



5th Grade Standards

Science Curriculum Topics: water cycle, earth structure, rock formation, erosion, plate tectonics, faulting, soil (composition, formation and layering) and the impacts of human activities.

Science Content Standards: Life Sciences (2e, 2f, and 2g), Earth Sciences (3a, 3b, 3c, 3d, 3e and 5a) and Investigation and Experimentation (6a)

Life Sciences

2. Plants and animals have structures for respiration, digestion, waste disposal, and transport of materials. As a basis for understanding this concept:

e. Students know how sugar, water, and minerals are transported in a vascular plant.

f. Students know plants use carbon dioxide (CO₂) and energy from sunlight to build molecules of sugar.

g. Students know plant and animal cells break down sugar to obtain energy, a process resulting in carbon dioxide (CO₂) 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 most of Earth's water is present as salt water in the oceans, which cover most of Earth's surface

b. Students know when liquid water evaporates; it turns to 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.

c. Students know water vapor in the air moves from one place to another and can form fog or clouds, which as tiny droplets of water or ice, and can fall to earth as rain, hail, sleet, or snow.

d. Students know that the amount of fresh water located in rivers, lakes, underground sources, and glaciers is limited and that availability can be extended by recycling and decreasing the use of water.

e. Students know the origin of the water used by their local communities.

5. The solar system consists of planets and other bodies that orbit the Sun in predictable paths. As a basis for understanding this concept:

a. Students know the Sun, an average star, is the central and largest body in the solar system and is composed of primarily hydrogen and helium.



6. 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. Classify objects (e.g., rocks, plants, leaves) in accordance with appropriate criteria.
- h. Draw conclusions from scientific evidence and indicate whether further information is needed to support a specific conclusion.
- i. Write a report of an investigation that includes conducting tests, collecting data or examining evidence, and drawing conclusions.