

## Photosynthesis

The word photosynthesis has its basis in Greek. Photo means 'light' and synthesis means 'putting together'.

Photosynthesis is the process by which plants make their own food.

In order to do that they need:

- Water – taken into the plants via roots in the soil and transferred to leaves via vessels in the stem
- Carbon dioxide – comes from the air and passes through small holes in the leaves
- Energy from the sun - absorbed by a green chemical in the leaves

Photosynthesis happens in the plant's leaves whereby the sun's energy is used to split water molecules into hydrogen and oxygen

The plant mixes carbon dioxide and hydrogen to make glucose – a sugary substance that is the plant's food

Oxygen is the plant's waste product and excreted through the leaves

The action of photosynthesis produces the oxygen that all living organisms need to live

