

Carbon Cycle

This app explores the carbon cycle. Use this app to supplement your lesson on carbon and the carbon cycle.

For game help, visit www.carpix.org/CarbonCycleGame.pdf

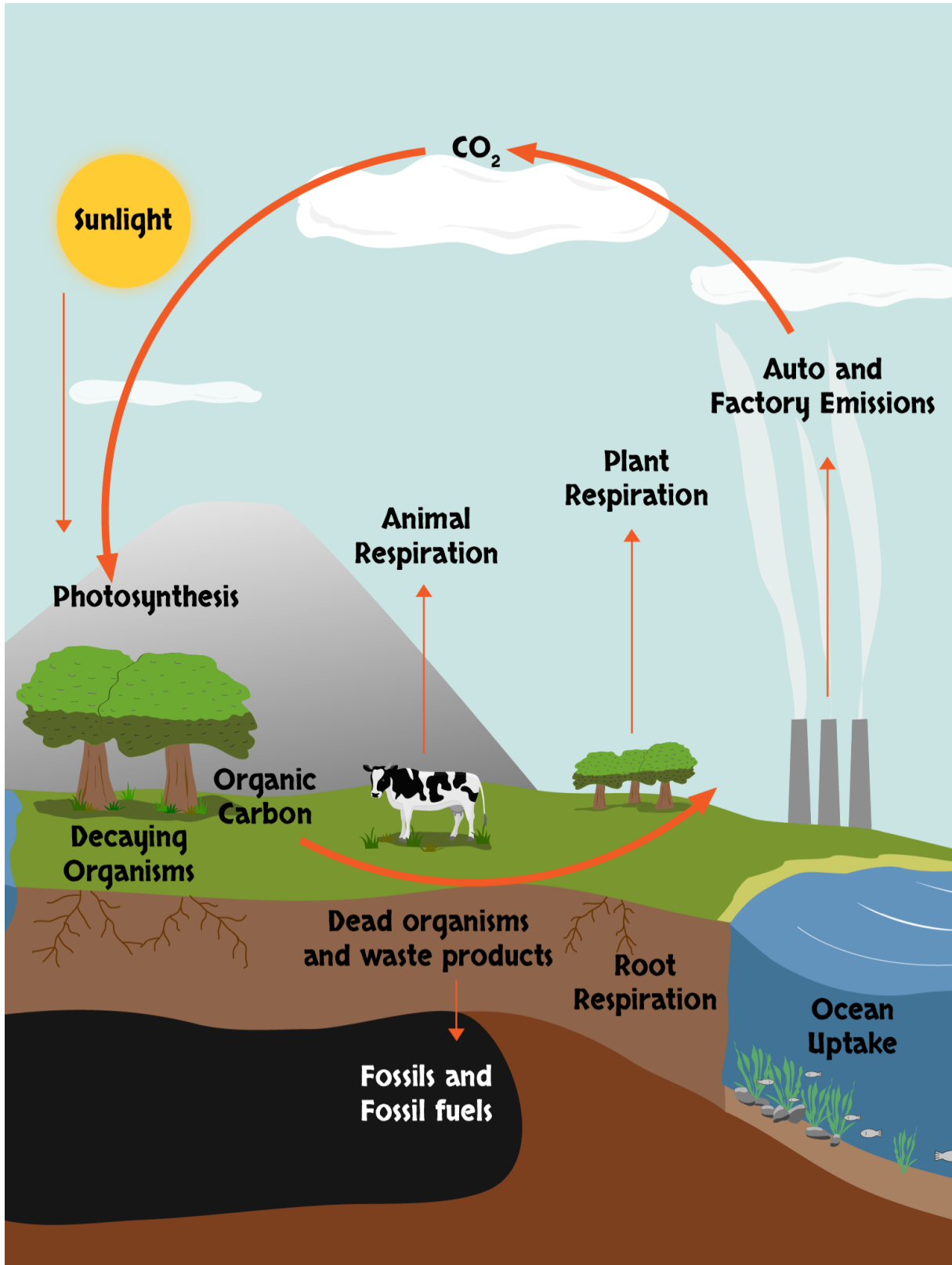
For additional help, to request a refund or to submit feedback, email carboncycle@caripix.org

The game component of this app is based on the EPA's The Incredible Carbon Journey (https://www3.epa.gov/airnow/teachers/rb_carboncycle_activity.pdf) and allows students to model the journey that carbon may undergo as it transforms through Earth's domains.

Use the student worksheet below to help students think critically as they play the game.

Allow students to explore the glossary and the carbon cycle interactive page before taking the quiz.

Carbon Cycle



Name: _____



Quiz

1. What Earth domain is made up of living things?
 - A. Lithosphere
 - B. Biosphere
 - C. Atmosphere
 - D. Hydrosphere

2. What Earth domain is made up of the air?
 - A. Lithosphere
 - B. Biosphere
 - C. Atmosphere
 - D. Hydrosphere

3. What Earth domain are the oceans a part?
 - A. Lithosphere
 - B. Biosphere
 - C. Atmosphere
 - D. Hydrosphere

4. Rock deep underground are part of which Earth domain?
 - A. Lithosphere
 - B. Biosphere
 - C. Atmosphere
 - D. Hydrosphere

5. The process where plants convert sunlight and carbon dioxide into sugars and oxygen is called photosynthesis.
 - A. True
 - B. False

6. Wild fires release carbon dioxide into the atmosphere.
 - A. True
 - B. False

7. Which of the following processes does not add carbon to the atmosphere?
- A. Respiration
 - B. Erupting volcanoes
 - C. Landslide burying plants
 - D. Burning fossil fuels
8. A versatile element found in all living things, in the atmosphere, the lithosphere, and the hydrosphere is...
- A. Gold (Au)
 - B. Krypton (Kr)
 - C. Helium (He)
 - D. Carbon (C)
9. Industrialization has decreased the amount of carbon in the atmosphere.
- A. True
 - B. False
10. A process that converts oxygen into carbon dioxide in organisms.
- A. Transpiration
 - B. Respiration
 - C. Digestion
 - D. Expiration
11. A process of evaporation of water from the leaves of plants and uptake of water from roots in the soil.
- A. Transpiration
 - B. Respiration
 - C. Digestion
 - D. Expiration
12. Scientists learn about Earth's ancient climate through...
- A. Ice cores
 - B. Tree rings
 - C. Sediment cores
 - D. All of the above
13. Which of the following naturally releases carbon into the atmosphere?
- A. A gas powered car
 - B. A factory burning coal

- C. A wood burning fireplace
- D. A volcanic eruption

14. What is the atomic number of carbon?

- A. 4
- B. 5
- C. 6
- D. 7

15. How many electrons does one atom of carbon have?

- A. 4
- B. 5
- C. 6
- D. 7

16. How many protons does one atom of carbon have?

- A. 4
- B. 5
- C. 6
- D. 7

17. How many neutrons does one atom of carbon have?

- A. 4
- B. 5
- C. 6
- D. 7

18. What is the make up of carbon dioxide?

- A. 2 carbon atoms and 2 oxygen atoms
- B. 1 carbon atoms and 2 oxygen atoms
- C. 2 carbon atoms and 1 oxygen atom
- D. 3 carbon atoms and 2 oxygen atoms

19. Which everyday product is made up entirely of carbon

- A. Plastic cups
- B. Silverware
- C. Graphite
- D. Wool socks

20. Photosynthesis stops at night.

- A. True
- B. False