

2023–2024 Gr4 Science Benchmark Unit 1

Answer Key

Question 1. A – 1 Point

Standards

4-ESS1-1

Identify evidence from patterns in rock formations and fossils in rock layers to support an explanation for changes in a landscape over time.

Question 2. B – 1 Point

Standards

4-ESS1-1

Identify evidence from patterns in rock formations and fossils in rock layers to support an explanation for changes in a landscape over time.

Question 3. C – 1 Point

Standards

4-ESS1-1

Identify evidence from patterns in rock formations and fossils in rock layers to support an explanation for changes in a landscape over time.

Question 4. A – 1 Point

Standards

4-ESS1-1

Identify evidence from patterns in rock formations and fossils in rock layers to support an explanation for changes in a landscape over time.

Question 5. B – 1 Point

Standards

4-ESS2-1

Make observations and/or measurements to provide evidence of the effects of weathering or the rate of erosion by water, ice, wind, or vegetation.

Question 6. B – 1 Point

Standards

4-ESS2-1

Make observations and/or measurements to provide evidence of the effects of weathering or the rate of erosion by water, ice, wind, or vegetation.

Question 7. D – 1 Point

Standards

4-ESS1-1

Identify evidence from patterns in rock formations and fossils in rock layers to support an explanation for changes in a landscape over time.

Question 8. A – 0 Point | B – 1 Point | C – 1 Point | D – 0 Point

Standards

4-ESS1-1

Identify evidence from patterns in rock formations and fossils in rock layers to support an explanation for changes in a landscape over time.

Question 9. A – 1 Point | B – 0 Point | C – 1 Point | D – 0 Point

Standards

4-ESS2-1

Make observations and/or measurements to provide evidence of the effects of weathering or the rate of erosion by water, ice, wind, or vegetation.

Question 10. B – 1 Point

Standards

4-ESS2-1

Make observations and/or measurements to provide evidence of the effects of weathering or the rate of erosion by water, ice, wind, or vegetation.

Question 11. D – 1 Point

Standards

4-ESS2-1

Make observations and/or measurements to provide evidence of the effects of weathering or the rate of erosion by water, ice, wind, or vegetation.

Question 12. C – 1 Point

Standards

4-ESS2-2

Analyze and interpret data from maps to describe patterns of Earth's features.

Question 13.

What observations can you make from the map of volcanoes and earthquakes?

Select True or False for each sentence.

True

False

⁽¹⁾

Volcanoes form a pattern around the Pacific Ocean.
The pattern is in the shape of a ring or horseshoe.

⁽⁴⁾

Earthquakes do not form any kind of pattern.

⁽⁵⁾

Volcanoes and earthquakes have similar patterns of
where they are located.

• (1) – 1 Point | (4) – 1 Point | (5) – 1 Point

Standards

4-ESS2-2

Analyze and interpret data from maps to describe patterns of Earth's features.

Question 14. O – 3 Points

Standards

4-ESS3-2

Generate and compare multiple solutions to reduce the impacts of natural Earth processes and climate change have on humans.