



**PETALUMA CITY SCHOOLS**  
**CONTENT STANDARDS**  
WITH POWER STANDARDS IN BOLD

# **Grade One**

# **Science**

## **Investigation and Experimentation**

- 1. 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. Draw pictures that portray some features of the thing being described.**
  - b. Record observations and data with pictures, numbers, or written statements.**
  - c. Record observations on a bar graph.**
  - d. Describe the relative position of objects by using two references (e.g., above and next to, below and left of).**
  - e. Make new observations when discrepancies exist between two descriptions of the same object or phenomenon.**

## **Physical Sciences**

- 1. Materials come in different forms (states), including solids, liquids, and gases. As a basis for understanding this concept:**
  - a. Students know solids, liquids, and gases have different properties.**
  - b. Students know the properties of substances can change when the substances are mixed, cooled, or heated.**

## **Life Sciences**

- 3. 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**

- 4. Weather can be observed, measured, and described. As a basis for understanding this concept:**
  - a. Students know how to use simple tools (e.g., thermometer, wind vane) to measure weather conditions and record changes from day to day and across the seasons.**
  - b. Students know that the weather changes from day to day but that trends in temperature or of rain (or snow) tend to be predictable during a season.**
  - c. Students know the sun warms the land, air, and water.**