

## Eads Elementary School Science Standards 1<sup>st</sup> Grade

### **SCIENCE STANDARD #1**

Students understand the processes of scientific investigation and design, conduct, communicate about, and evaluate such investigations.

<b>Ref.</b>	<b>Expectation</b>	<b>P</b>	<b>PP</b>	<b>NI</b>	<b>US</b>
1.1.a.	Talk about the question they are going to answer.				
1.1.b.	Answer questions that begin with “What do you think will happen if ...?”				
1.1.c.	Use tools (eg: hand lens, primary balance, thermometer) to do things.				
1.1.d.	Match tools with the weather conditions they measure (eg: thermometer measures temperatures).				
1.1.e.	Match a temperature with words (eg: 10 F is cold, 90 F is hot).				
1.1.f.	Describe things using appropriate senses.				
1.1.g.	Use more than one sense when making observations.				
1.1.h.	Draw and color pictures showing the main characteristics.				
1.1.i.	Plot their own data on a class bar graph.				
1.1.j.	Use their graph to answer questions.				
1.1.k.	Find patterns by answering questions about similarities and differences.				
1.1.l.	Tell what they saw and did during an activity.				

### **SCIENCE STANDARD #2**

**PHYSICAL SCIENCE:** Students know and understand common properties, forms, and changes in matter and energy. **Properties of Objects:** In first grade, students learn to describe properties of objects and materials.

<b>Ref.</b>	<b>Expectation</b>	<b>P</b>	<b>PP</b>	<b>NI</b>	<b>US</b>
1.2.a.	Observe and describe objects in terms of common physical properties (eg: size, shape, color, texture, and flexibility).				
1.2.b.	Give detailed descriptions that make it possible to identify an object.				
1.2.c.	Use physical properties to sort objects.				
1.2.d.	Tell how two objects are the same based on properties.				
1.2.e.	Name the materials from which an object is made (eg: plastic, wood, metal).				
1.2.f.	Sort objects based on the materials they’re made of.				
1.2.g.	Measure the length of objects using nontraditional measures.				
1.2.h.	Measure the mass of objects using a primary balance.				
1.2.i.	Use their measurements to compare the sizes of two objects.				
1.2.j.	Put several objects in order of length or mass.				

### **SCIENCE STANDARD #3:**

**LIFE SCIENCE:** Students know and understand the characteristics and structure of living things, the processes of life, and how living things interact with each other and

their environments. Animals and Their Needs: In first grade, students learn how animals are similar and yet different with respect to body parts, needs, and where they live.

Ref.	Expectations	P	PP	NI	US
1.3.a.	Group animals according to selected characteristics (eg: with wings, with 6 legs, with fur).				
1.3.b.	Name animals that are found around the school or in the neighborhood (eg: fly, worm, robin).				
1.3.c.	Name the basic needs of all animals (food, water, air, shelter).				
1.3.d.	Describe the basic needs of specific kinds of animals.				
1.3.e.	Describe shelters used by particular animals.				
1.3.f.	Realize that animals eat plants and other animals in order to live.				
1.3.g.	Give examples of foods eaten by animals in the classroom (eg: fish, snails, pill bugs).				
1.3.h.	Compare the foods eaten by two types of animals.				
1.3.i.	Point out characteristics that are common to all animals of a specific kind (eg: birds have feathers, fish have fins).				
1.3.j.	Tell how specific body parts of specific types of animals.				
1.3.k.	Describe the body parts of specific types of animals (eg: fish, pill bug, snail, bird).				
1.3.l.	Compare how a body part looks with and without magnification (eg: the tentacle of a snail, a segment of a pill bug).				
1.3.m.	Identify a type of animal when several characteristics are described (eg: an animal with fins, two eyes and gills is a fish)				
1.3.n.	Compare two animals of the same group and tell how they're alike (eg: two fish or two birds).				

**SCIENCE STANDARD #4:**

**EARTH AND SPACE SCIENCE:** Students know and understand the processes and interactions of Earth's systems and the structure and dynamics of Earth and other objects in space. Daily Weather: In first grade, students learn that daily weather conditions can be described more accurately by using weather tools.

Ref.	Expectation	P	PP	NI	US
1.4.a.	Compare the temperatures in sunny and shady places.				
1.4.b.	Compare daytime and nighttime temperatures.				
1.4.c.	Explain why the temperature is usually warmer during the daytime.				
1.4.d.	Identify the Sun as being the main source of our heat and light.				
1.4.e.	Give examples of how our daily activities are affected by the weather (eg: wear heavy coat and boots on a snowy day, go swimming on a hot, dry day).				
1.4.f.	Collect and record daily weather data on a chart using pictures, words or numbers (eg: temperature, amount of cloud cover, type of precipitation).				
1.4.g.	Use their weather chart to tell what the weather was on a particular day.				
1.4.h.	Make bar graphs using their weather data.				
1.4.i.	Use their weather graphs to answer questions about the weather (eg: the number of sunny days compared to cloudy days).				

1.4.j.	Describe the weather conditions that are typical of each season in Colorado.				
1.4.k.	Compare the weather conditions of two seasons.				

**SCIENCE STANDARD #5:**

Students know and understand interrelationships among science, technology, and human activity and how they can affect the world.

<b>Ref.</b>	<b>Expectations</b>	<b>P</b>	<b>PP</b>	<b>NI</b>	<b>US</b>
1.5.a.	Realize that people who care for animals (eg: people who work in zoos and pet stores).				
1.5.b.	Realize that weather reporters must know how to describe the weather.				

**SCIENCE STANDARD #6:**

Students understand that science involves a particular way of knowing and understand common connections among scientific disciplines.

<b>Ref.</b>	<b>Expectations</b>	<b>P</b>	<b>PP</b>	<b>NI</b>	<b>US</b>
1.6.a.	Name body parts that are common to all animals of a particular type.				
1.6.b.	Describe the type of weather that characterizes each season.				

Adopted Spring 2003