YEAR 5 LIVING THINGS AND THEIR HABITATS

Key Vocabulary				
asexual reproduction	One parent is needed to create an offspring, which is an exact copy of the parent.			
fertilise	The action of fusing the male and female sex cells in order to develop an egg.			
gestation	The length of a pregnancy.			
life cycle	The journey of changes that take place throughout the life of a living thing including birth, growing up and reproduction.			
metamorphosis	An abrupt and obvious change in the structure of an animal's body and their behaviour.			
pollination	The transfer of pollen to a stigma to allow fertilisation.			
reproduction	The process of new living things being made.			
sexual reproduction	Two parents are needed to make offspring which are similar but not identical to either parent.			

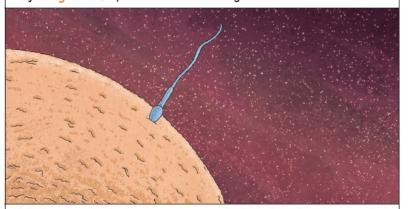
Prior Knowledge — Classification of animals.

Reptiles	Amphibians .	Birds	Fish	Mammals

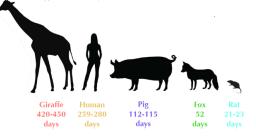
Sexual Reproduction in Mammals

Mammals use sexual reproduction to produce their offspring.

- $\boldsymbol{\cdot}$ The male sex cell, called the sperm, $\boldsymbol{fertilises}$ the female sex cells.
- The fertilised cell divides into different cells and will form a baby with a beating heart.
- The baby will grow inside the female until the end of the **gestation** period when the baby is born.



Echidnas and platypus are mammals but they lay eggs rather than giving birth to live young.





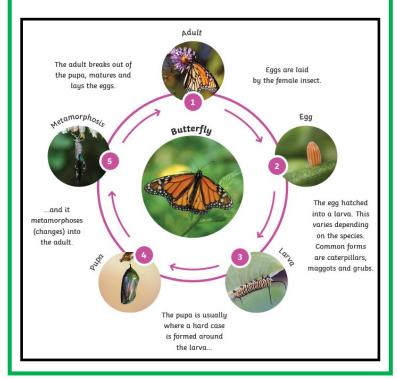


Life Cycles

A life cycle is a series of stages a living thing goes through during its life. For example:

The life cycle of a mammal varies due to life expectancy, gestation period etc.

Mammal life cycles contrast to those of reptiles, birds, amphibians and insects. There are also similarities such as infant dependence.

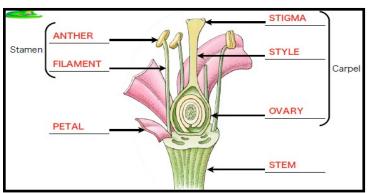


Sexual Reproduction in flowering plants

We will look back at prior learning of parts of a plant: stamen, carpel etc.

The stamen is the male part of a flowering plant. Pollen grains grow on the anther. During pollination, pollen grains are usually transferred from one flower to the carpel of another.

The carpel is the **female** part of a flowering plant. Pollen grains stick to the **stigma**. Pollen tubes grow down the style. A tiny package of genetic information travels down the pollen tube to the **ovary**, where it combines with an egg cell; a seed begins to grow.



Asexual Reproduction in plants

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.

