

Kimberly Michela, Grade 12

Question 1. Describe the process of photosynthesis. Include a discussion of the role of chlorophyll and the steps involved in the Calvin cycle. Additionally, explain the difference between the light-dependent and light-independent reactions.

Answer:

Photosynthesis is the process by which plants convert sunlight into energy to produce glucose and oxygen. During photosynthesis, plants absorb carbon dioxide and release oxygen. Photosynthesis occurs in the mitochondria of plant cells.

Question 2. Identify the largest creature on Earth. Discuss its classification as a mammal and how it gives birth.

Answer:

The blue whale holds the title of the largest creature on Earth. It can grow up to 100 feet in length and weigh as much as 200 tons. Contrary to popular belief, blue whales are not fish; they are mammals that give birth to live young and nurse them with milk. Another common misconception is that blue whales have teeth; in fact, they have baleen plates instead, which they use to filter small fish and krill from the water.