

State: GA

Subject: Science (GSE)

Grade Level: 5

| Standard | Study Island Topic |
|--|---|
| Earth and Space Science | |
| S5E1. Obtain, evaluate, and communicate information to identify surface features on the Earth caused by constructive and/or destructive processes. | |
| <p>S5E1.a Construct an argument supported by scientific evidence to identify surface features (examples could include deltas, sand dunes, mountains, volcanoes) as being caused by constructive and/or destructive processes (examples could include deposition, weathering, erosion, and impact of organisms).</p> | <ul style="list-style-type: none"> • Changes in Landforms |
| <p>S5E1.b Develop simple interactive models to collect data that illustrate how changes in surface features are/were caused by constructive and/or destructive processes.</p> | <ul style="list-style-type: none"> • Changes in Landforms |
| <p>S5E1.c Ask questions to obtain information on how technology is used to limit and/or predict the impact of constructive and destructive processes.</p> | <ul style="list-style-type: none"> • Earth's Surface Processes & Technology |
| Physical Science | |
| S5P1. Obtain, evaluate, and communicate information to explain the differences between a physical change and a chemical change. | |
| <p>S5P1.a Plan and carry out investigations of physical changes by manipulating, separating and mixing dry and liquid materials.</p> | <ul style="list-style-type: none"> • Physical & Chemical Changes |

| | |
|--|--|
| <p>S5P1.b Construct an argument based on observations to support a claim that the physical changes in the state of water are due to temperature changes, which cause small particles that cannot be seen to move differently.</p> | <ul style="list-style-type: none"> • Physical & Chemical Changes |
| <p>S5P1.c Plan and carry out an investigation to determine if a chemical change occurred based on observable evidence (color, gas, temperature change, odor, new substance produced).</p> | <ul style="list-style-type: none"> • Physical & Chemical Changes |
| <p>S5P2. Obtain, evaluate, and communicate information to investigate electricity.</p> | |
| <p>S5P2.a Obtain and combine information from multiple sources to explain the difference between naturally occurring electricity (static) and human-harnessed electricity.</p> | <ul style="list-style-type: none"> • Electricity |
| <p>S5P2.b Design a complete, simple electric circuit, and explain all necessary components.</p> | <ul style="list-style-type: none"> • Electricity |
| <p>S5P2.c Plan and carry out investigations on common materials to determine if they are insulators or conductors of electricity.</p> | <ul style="list-style-type: none"> • Electricity |
| <p>S5P3. Obtain, evaluate, and communicate information about magnetism and its relationship to electricity.</p> | |
| <p>S5P3.a Construct an argument based on experimental evidence to communicate the differences in function and purpose of an electromagnet and a magnet.</p> | <ul style="list-style-type: none"> • Magnetism & Electromagnets |
| <p>S5P3.b Plan and carry out an investigation to observe the interaction between a</p> | <ul style="list-style-type: none"> • Magnetism & Electromagnets |

magnetic field and a magnetic object.

Life Science

S5L1. Obtain, evaluate, and communicate information to group organisms using scientific classification procedures.

S5L1.a Develop a model that illustrates how animals are sorted into groups (vertebrate and invertebrate) and how vertebrates are sorted into groups (fish, amphibian, reptile, bird, and mammal) using data from multiple sources.

- **Classification of Organisms**

S5L1.b Develop a model that illustrates how plants are sorted into groups (seed producers, non-seed producers) using data from multiple sources.

- **Classification of Organisms**

S5L2. Obtain, evaluate, and communicate information showing that some characteristics of organisms are inherited and other characteristics are acquired.

S5L2.a Ask questions to compare and contrast instincts and learned behaviors.

- **Inherited & Acquired Traits**

S5L2.b Ask questions to compare and contrast inherited and acquired physical traits.

- **Inherited & Acquired Traits**

S5L3. Obtain, evaluate, and communicate information to compare and contrast the parts of plant and animal cells.

S5L3.a Gather evidence by utilizing technology tools to support a claim that plants and animals are comprised of cells too small to be seen without magnification.

- **The Cell**

S5L3.b Develop a model to identify and label parts of a plant cell (membrane, wall, cytoplasm, nucleus, chloroplasts) and of an animal cell (membrane, cytoplasm, and

- **The Cell**

nucleus).

| | |
|---|---|
| S5L3.c Construct an explanation that differentiates between the structure of plant and animal cells. | <ul style="list-style-type: none">• The Cell |
| S5L4. Obtain, evaluate, and communicate information about how microorganisms benefit or harm larger organisms. | |
| S5L4.a Construct an argument using scientific evidence to support a claim that some microorganisms are beneficial. | <ul style="list-style-type: none">• Microorganisms |
| S5L4.b Construct an argument using scientific evidence to support a claim that some microorganisms are harmful. | <ul style="list-style-type: none">• Microorganisms |