

# Plants: Lifecycle and reproduction

## Glossary

**anther** – the part of the stamen that produces the pollen

**carpel** – together the stigma, style and ovary form the carpel - the part of the plant where the female sex cells are produced – ova (eggs)

**dispersal** – the method of moving seeds away from the mature plant – There are four types – **wind, water, animal and explosion** to **disperse** - verb

**fertilisation** – the joining of a male and female sex cell (e.g. pollen and ova) to **fertilise** - verb

**flowering plants** – plants that have flowers in order to reproduce.

**Non-flowering** plants also reproduce

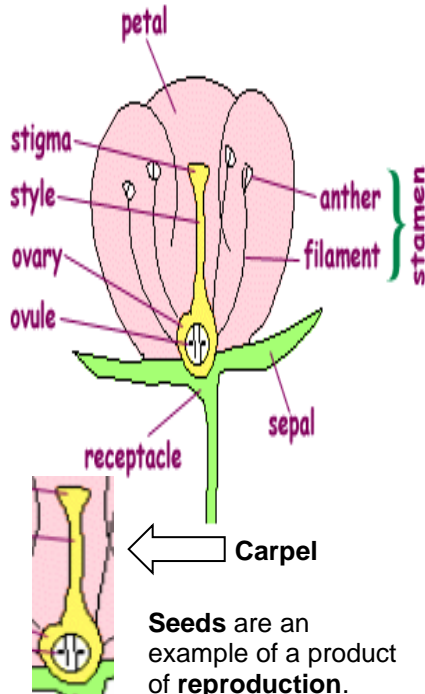
**fruits** – the fleshy parts of the plant containing the seeds

**germination** – the process of beginning growth for a seed to **germinate** - verb

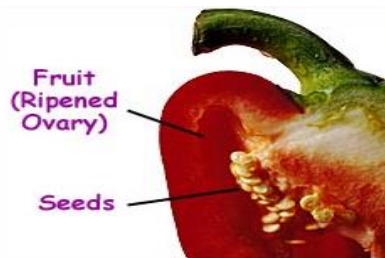
**nutrients** – minerals that are needed for plant growth. They are dissolved in soil water and are taken in by the plant's root system

**ova** – the female sex cells of the plant  
– singular **ovum**

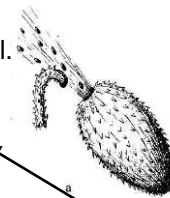
**Nutrients** are minerals needed for plant growth – they are taken in by the plant's root system



**Seeds** are an example of a product of **reproduction**. **Flowering plants** have flowers in order to reproduce



**Explosion dispersal.**  
The squirting cucumber uses this method



**Animal dispersal** – animals like squirrels bury seeds that turn into new trees

## Seed dispersal



Wind dispersal



Water dispersal, such as water lilies



A seed that has **germinated**,

**Germination** is the beginning of the process of growth.



**Pollination** is when pollen is transferred from one flower to another.  
**Fertilisation** is the joining of a male and female sex cell

## Asexual reproduction

Some plants can also reproduce without an egg cell being fertilised to produce a seed. Instead, these plants produce an identical copy of themselves. This type of reproduction is known as asexual reproduction.

Plants can reproduce asexually in a number of different ways. Some plants produce bulbs, like daffodils and snowdrops. Others, like potatoes, produce tubers. These sit under the soil and develop into new plants the next year.



**ovary** – the part of the plant that produces the female sex cells – ova (eggs)

**petal** – the part of the flower which is often brightly coloured

**photosynthesis** – the process by which a plant makes its own food from sunlight

**pollination** – the transfer of pollen from one flower to the stigma of another flower – There are two main agents for pollination – wind and insect to **pollinate** - verb

**reproduction** – the process of making new, young organisms (flowering plants produce seeds) to **reproduce** - verb

**seeds** – the fertilised ova of the plant

**sepal** – the part of the flower that protects it as a bud

**stamen** – together the anther and filament form the stamen - the part of the plant where the male sex cells are produced - pollen

**stigma** – the part of the plant that pollen sticks to and leads to the ovules

**style** – the part of the carpel joining the stigma to the ovary