

# My Knowledge Journal



## How Does Your Garden Grow?

Name: \_\_\_\_\_

## Pre Knowledge Quiz

1. Write 3 things that plants need in order to grow and stay healthy.

\_\_\_\_\_

2. What is germination?

\_\_\_\_\_

3. Give 2 ways in which seeds can be dispersed to different places.

\_\_\_\_\_

\_\_\_\_\_

4.



Can you explain how this plant has changed?

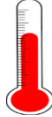
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# Knowledge Organiser




## Key Questions and Facts

<b>What is germination?</b>	<u>Germination</u> is the name for when a plant starts to grow. A plant is germinating when its seed begins to <u>sprout</u> . 
<b>How do seeds and bulbs work?</b>	Inside a seed/bulb is the baby plant (an <u>embryo</u> ). Seeds have a tough layer on the outside to protect the plant (the <u>seed coat</u> ).
<b>Do seeds/bulbs need sunlight to start growing?</b>	Seeds and bulbs do not need sunlight in order to grow. They already have their own <u>food store</u> inside them!
<b>What do seeds/bulbs need in order to become mature plants?</b>	Seeds and bulbs need the <u>right conditions</u> to grow. Normally, they need <u>water, air and the right temperature</u> . This can often be found in well-watered soil!

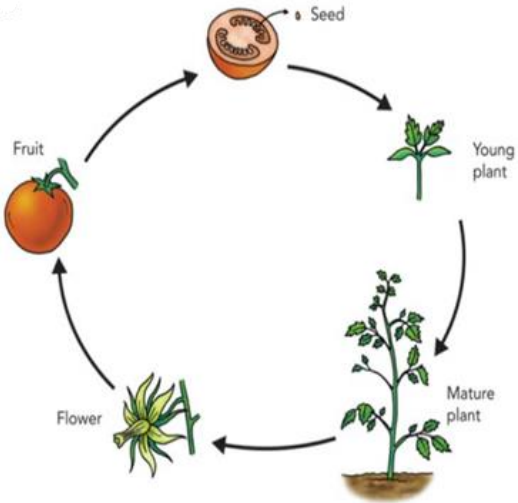
## Let's Investigate

Do all seeds look the same?  
 How are seeds dispersed?  
 What conditions do seeds need in order to germinate?  
 What do plants need in order to grow and stay healthy?  
 How are plants suited to their habitat?

## What do plants need to grow?

<p><u>Water and Nutrients</u></p> <p>Like animals and humans, plants need water and nutrients to survive.</p>  <p>Plants are able to get water from the soil through their roots.</p> <p>They can also catch water on their leaves.</p>	<p><u>Light</u></p>  <p>Plants need lots of sunlight to help them grow.</p> <p>Plants do not eat food. They instead use sunlight to make their own food.</p> <p>Too little light will leave plants weak.</p>
<p><u>Temperature</u></p> <p>Plants need the temperature to be just right for them to grow properly.</p> <p>If it is too hot, they may burn and wilt. If it is too cold, they may freeze and die. This is why there are less plants at the poles and the deserts.</p>	<p><u>Space and Time</u></p>  <p>Plants need room for their roots and stems to be able to grow. Without enough room, they may not grow large enough.</p> <p>Plants also need time – it can take days, months or even years for them to grow.</p>

## What happens in a plant life-cycle?



**Plants have a clear life cycle that helps them to keep reproducing:**

Seeds/bulbs – Plants begin life as seeds or bulbs. They need soil, air and water to grow.

Seedling – Plants grow into young plants. They now need light, temperature, water, space and time to keep growing.

Flowering/Fruit – Plants grow flowers and fruits. These produce seeds. When the plant dies or is pollinated, the seeds find their way to the soil. The process starts again!

## What should I already know?

- Plants are a large group of living things that use sunlight to make their own food.
- There are many, many different kinds of plants, including trees, vines and grasses.
- Plants have lots of different parts, for example stems, leaves and roots.
- Some trees lose their leaves in the winter (deciduous). Some keep their leaves through the year (evergreen).
- Some plants are 'flowering plants' – they grow flowers on them.



## Glossary

<b>seeds</b>	the small parts produced by a plant that develops and grows into a new plant
<b>bulbs</b>	Underground masses of food storage from which plants grow
<b>germination</b>	when the seeds begin to sprout and grow into plants
<b>shoot</b>	a shoot grows upwards from a seed or plant to find sunlight
<b>seed dispersal</b>	When the seeds move away from the parent plant. They can be moved by the wind or by animals.
<b>temperature</b>	how warm or cold somewhere or something is
<b>nutrients</b>	food or nourishment that plants need to grow and develop
<b>Seed coat</b>	A tough layer that protects the seed.
<b>conditions</b>	The amount of light, heat, water and temperature that a seed or plant is exposed to

# My Knowledge Builder

My Previous Knowledge...

New knowledge I have learnt...

Week  
1

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- 
- 

Week  
2

- 
- 
- 

Week  
3

- 
- 
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Week 4	<ul style="list-style-type: none"><li>•</li><li>•</li><li>•</li></ul>
Week 5	<ul style="list-style-type: none"><li>•</li><li>•</li><li>•</li></ul>
Week 6	<ul style="list-style-type: none"><li>•</li><li>•</li><li>•</li></ul>
Week 7	<ul style="list-style-type: none"><li>•</li><li>•</li><li>•</li></ul>

## Post Knowledge Quiz

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