KINDERGARTEN SCIENCE ORDER OF INSTRUCTION			
1st Nine Weeks	**2nd Nine Weeks**	**3rd Nine Weeks**	**4th Nine Weeks**
Body of Knowledge: Life Science *(2 benchmarks)* Big Idea 14: Organization and Development of Living Organisms (SC.K.L.14.1, SC.K.L.14.2)	**Body of Knowledge: Earth and Space Science** *(6 benchmarks)* Big Idea 5: Earth in Space and Time	**Body of Knowledge: Physical Science** *(5 benchmarks)* Big Idea 8: Properties of Matter Big Idea 9: Changes in Matter Big Idea 10: Forms of Energy Big Idea 12: Motion of Objects Big Idea 13: Forces and Changes in Motion	**Body of Knowledge: Life Science** *(1 benchmark)* Big Idea 14: Organization and Development of Living Organisms (SC.K.L.14.3)
Big Idea 1: The Practice of Science The Practice of Science benchmarks should be introduced during the first nine weeks and then embedded in all science lessons throughout the year as they blend easily with teaching inquiry and are the basis of an activity/lab-based science classroom. It is vital that kindergarten students be given multiple opportunities to collaborate with partners, make observations of the natural world using their five senses, keep records of investigations, observe and create visual representations, and recognize that learning comes from careful observation. Lab safety and the use of scientific tools should also be introduced at the beginning of the year and re-addressed throughout the year.			

Rationale for Kindergarten Order of Instruction:

1st Nine Weeks
Life Science benchmarks 14.1 and 14.2 (Big Idea 14) are taught in the first grading period because brain-based research shows that kindergarteners are still developmentally "All about Me." This leads to beginning the school year with the five senses.

2nd Nine Weeks
Earth and Space Science benchmarks are taught during the second grading period because the Sun sets earlier at this time of year which allows students the opportunity to make night time observations.

3rd Nine Weeks
Physical Science benchmarks are taught during the third grading period because force and motion concepts are abstract and students are better able to grasp these concepts later in the school year.

4th Nine Weeks

KINDERGARTEN

BODY OF KNOWLEDGE: EARTH SCIENCE

BIG IDEA 5: EARTH IN SPACE AND TIME

Humans continue to explore Earth's place in space. Gravity and energy influence the formation of galaxies, including our own Milky Way Galaxy, stars, the Solar System, and Earth. Humankind's need to explore continues to lead to the development of knowledge and understanding of our Solar System.

ESSENTIAL QUESTIONS

How does gravity affect objects?
How does the day-and-night pattern affect our lives?
What things are seen in the day sky?
What things are seen in the night sky?
How do objects look as seen from the Earth?

BENCHMARKS AND TASK ANALYSES

SC.K.E.5.1 Explore the Law of Gravity by investigating how objects are pulled toward the ground unless something holds them up.
The student:

- drops a variety of objects.
- predicts what will happen when different objects are dropped.
- observes and discusses what happens to objects as they are dropped.
- explores ways to keep objects from falling.

SC.K.E.5.2 Recognize the repeating pattern of day and night.
SC.K.E.5.3 Recognize that the Sun can only be seen in the daytime.
SC.K.E.5.4 Observe that sometimes the moon can be seen at night and sometimes during the day.
The student:

- records observations of the sky during the day for at least one month using science notebooks or a class chart.
- records observations of the sky during the night for at least one month using science notebooks or a class chart (teacher can print moon pictures from weather channel).
- expresses through the use of pictures, diagrams, or orally: understanding of the pattern of day and night, that the Sun can only be seen in the daytime, and that the moon can be seen at night and sometimes during the day

SC.K.E.5.5 Observe that things can be big and things can be small as seen from Earth.
The student:

- identifies that some things seen from Earth are big and some things seen from Earth are small (e.g., a building is big and a student is small).

SC.K.E.5.6 Observe that some objects are far away and some are nearby as seen from Earth.
The student:

- identifies that some things seen from Earth are nearby and some things seen from Earth are far away (e.g., standing next to the board, it is close and standing across the room, the board is far away).

OCPS ESSENTIAL LABS

www.science.ocps.net

Exploring Gravity
Gravity and Parachutes
Pattern of Day and Night
The Sun Is Seen Only in the Daytime
The Moon Is Sometimes Visible during the Day
Big, Small, Near, and Far

VOCABULARY	
gravity, day, night, Sun, moon, Earth, sky	
The textbook is NOT the curriculum. The Next Generation Sunshine State Standards for Science are the mandated curriculum.	
SUPPORTING RESOURCES	
Formative Assessment Probes	*Uncovering Student Ideas in Science*, Page Keeley **SC.K.E.5.3, SC.K.E.5.4** *Vol. 2:* Objects in the Sky
Scott Foresman	**SC.K.E.5.2** 212-213, 220-221, 251a**,** FCAT Test Prep: 72 **SC.K.E.5.3** 212-213, 216-217, 225c**,** FCAT Test Prep: 67, 71, 79, 94 **SC.K.E.5.4** 216-217, 218-219, 224-225, 225c, 225d; **SC.K.E.5.5** 208E, 218-219**,** FCAT Test Prep: 71, 72
AIMS www.aimsedu.org	**SC.K.E.5.1** *E-activity:* If It's Up, It Must Come Down**;** What Goes Up-Must Come Down **SC.K.E.5.2** *Primarily Weather:* Calendar Connections **SC.K.E.5.3** *Primarily Weather:* Calendar Connections **SC.K.E.5.4** *Primarily Weather:* Calendar Connections
Literature	*What Is Gravity?* Lisa Trumbauer *Seasons of the Year,* Margaret Hall *A Week of Weather,* DJ Cortland *Gravity,* Newbridge *Will It Come Down?* Newbridge *The Forces of Gravity,* Newbridge
Web Links	http://www.beaconlearningcenter.com/WebLessons/SunriseSunset/default.htm sky during day and night
Field Experiences	
Other	