

OCPS BENCHMARK TASK ANALYSES

Subject Area: Science
Grade: 1
Body of Knowledge: Nature of Science
Big Idea 1: The Practice of Science

Benchmark Codes	BENCHMARKS
SC.1.N.1.1	Raise questions about the natural world, investigate them in teams through free exploration, and generate appropriate explanations based on those explorations.
SC.1.N.1.2	Using the five senses as tools, make careful observations, describe objects in terms of number, shape, texture, size, weight, color, and motion, and compare their observations with others.
SC.1.N.1.3	Keep records as appropriate - such as pictorial and written records - of investigations conducted.
SC.1.N.1.4	Ask "how do you know?" in appropriate situations.

Benchmark Codes	TASK ANALYSES
SC.1.N.1.1	The student ... <ul style="list-style-type: none"> • raises questions about the natural world. • explores questions about the natural world with a team of students through free exploration and generates appropriate explanations for what was observed.
SC.1.N.1.2	<ul style="list-style-type: none"> • uses the five senses as tools to: <ul style="list-style-type: none"> ○ make careful observations. ○ describe objects in terms of number, shape, texture, size, weight, color, and motion. ○ compare own observations with observations of others.
SC.1.N.1.3	<ul style="list-style-type: none"> • keeps records, such as student-drawn illustrations, science notebooks, or digital media, of investigations conducted.
SC.1.N.1.4	<ul style="list-style-type: none"> • asks "how do you know?" in appropriate situations.



Subject Area: Science
Grade: 1
Body of Knowledge: Earth and Space Science
Big Idea 5: Earth in Space and Time

Benchmark Codes	BENCHMARKS
SC.1.E.5.1	Observe and discuss that there are more stars in the sky than anyone can easily count and that they are not scattered evenly in the sky.
SC.1.E.5.2	Explore the Law of Gravity by demonstrating that Earth's gravity pulls any object on or near Earth toward it even though nothing is touching the object.
SC.1.E.5.3	Investigate how magnifiers make things appear bigger and help people see things they could not see without them.
SC.1.E.5.4	Identify the beneficial and harmful properties of the Sun.

Benchmark Codes	TASK ANALYSES
SC.1.E.5.1	The student ... <ul style="list-style-type: none"> • records personal observations of the sky during the night hours focusing on the placement and amount of stars (many or few). • discusses personal observations emphasizing that there are more stars in the sky than one can easily count and they are not scattered evenly.
SC.1.E.5.2	The student ... <ul style="list-style-type: none"> • explores how objects fall, or are pulled, to the Earth's surface, even when there is nothing touching the object.
SC.1.E.5.3	The student ... <ul style="list-style-type: none"> • observes various objects with and without magnifiers and discusses how observations differ. • observes the differences in observations when using a variety of magnifiers (including hand lenses, telescopes, binoculars, microscopes).
SC.1.E.5.4	The student ... <ul style="list-style-type: none"> • identifies the beneficial and harmful properties of the Sun through discussion, experimentation, and literature experiences.



Subject Area: Science
Grade: 1
Body of Knowledge: Earth and Space Science
Big Idea 6: Earth Structures

Benchmark Codes	BENCHMARKS
SC.1.E.6.1	Recognize that water, rocks, soil, and living organisms are found on Earth's surface.
SC.1.E.6.2	Describe the need for water and how to be safe around water.
SC.1.E.6.3	Recognize that some things in the world around us happen fast and some happen slowly.

Benchmark Codes	TASK ANALYSES
SC.1.E.6.1	The student ... <ul style="list-style-type: none"> recognizes that water, rocks, soil, and living organisms are found on Earth's surface.
SC.1.E.6.2	The student ... <ul style="list-style-type: none"> describes the need for water. recognizes how to be safe around water.
SC.1.E.6.3	The student ... <ul style="list-style-type: none"> records long term observations of various places during different times of the year to see fast and slow changes (soil, plants, weather). discusses current events to recognize that things can happen quickly or slowly in our world.

Subject Area: Science
Grade: 1
Body of Knowledge: Physical Science
Big Idea 8: Properties of Matter

Benchmark Codes	BENCHMARKS
SC.1.P.8.1	Sort objects by observable properties, such as size, shape, color, temperature (hot or cold), weight (heavy or light), texture, and whether objects sink or float.

Benchmark Codes	TASK ANALYSES
SC.1.P.8.1	The student ... <ul style="list-style-type: none"> sorts objects by what can be physically observed: size, shape, color, temperature (hot or cold), weight (heavy or light), texture, and whether objects sink or float.



Subject Area: Science
Grade: 1
Body of Knowledge: Physical Science
Big Idea 12: Motion of Objects

Benchmark Codes	BENCHMARKS
SC.1.P.12.1	Demonstrate and describe the various ways that objects can move, such as in a straight line, zigzag, back-and-forth, round-and-round, fast, and slow.

Benchmark Codes	TASK ANALYSES
SC.1.P.12.1	The student ... <ul style="list-style-type: none"> • moves objects in various ways such as in a straight line, zigzag, back and forth, round and round, fast and slow. • describes the motions of objects observed.

Subject Area: Science
Grade: 1
Body of Knowledge: Physical Science
Big Idea 13: Forces and Changes in Motion

Benchmark Codes	BENCHMARKS
SC.1.P.13.1	Demonstrate that the way to change the motion of an object is by applying a push or a pull.

Benchmark Codes	TASK ANALYSES
SC.1.P.13.1	The student ... <ul style="list-style-type: none"> • changes the motion of an object by applying a push or a pull.



Subject Area: Science
Grade: 1
Body of Knowledge: Life Science
Big Idea 14: Organization and Development of Living Organisms

Benchmark Codes	BENCHMARKS
SC.1.L.14.1	Make observations of living things and their environment using the five senses.
SC.1.L.14.2	Identify the major parts of plants, including stem, roots, leaves, and flowers.
SC.1.L.14.3	Differentiate between living and nonliving things.

Benchmark Codes	TASK ANALYSES
SC.1.L.14.1	The student ... <ul style="list-style-type: none"> records short and long term observations of living things and their environment. discusses which sense was used to make each observation.
SC.1.L.14.2	The student ... <ul style="list-style-type: none"> uses various senses to make observations of different plants. draws pictures of the plants observed. discusses similarities and differences in the plant parts drawn in the pictures. identifies stems, roots, leaves, and flowers.
SC.1.L.14.3	The student ... <ul style="list-style-type: none"> observes that there are similarities and differences between living and non-living things. investigates living and nonliving things in their environment. explains the differences between living and nonliving things.

Subject Area: Science
Grade: 1
Body of Knowledge: Life Science
Big Idea 16: Heredity and Reproduction

Benchmark Codes	BENCHMARKS
SC.1.L.16.1	Make observations that plants and animals closely resemble their parents, but variations exist among individuals within a population.

Benchmark Codes	TASK ANALYSES
SC.1.L.16.1	The student ... <ul style="list-style-type: none"> observes that animals closely resemble their parents. observes that plants closely resemble their parents. observes that variations can exist among individuals within a population.



Subject Area: Science
Grade: 1
Body of Knowledge: Life Science
Big Idea 17: Interdependence

Benchmark Codes	BENCHMARKS
SC.1.L.17.1	Through observation, recognize that all plants and animals, including humans, need the basic necessities of air, water, food, and space.

Benchmark Codes	TASK ANALYSES
SC.1.L.17.1	The student ... <ul style="list-style-type: none"> • observes and recognizes that all plants and animals, including humans, need the basic necessities of air, water, food, and space.

