

Scientific Text: The Role of Photosynthesis

Photosynthesis is a process used by plants, algae, and some bacteria to convert light energy into chemical energy. This process is essential for the survival of most life forms on Earth. During photosynthesis, green plants take in carbon dioxide from the air and water from the soil. Using sunlight, they transform these raw materials into glucose and oxygen.

The overall reaction of photosynthesis can be summarized by the equation:



This equation shows that six molecules of carbon dioxide and six molecules of water produce one molecule of glucose and six molecules of oxygen.

Photosynthesis not only provides food for plants but also releases oxygen into the atmosphere, which is vital for the survival of animals and humans. Understanding photosynthesis is crucial for addressing global issues such as climate change and food security.

Questions:

Part 1: Parts of Speech (Multiple-Choice)

1. Which of the following is an **action verb**?
 - a) Photosynthesis
 - b) transform
 - c) essential
 - d) energy
2. What is the **plural form** of the noun "plant"?
 - a) plant
 - b) plants
 - c) plant's
 - d) planting

3. Which of these sentences contains an **adjective**?

- a) Plants use sunlight for photosynthesis.
- b) The green leaves absorb light.
- c) Water is essential for life.
- d) Animals need food.

4. Choose the correct **adverb** in this sentence:

Plants grow ___ in the right conditions.

- a) quickly
- b) quick
- c) quicker
- d) quickness

5. What is the **negative form** of the verb "provide"?

- a) do not provides
- b) does not provide
- c) did not provide
- d) provide not

Part 2: Sentence Types (Multiple-Choice)

6. Which of the following is a **simple sentence**?

- a) Photosynthesis is essential for life.
- b) Plants produce glucose, and they release oxygen.
- c) Although important, photosynthesis is often misunderstood.
- d) When plants photosynthesize, they absorb light.

7. Identify the **compound sentence**:

- a) Algae and bacteria also perform photosynthesis.
- b) Plants absorb carbon dioxide, and they release oxygen.
- c) If the conditions are right, photosynthesis occurs efficiently.
- d) The process of photosynthesis is fascinating.

8. Which of the following sentences is **complex**?

- a) Sunlight is a key factor in photosynthesis.
- b) Plants need sunlight, water, and carbon dioxide.
- c) Because it provides oxygen, photosynthesis is vital for life.
- d) Many organisms rely on photosynthesis.

Part 3: Fill-in-the-Blanks

9. Complete the sentence with the correct **verb** form:

Plants __ (use) sunlight to create energy through photosynthesis.

10. Complete the sentence using an **adjective**:

The __ (vital) process of photosynthesis supports life on Earth.

11. Fill in the blank with the correct **relative pronoun**:

The process __ converts light energy into chemical energy is photosynthesis.

12. Complete the sentence with the correct **noun** form:

The __ (produce) of oxygen is crucial for animal life.

13. Choose the correct **connector** for this compound sentence:

Photosynthesis is essential for plants, __ it also benefits animals.

Answer Key:

Part 1:

- 1. b) transform
- 2. b) plants
- 3. b) The green leaves absorb light.
- 4. a) quickly
- 5. b) does not provide

Part 2:

- 6. a) Photosynthesis is essential for life.
- 7. b) Plants absorb carbon dioxide, and they release oxygen.
- 8. c) Because it provides oxygen, photosynthesis is vital for life.

Part 3:

9. use
10. vital
11. that
12. production
13. for