



Science – Year 3 Plants

(Previous knowledge – refer to
Knowledge Organiser Year 1 and Year
2 – Plants)

Vocabulary

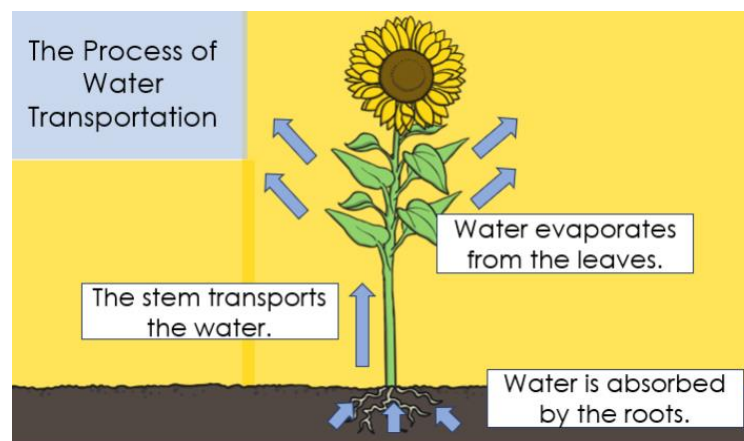
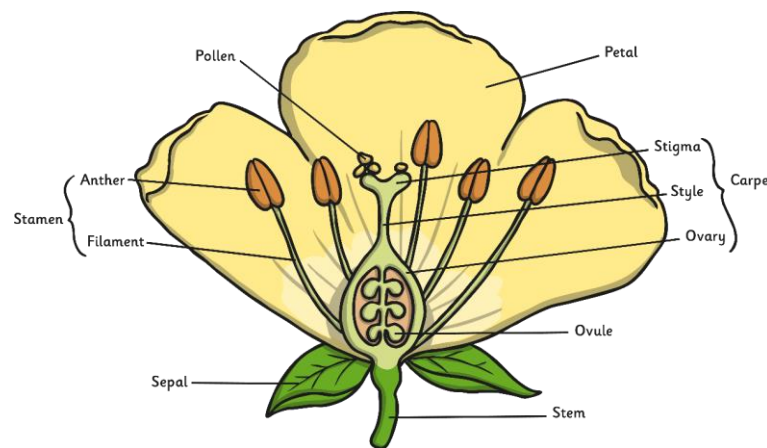
Tier 1	Tier 2	Tier 3
Stem	Germination	Anther
Roots	Flowering	Filament
Leaves	Reproduce	Stigma
Bulb	Pollen	Style
Flower	Pollination	Ovary
Sunlight	Disperse	Fertilisation

Useful Resources

- Flowers to observe, dissect and label.
- Seeds to grow to investigate the life cycle of a plant.
- Food dye to investigate how water is transported around plants.

Key Scientists:

Monique Simmonds - is the deputy director of science at the Royal Botanic Gardens, Kew. She researches uses of plants and fungi. She promotes plant and fungal-based solutions to global challenges.



Key Questions/Facts

What are the parts of a plant and their function?

- Stem: carries water and nutrients from the soil to the flower.
- Roots: absorb water/nutrients from the soil.
- Flower: attract insects and birds to help spread the seeds (pollination).
- Leaves: use sunlight and carbon dioxide from the air to make energy.
- Bulb: A bulb, mostly under the dirt, stores food while the plant is resting from growing.

How is water transported around a plant?

- The roots absorb water from the soil.
- The stem transports water to the leaves.
- Water evaporates from the leaves.
- This evaporation causes more water to be sucked up the stem.
- The water is sucked up the stem.

What is the lifecycle of a flowering plant?

- Germination is when a seed begins to grow.
- The plant grows bigger and then forms flowers.
- Pollination occurs when pollen from the anther is transferred to the stigma, often by an insect.
- Fertilisation happens when pollen travels from the stigma down the style to the ovary.
- The pollen forms a seed inside the ovary.
- Once the seeds are fully formed, the plant needs to disperse them.
- There are lots of different ways that seeds can be dispersed: in water, by the wind, by animals, dropping, shaking and bursting.