At Amy's Farm we offer tours that are tailored to each grade level. Programs are linked to the California State Learning Standards. Scroll down to discover how our tour can match your grade's curriculum.

Kindergarten

Science Content Standards.

Life Sciences

2. Different types of plants and animals inhabit the earth. As a basis for understanding this concept:
    a. Students know how to observe and describe similarities and differences in the appearance and behavior of plants and animals (e.g., seed-bearing plants, birds, fish, insects).
    b. Students know how to identify major structures of common plants and animals (e.g., stems, leaves, roots, arms, wings, legs).

Earth Sciences

3. Earth is composed of land, air, and water. As a basis for understanding this concept:
    a. Students know changes in weather occur from day to day and across seasons, affecting Earth and its inhabitants.
    b. Students know how to identify resources from Earth that are used in everyday life and understand that many resources can be conserved.

Investigation and Experimentation

4. Scientific progress is made by asking meaningful questions and conducting careful investigations. As a basis for understanding this concept and addressing the content in the other three strands, students should develop their own questions and perform investigations. Students will:
    a. Observe common objects by using the five senses.
    b. Describe the properties of common objects.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Name a variety of healthy foods and explain why they are necessary for good health.

Identify a variety of healthy snacks.

Describe the benefits of being physically active.

Standard 2: Analyzing Influences

Recognize that not all products advertised or sold are good for them.

Standard 4: Interpersonal Communication

Explain how to ask family members for healthy food options.

Standard 7: Practicing Health-Enhancing Behaviors

Select nutritious snacks.

Choose healthy foods in a variety of settings.

Growth and Development

Standard 1: Essential Concepts

1.1.G Explain that living things grow and mature.

1.6.G Name and describe the five senses.

Personal and Community Health

Standard 1: Essential Concepts

1.5.P Identify practices that are good for the environment, such as turning off lights and water, recycling, and picking up trash.

Standard 7: Practicing Health-Enhancing Behaviors

7.2.P Demonstrate ways to prevent the transmission of germs (e.g., washing hands, using tissues).

Grade One

Science Content Standards

Life Sciences

2. Plants and animals meet their needs in different ways. As a basis for understanding this concept:
    a. Students know different plants and animals inhabit different kinds of environments and have external features that help them thrive in different kinds of places.
    b. Students know both plants and animals need water, animals need food, and plants need light.
    c. Students know animals eat plants or other animals for food and may also use plants or even other animals for shelter and nesting.
    d. Students know how to infer what animals eat from the shapes of their teeth (e.g., sharp teeth: eats meat; flat teeth: eats plants).
    e. Students know roots are associated with the intake of water and soil nutrients and green leaves are associated with making food from sunlight.

Earth Sciences

3. Weather can be observed, measured, and described. As a basis for understanding this concept:
    a. Students know the sun warms the land, air, and water.

Health Standards

Growth and Development

Standard 1: Essential Concepts

Describe how living things grow and mature.

Identify a variety of behaviors that promote healthy growth and development.

Personal and Community Health

Standard 1: Essential Concepts

Identify materials that can be reduced, reused, or recycled.

Standard 2: Analyzing Influences

Explain how family and friends influence positive health practices.

Grade Two

Science Content Standards.

Life Sciences

2. Plants and animals have predictable life cycles. As a basis for understanding this concept:
    a. Students know that organisms reproduce offspring of their own kind and that the offspring resemble their parents and one another.
    b. Students know the sequential stages of life cycles are different for different animals, such as butterflies, frogs, and mice.
    c. Students know many characteristics of an organism are inherited from the parents. Some characteristics are caused or influenced by the environment.
    d. Students know there is variation among individuals of one kind within a population.
    e. Students know light, gravity, touch, or environmental stress can affect the germination, growth, and development of plants.
    f. Students know flowers and fruits are associated with reproduction in plants.

Earth Sciences

3. Earth is made of materials that have distinct properties and provide resources for human activities. As a basis for understanding this concept:
    a. Students know that soil is made partly from weathered rock and partly from organic materials and that soils differ in their color, texture, capacity to retain water, and ability to support the growth of many kinds of plants.
    b. Students know rock, water, plants, and soil provide many resources, including food, fuel, and building materials, that humans use.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Classify various foods into appropriate food groups.

Identify the number of servings of food from each food group that a child needs daily.

List the benefits of healthy eating (including beverages and snacks).

Identify a variety of healthy snacks.

Standard 2: Analyzing Influences

Discuss how family, friends, and media influence food choices.

Standard 4: Interpersonal Communication

Demonstrate how to ask family members for healthy food options.

Standard 5: Decision Making

Use a decision-making process to select healthy foods.

Compare and contrast healthy and less-healthy food choices for a variety of settings.

Standard 6: Goal Setting

Set a short-term goal to choose healthy foods for snacks and meals.

Standard 7: Practicing Health-Enhancing Behaviors

Plan a nutritious meal.

Select healthy beverages.

Examine the criteria for choosing a nutritious snack.

Standard 8: Health Promotion

Practice making healthy eating choices with friends and family.

Grade Three

Science Content Standards.

Physical Sciences

1. Energy and matter have multiple forms and can be changed from one form to another. As a basis for understanding this concept:
    a. Students know energy comes from the Sun to Earth in the form of light.

Life Sciences

3. Adaptations in physical structure or behavior may improve an organism's chance for survival. As a basis for understanding this concept:
    a. Students know plants and animals have structures that serve different functions in growth, survival, and reproduction.
    b. Students know examples of diverse life forms in different environments, such as oceans, deserts, tundra, forests, grasslands, and wetlands.
    c. Students know living things cause changes in the environment in which they live: some of these changes are detrimental to the organism or other organisms, and some are beneficial.
    d. Students know when the environment changes, some plants and animals survive and reproduce; others die or move to new locations.

Health Standards

Growth and Development

Standard 1: Essential Concepts

Describe the cycle of birth, growth, aging, and death in living things.

Recognize that there are individual differences in growth and development.

Standard 5: Decision Making

Examine why a variety of behaviors promote healthy growth and development.

Standard 7: Practicing Health-Enhancing Behaviors

Determine behaviors that promote healthy growth and development.

Personal and Community Health

Standard 1: Essential Concepts

Describe how a healthy environment is essential to personal and community health.

Discuss how reducing, recycling, and reusing products make for a healthier environment.

Standard 7: Practicing Health-Enhancing Behaviors

Demonstrate ways to reduce, reuse, and recycle at home, at school, and in the community.

Standard 8: Health Promotion

Support others in making positive health choices.

Encourage others to promote a healthy environment.

Grade Four

Science Content Standards

Life Sciences

2. All organisms need energy and matter to live and grow. As a basis for understanding this concept:
    a. Students know plants are the primary source of matter and energy entering most food chains.
    b. Students know producers and consumers (herbivores, carnivores, omnivores, and decomposers) are related in food chains and food webs and may compete with each other for resources in an ecosystem.
    c. Students know decomposers, including many fungi, insects, and microorganisms, recycle matter from dead plants and animals.

3. Living organisms depend on one another and on their environment for survival. As a basis for understanding this concept:

    a. Students know ecosystems can be characterized by their living and nonliving components.
    b. Students know that in any particular environment, some kinds of plants and animals survive well, some survive less well, and some cannot survive at all.
    c. Students know many plants depend on animals for pollination and seed dispersal, and animals depend on plants for food and shelter.
    d. Students know that most microorganisms do not cause disease and that many are beneficial.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Identify and define key nutrients and their functions.

Describe the relationship between food intake, physical activity, and good health.

Standard 2: Analyzing Influences

Identify internal and external influences that affect food choices.

Analyze advertising and marketing techniques used for food and beverages.

Standard 4: Interpersonal Communication

Demonstrate effective communication skills to ask for healthy food choices.

Standard 5: Decision Making

Describe how to use a decision-making process to select nutritious foods and beverages.

Standard 7: Practicing Health-Enhancing Behaviors

Practice how to take personal responsibility for eating healthy foods.

Practice how to take personal responsibility for limiting sugar consumption in foods, snacks, and beverages.

Standard 8: Health Promotion

Support others in making positive food and physical activity choices.

Grade Five

Science Content Standards.

Life Sciences

2. Plants and animals have structures for respiration, digestion, waste disposal, and transport of materials. As a basis for understanding this concept:
    a. Students kno*w* many multicellular organisms have specialized structures to support the transport of materials.
    b. Students know how sugar, water, and minerals are transported in a vascular plant.
    c. Students kno*w* plants use carbon dioxide (CO_2) and energy from sunlight to build molecules of sugar and release oxygen.
    d. Students know plant and animal cells break down sugar to obtain energy, a process resulting in carbon dioxide (CO_2) and water (respiration).

Earth Sciences

3. Water on Earth moves between the oceans and land through the processes of evaporation and condensation. As a basis for understanding this concept:
    a. Students know when liquid water evaporates, it turns into water vapor in the air and can reappear as a liquid when cooled or as a solid if cooled below the freezing point of water.
    b. Students know water vapor in the air moves from one place to another and can form fog or clouds, which are tiny droplets of water or ice, and can fall to Earth as rain, hail, sleet, or snow.
    c. Students know that the amount of fresh water located in rivers, lakes, underground sources, and glaciers is limited and that its availability can be extended by recycling and decreasing the use of water.

4. Energy from the Sun heats Earth unevenly, causing air movements that result in changing weather patterns. As a basis for understanding this concept:
    a. Students know uneven heating of Earth causes air movements (convection currents).
    b. Students know the influence that the ocean has on the weather and the role that the water cycle plays in weather patterns.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Describe the food groups, including recommended portions to eat from each food group.

Differentiate between more-nutritious and less-nutritious beverages and snacks.

Explain the concept of eating in moderation.

Describe the benefits of eating a nutritionally balanced diet consistent with current research-based dietary guidelines.

Explain how good health is influenced by healthy eating and being physically active.

Standard 2: Analyzing Influences

Describe internal and external influences that affect food choices and physical activity.

Recognize that family and cultural influences affect food choices.

Describe the influence of advertising and marketing techniques on food and beverage choices.

Standard 4: Interpersonal Communication

Use communication skills to deal effectively with influences from peers and media regarding food choices and physical activity.

Standard 5: Decision Making

Use a decision-making process to identify healthy foods for meals and snacks.

Standard 7: Practicing Health-Enhancing Behaviors

Identify ways to choose healthy snacks based on current research-based guidelines.

Standard 8: Health Promotion

Encourage and promote healthy eating and increased physical activity opportunities at school and in the community.

Personal and Community Health

Standard 1: Essential Concepts

Explain that all individuals have a responsibility to protect and preserve the environment.

Standard 6: Goal Setting

Monitor progress toward a goal to help protect the environment.

Standard 8: Health Promotion

Encourage others to minimize pollution in the environment.

Grade Six

Science Content Standards.

Ecology (Life Sciences)

5. Organisms in ecosystems exchange energy and nutrients among themselves and with the environment. As a basis for understanding this concept:
    a. Students know energy entering ecosystems as sunlight is transferred by producers into chemical energy through photosynthesis and then from organism to organism through food webs.
    b. Students know matter is transferred over time from one organism to others in the food web and between organisms and the physical environment.
    c. Students know populations of organisms can be categorized by the functions they serve in an ecosystem.
    d. Students know different kinds of organisms may play similar ecological roles in similar biomes.
    e. Students know the number and types of organisms an ecosystem can support depends on the resources available and on abiotic factors, such as quantities of light and water, a range of temperatures, and soil composition.

Resources

6. Sources of energy and materials differ in amounts, distribution, usefulness, and the time required for their formation. As a basis for understanding this concept:
    a. Students know the utility of energy sources is determined by factors that are involved in converting these sources to useful forms and the consequences of the conversion process.
    b. Students know different natural energy and material resources, including air, soil, rocks, minerals, petroleum, fresh water, wildlife, and forests, and know how to classify them as renewable or nonrenewable.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Describe the short- and long-term impact of nutritional choices on health.

Identify nutrients and their relationships to health.

Differentiate between diets that are health-promoting and diets linked to disease.

Describe the benefits of eating a variety of foods high in iron, calcium, and fiber.

Analyze the cognitive and physical benefits of eating breakfast daily.

Standard 2: Analyzing Influences

Evaluate internal and external influences on food choices.

Standard 3: Accessing Valid Information

Distinguish between valid and invalid sources of nutrition information.

Standard 5: Decision Making

Use a decision-making process to evaluate daily food intake for nutritional requirements.

Standard 7: Practicing Health-Enhancing Behaviors

Make healthy food choices in a variety of settings.

Standard 8: Health Promotion

Encourage nutrient-dense food choices in school.

Encourage peers to eat healthy foods and to be physically active.

Personal and Community Health

Standard 2: Analyzing Influences

Analyze the influence of culture, media, and technology on health decisions.

Grade Seven

Science Content Standards.

Focus on Life Science

Cell Biology

1. All living organisms are composed of cells, from just one to many trillions, whose details usually are visible only through a microscope. As a basis for understanding this concept:
    a. Students know cells function similarly in all living organisms.
    b. Students know the characteristics that distinguish plant cells from animal cells, including chloroplasts and cell walls.
    c. Students know the nucleus is the repository for genetic information in plant and animal cells.
    d. Students know that mitochondria liberate energy for the work that cells do and that chloroplasts capture sunlight energy for photosynthesis.

Genetics

2. A typical cell of any organism contains genetic instructions that specify its traits. Those traits may be modified by environmental influences. As a basis for understanding this concept:
    a. Students know the differences between the life cycles and reproduction methods of sexual and asexual organisms.
    b. Students know sexual reproduction produces offspring that inherit half their genes from each parent.
    c. Students know an inherited trait can be determined by one or more genes.
    d. Students kno*w* plant and animal cells contain many thousands of different genes and typically have two copies of every gene. The two copies (or alleles) of the gene may or may not be identical, and one may be dominant in determining the phenotype while the other is recessive.
    e. Students know DNA (deoxyribonucleic acid) is the genetic material of living organisms and is located in the chromosomes of each cell.

Diversity of Organisms

3. Biological evolution accounts for the diversity of species developed through gradual processes over many generations. As a basis for understanding this concept:
    1. Students know both genetic variation and environmental factors are causes of evolution and diversity of organisms.
    2. Students know that extinction of a species occurs when the environment changes and the adaptive characteristics of a species are insufficient for its survival.

Structure and Function in Living Systems

5. The anatomy and physiology of plants and animals illustrate the complementary nature of structure and function. As a basis for understanding this concept:
    a. Students know plants and animals have levels of organization for structure and function, including cells, tissues, organs, organ systems, and the whole organism.
    b. Students know the structures and processes by which flowering plants generate pollen, ovules, seeds, and fruit.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Describe the short- and long-term impact of nutritional choices on health.

Identify nutrients and their relationships to health.

Differentiate between diets that are health-promoting and diets linked to disease.

Describe the benefits of eating a variety of foods high in iron, calcium, and fiber.

Analyze the cognitive and physical benefits of eating breakfast daily.

Standard 2: Analyzing Influences

Evaluate internal and external influences on food choices.

Standard 3: Accessing Valid Information

Distinguish between valid and invalid sources of nutrition information.

Standard 5: Decision Making

Use a decision-making process to evaluate daily food intake for nutritional requirements.

Standard 7: Practicing Health-Enhancing Behaviors

Make healthy food choices in a variety of settings.

Standard 8: Health Promotion

Encourage nutrient-dense food choices in school.

Encourage peers to eat healthy foods and to be physically active.

Personal and Community Health

Standard 2: Analyzing Influences

Analyze the influence of culture, media, and technology on health decisions.

Grade Eight

Science Content Standards.

Chemistry of Living Systems (Life Sciences)

6. Principles of chemistry underlie the functioning of biological systems. As a basis for understanding this concept:
    a. Students know that carbon, because of its ability to combine in many ways with itself and other elements, has a central role in the chemistry of living organisms.
    b. Students know that living organisms are made of molecules consisting largely of carbon, hydrogen, nitrogen, oxygen, phosphorus, and sulfur.
    c. Students know that living organisms have many different kinds of molecules, including small ones, such as water and salt, and very large ones, such as carbohydrates, fats, proteins, and DNA.

Health Standards

Nutrition and Physical Activity

Standard 1: Essential Concepts

Describe the short- and long-term impact of nutritional choices on health.

Identify nutrients and their relationships to health.

Differentiate between diets that are health-promoting and diets linked to disease.

Describe the benefits of eating a variety of foods high in iron, calcium, and fiber.

Analyze the cognitive and physical benefits of eating breakfast daily.

Standard 2: Analyzing Influences

Evaluate internal and external influences on food choices.

Standard 3: Accessing Valid Information

Distinguish between valid and invalid sources of nutrition information.

Standard 5: Decision Making

Use a decision-making process to evaluate daily food intake for nutritional requirements.

Standard 7: Practicing Health-Enhancing Behaviors

Make healthy food choices in a variety of settings.

Standard 8: Health Promotion

Encourage nutrient-dense food choices in school.

Encourage peers to eat healthy foods and to be physically active.

Personal and Community Health

Standard 2: Analyzing Influences

Analyze the influence of culture, media, and technology on health decisions.