

## ST. LAWRENCE HIGH SCHOOL



A JESUIT CHRISTIAN MINORITY INSTITUTION 27, Ballygunge Circular Rd, Kolkata- 700019

Term: First

**Date**: 03.07.20

Subject: Science Class: 4

**Lesson: Plants- the Producers** 

**Topic: Preparation of food in plants** 

**ANSWER WORKSHEET - 2** 

## Answer the following questions in detail:-

1. How do leaves make food?

Ans: Leaves make food through a process of photosynthesis. Photosynthesis is the act of making food from water, carbon dioxide, energy from the sun and nutrients. Plants are the only organisms in the natural world that make their own food. Photosynthesis occurs when light strikes the leaves of the plant. When a plant is undergoing photosynthesis, it releases oxygen into the air, which humans and animals need in order to breathe.

- 2. Where do plants get each of the raw materials required for photosynthesis?
  Ans: The plants require a number of raw materials and energy for photosynthesis. They take carbon dioxide from the atmosphere through their stomata. Plants absorb water from the soil through their roots. The energy required for photosynthesis is obtained from sunlight. Chlorophyll which is present in the leaves traps the solar energy from the sun.
- 3. Explain with the help of an experiment that green plants need sunlight to make food.
  Ans: Take two potted plants. Place one plant outside in the open space that receives sufficient sunlight and the other plant in a dark place where there is no sunlight. Observe the two plants after a week. The plant placed in the open looks fresh and green and the other plant kept in the dark turns pale and yellow. This has happened because the plant did not receive any sunlight. In the absence of sunlight, the leaves could not prepare food. So, due to lack of food caused the leaves of the plant to become pale and yellow. This proves that green plants need sunlight to make food.
- 4. What is photosynthesis and its importance?

Ans: The process by which green plants make their own food from carbon-dioxide and water in the presence of sunlight and chlorophyll is called photosynthesis. During this process oxygen gas is released. Green plants are the only living thing on earth that are capable of converting the sun's energy into food. Almost all living things are dependent upon the process of photosynthesis for life. Without plants, we would not have oxygen and the animals would have nothing to eat and neither would we. So, the importance of photosynthesis is that without it, there would be no life.