PERCENTAGE POINTS

SECOND GRADE SCIENCE

Course Overview

The performance expectations in second grade help students formulate answers to questions such as: “How does land change and what are some things that cause it to change? What are the different kinds of land and bodies of water? How are materials similar and different from one another, and how do the properties of the materials relate to their use? What do plants need to grow? How many types of living things live in a place?” Second grade performance expectations include PS1, LS2, LS4, ESS1, ESS2, and ETS1 Disciplinary Core Ideas from the Next Generation Science Standards. In the second grade performance expectations, students are expected to demonstrate grade appropriate proficiency in developing and using models, planning and carrying out investigations, analyzing and interpreting data, constructing explanations and designing solutions, engaging in argument from evidence, and obtaining, evaluating, and communicating information. Students are expected to use these practices to demonstrate understanding of the core ideas.

Unit	Estimated Class Time	Overview
Unit 1 Properties of Matter	5 weeks	Students will be able to independently use their learning to apply concepts of cause and effect to identify and test materials for an intended purpose. An understanding of observable properties of materials is developed by students at this level through analysis and classification of different materials.
Unit 2 Changes in Matter	5 weeks	Students will be able to independently use their learning to apply concepts of cause and effect to identify patterns and construct an argument to explain changes in matter. Students extend their understanding of matter by observing and analyzing their changes.
Unit 3 Earth's Changes	5 weeks	Students will be able to use their learning to construct an evidence-based account of slow or rapid changes on Earth and use their learning to apply concepts of cause and effect to identify patterns in the natural world and construct an argument to explain change. Students are able to apply their understanding of the idea that wind and water can change the shape of the land to compare design solutions to slow or prevent such change.
Unit 4 Earth's Systems	5 weeks	Obtain and identify patterns in the water found on Earth such as lakes, rivers, ponds and oceans that can be observed in solid and liquid forms. Students are able to use information and models to identify and represent the shapes and kinds of land and bodies of water in an area and where water is found on Earth.
Unit 5 Ecosystems and Interactions	5 weeks	Students will be able to independently use their learning to explain how a new plant species appeared where it had not existed before and how the new habitat meets the plants needs to survive. Students are expected to develop an understanding of what plants need to grow and how plants depend on animals for seed dispersal and pollination.
Unit 6 Plant and Animal Habitats	5 weeks	Students will be able to independently use their learning to determine where living things are found and how they are able to get what they need to survive in their habitat. Students are also expected to compare the diversity of life in different habitats.

Content Continuum

1	Grade 1 Science
2	Grade 2 Science
3	Grade 3 Science

INSTRUCTIONAL / SUPPLEMENTAL MATERIALS

1. Textbook: National Geographic *Exploring Science*
2. Supplemental readings and online resources to enhance understanding of course content and skills:
   - National Geographic Leveled Readers
3. All existing resources will be evaluated for alignment to new curriculum.

KEY FEATURES OF REVISION

- Real World Scenario based learning available in each PBA
- Student access to digital resources has expanded
- NJ requires climate change integration into all subjects

Differentiation strategies are included.

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