

**SCIENCE – GRADE 1****Grade:** 1**Academic Standard:** 1.1**Academic Standard Indicator:** 1.1.1**Core Standard:** Yes**Standard Description (Academic or Indicator):** Observe, describe, draw and sort objects carefully to learn about them.**Suggestion for Integrating International Content:** Utilize videos, books, and the Internet to assist students to make observations about the natural world outside of the U.S.**Grade:** 1**Academic Standard:** 1.3**Academic Standard Indicator:** --**Core Standard:** No**Standard Description (Academic or Indicator):** Students investigate, describe, and discuss their natural surroundings. They ask questions about why things move and change.**Suggestion for Integrating International Content:** Have students observe how water changes at different temperatures. Using pictures, discuss melting polar ice caps and warm tropical seas.**Grade:** 1**Academic Standard:** 1.3**Academic Standard Indicator:** 1.3.1**Core Standard:** Yes**Standard Description (Academic or Indicator):** Recognize and explain that water can be a liquid or a solid and can go back and forth from one form to the other. Investigate by observing that if water is turned into ice and then ice is allowed to melt, the amount of water is the same as if was before freezing.**Suggestion for Integrating International Content:** Have students explain changes in matter, such as water, due to temperature changes and consider how oceans in warm climates would be different from oceans in cold climates. Referring to a globe, have students think about how oceans and other bodies of

water differ and how they are affected by temperature changes and phenomena like melting ice caps.

**Grade:** 1**Academic Standard:** 1.3**Academic Standard Indicator:** 1.3.3**Core Standard:** Yes**Standard Description (Academic or Indicator):** Investigate by observing and also measuring that the sun warms the land, air, and water.**Suggestion for Integrating International Content:** Have students consider how the sun warming soil, air, and water affects a country's climate. Discuss how Earth is warm near the equator and cold at the poles.**Grade:** 1**Academic Standard:** 1.4**Academic Standard Indicator:** --**Core Standard:** No**Standard Description (Academic or Indicator):** Students ask questions about a variety of living things and everyday events that can be answered through observations. They become aware of plant and animal interaction. They consider things and processes that plants and animals need to stay alive.**Suggestion for Integrating International Content:** Have students compare ecosystems throughout the world, such as deserts and forests.**Grade:** 1**Academic Standard:** 1.4**Academic Standard Indicator:** 1.4.1**Core Standard:** No**Standard Description (Academic or Indicator):** Identify when stories give attributes to plants and animals, such as the ability to speak, that they really do not have.**Suggestion for Integrating International Content:** Have students analyze

anthropomorphism by discussing stories with international themes that give attributes to plants and animals, such as the ability to speak.

**Suggested resources:** *Grasshopper on the Road* by Arnold Lobel (Harper Collins, 1986); *Errol and His Extraordinary Nose* by David Conway and Roberta Angarano (Holiday House, 2010); *Will You Still Love Me* by Carol Roth and Daniel Howarth (Albert Whitman and Co., 2010); *The Clever Boy and the Terrible, Dangerous Animal* by Idries Shah and Rita Wirlaka (Hoopoe Books, 2005).

**Grade:** 1

**Academic Standard:** 1.4

**Academic Standard Indicator:** 1.4.3

**Core Standard:** Yes

**Standard Description (Academic or Indicator):** Observe and explain that animals eat plants or other animals for food.

**Suggestion for Integrating International**

**Content:** Have students compare the nutrients of local animals and plants with the animals and plants of a different region in the world.

**Grade:** 1

**Academic Standard:** 1.5

**Academic Standard Indicator:** 1.5.1

**Core Standard:** No

**Standard Description (Academic or Indicator):** Use numbers, up to 10, to place objects in order, such as first, second, and third, and to name them, such as bus numbers or phone numbers.

**Suggestion for Integrating International**

**Content:** Teach students to count to ten in various languages.

**Grade:** 1

**Academic Standard:** 1.5

**Academic Standard Indicator:** 1.5.2

**Core Standard:** No

**Standard Description (Academic or Indicator):** Make and use simple graphs to tell about observations.

**Suggestion for Integrating International**

**Content:** Have students compare ecosystems, such as deserts, forests, and rainforests, and then create or use simple graphic organizers to compare and contrast these ecosystems.

**Grade:** 1

**Academic Standard:** 1.6

**Academic Standard Indicator:** 1.6.1

**Core Standard:** Yes

**Standard Description (Academic or Indicator):** Observe and describe that models, such as toys, are like the real things in some ways but different in others.

**Suggestion for Integrating International**

**Content:** Have students observe fruits and flowers from their local community and other countries. Then have them draw a large Venn diagram, labeling one side *community flowers* and the other side *flowers native to another region*. Have students consider how the flowers are alike or different, whether certain flowers could grow in their community, whether they would rather have a flower from their home community or another region, and why. Do the same with fruits.

**Grade:** 1

**Academic Standard:** 1.6

**Academic Standard Indicator:** 1.6.2

**Core Standard:** Yes

**Standard Description (Academic or Indicator):** Observe that and describe how certain things change in some ways and stay the same in other such as in their color, size and weight.

**Suggestion for Integrating International**

**Content:** Have students compare pictures of unique baby animals from various countries to pictures of those same animals as adults. They should observe ways the animals changed and ways they stayed the same from childhood to adulthood. Include animals like bushbabies or galagos, ball pythons, warthogs, lemurs, naked mole-rats, and nilgiri tahr.