recite the Lord's prayer and key memory verses.
Conversational
Learn topic vocabulary and use in sentences: greetings, classroom items, human body, senses, foods, seeds, cooking, likes and dislikes, helping each other, getting sick, cultural celebrations.

Christian Education

God: Know key events in Jesus' life. Know Jesus' key teaching messages.
Bible: Know where to locate Jesus' life in the Bible.
Bible Characters and Stories: Know how Paul continued Jesus' work and teaching. Know the places where Paul travelled.
Church: Learn about the beginning of the new church under the leadership of Paul. Learn about the major mission history periods of the church e.g.. the Moravians, the Scudder family, Cameron Townsend.
Response: Consider how we can continue Jesus' work in our own lives. Consider how we can adopt Jesus' teaching in our own lives.