

Leaf	Petal	Stem	Tuber
Root	Shoot	Petiole	Fruit
Bulb	Seed	Stamen	Corm
Stigma	Node	Flower	Bud





Petiole	Tuber	Bulb	Petal
Bud	Node	Stamen	Seed
Stem	Corm	Shoot	Fruit
Flower	Leaf	Stigma	Root





Node	Stamen	Seed	Shoot
Stigma	Fruit	Tuber	Bulb
Leaf	Corm	Stem	Petiole
Root	Bud	Petal	Flower





Flower	Leaf	Petal	Root
Bud	Stamen	Node	Stem
Corm	Shoot	Stigma	Tuber
Seed	Petiole	Bulb	Fruit





Bulb	Flower	Tuber	Leaf
Stem	Stamen	Petal	Corm
Bud	Shoot	Petiole	Fruit
Stigma	Seed	Node	Root



### BINGO! Parts of a Plant Callsheet



Call each word out in any order. Include the definition for more learning fun!

**Root:** The root system typically lives below the surface of the soil and is the first part of a plant to develop from the seed. The root system absorbs water and minerals for the plant to eat and grow, and helps hold the plant together.

#### Extra Fun Facts:

Roots that appear above the ground are called aerial roots. There are two types of root systems:

1) <u>Taproot System</u>: the main root that grows thick and deep underground, and where all the other roots grow from (we can eat some taproot systems such as carrots).

2) <u>Diffuse Root System</u>: a network of many tinier roots that grow from the taproot.

**Shoot:** The shoot system typically lives above the surface of the soil and consists of the stems and the leaves of a plant.

**Stem:** The stem holds up the plant and works like a straw to bring water and minerals from the roots, to the rest of the plant. It also is where new tissue for the plant is formed. There are two main parts to a stem: 1) Nodes 2) Internodes

**Node:** Nodes are the base where the flower buds, leaves, branches and aerial roots grow out from the stem. Internodes are the section of the stem in between each node. The nodes can be thought of as the important organs of the plant, where the internodes are like the blood vessels that carry water and nutrients to the nodes.



# **Parts of a Plant**

**Leaf:** Leaves grow from the stem's nodes. 'Photosynthesis' happens in the leaves and helps the plant breath and process light into food for the plant. There are two parts to the leaf - the blade and the petiole. The blade is the flat part of the leaf, which has many green, food-making cells and you can often see little 'veins' in leaves that transport the food and nutrients.

**Petiole:** The Petiole is the part of the leaf that attaches to the stem at a node. Since the leaves are responsible for fueling plants through photosynthesis, the petioles are the part of a plant that transports the food made from the leaves to the rest of the plant, and water from the roots to the leaves. It is an important part of the transport system in the plant.

**Bud:** Buds are little bumps, that are the first thing to grow on the stem of a plant, and turn into petioles. Buds can develop into flowers, leaves, or shoots.

**Fruit:** The fruit is part of some flowering plants that helps protect seeds. The tasty outside layer of fruit not only protects the seeds, but helps them move from place to place through seed dispersal.

#### **Extra Fun Facts:**

Do you know the difference between a fruit and a vegetable? If it has seeds, technically it is a fruit. If it does not have seeds, it is a vegetable. Tomatoes, cucumbers, beans, and squash, for example, are fruits, not vegetables.

**Flower:** Flowers are the reproductive part of the plant that contains the seeds, and pollen of the plant. They can reproduce more plants by producing seeds which are contained in fruit. These seeds are then dispersed to grow new plants by: wind, water, animals, and birds - that bring the seeds to new landscapes. Flowers are the most colourful part of a plant, and when you can see these colours, we say that the flowers are in bloom.

#### **Extra Fun Facts:**

Did you know that all fruits come from flowers?



# Parts of a Plant

**Petal:** Petals are modified leaves that are a part of a flowering plant that helps to protect the seeds and help attract pollinators such as bees, birds, and butterflies. Together, all the petals on a flower are called the 'Corolla'.

**Stamen:** Is the male part of a flower that creates pollen and has two parts: the anther and the filament.

**Seed:** Seeds are how flowering plants reproduce. The seed is a small part of a plant that is created so that it can grow new plants - it carries a special nutrients and minerals that helps a new plant to start to grow. We can also eat seeds, such as: rice, wheat, sunflower and pumpkin seeds.

#### **Extra Fun Facts:**

There are two main parts to a seed:

1) <u>Embryo</u>: carries everything that a new plant needs to grow when in the correct environment - and is where the first roots begin to sprout.

2) <u>Seed Skin</u>: a protective layer that carries tissue from the mother plant that protects the embryo until it is ready to start to grow or germinate.

**Corm:** Corms are solid units, found at the base of a stem in some types of plants. You can think of corms like an underground plate that supports the stem system, and serves as an extra storage unit holding important nutrients that can be used to survive different weather conditions such as drought in the summer, or a long cold winter. Corms are where new growth from these types of plants are formed.

**Tuber:** Tubers are a thickened part of the stem found in some types of plants underground. We eat many tubers, like potatoes! The purpose of tubers is to store food, and to create new growth (shoots and buds) from these types of plants.



# Parts of a Plant

**Bulb:** Bulbs are found in some types of plants underground that store food while the rest of the plant is resting from growing. Within true bulbs, there are complete versions of miniature plants inside that are protected by many layers. We eat some bulbs such as onions and garlic.

**Stigma:** Stigma is the female part of a flower that gets pollen from pollinators such as bees. The stigma can be hairy or sticky to trap the pollen.

#### Extra Fun Facts:

When we peel off the outside layer of corn, we can see the 'silky' strings of the corn, which are the plants stigma.

#### Bonus terms (not on Bingo cards):

**Photosynthesis:** Photosynthesis is the process of turning light into food (energy) for the plant. This energy is made up of water, carbon dioxide, and minerals and changes it to oxygen and energy-rich organic food for the plants.

**Anther:** The anther is a little sac that is part of flowering plants that produces grains of pollen.

Filament: The filament is the stalk that holds the anther.

**Germinate:** Germination occurs when a seed starts to grow. When a germinated seed starts to grow, it will produce a little shoot, and becomes a seedling.

#### **Extra Fun Facts:**

A seed will not germinate until its growing requirements are met. These requirements will vary in different plant species.

