

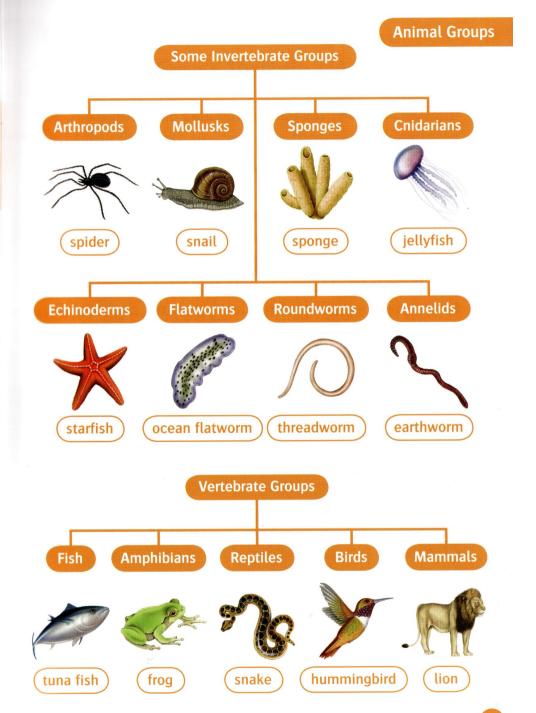
There are millions of different species of animal in the world. Some animals, like the blue whale, are very big. Others are so small that we almost can't see them. These animals all have very different life cycles.

Animal Groups

Scientists put animals into groups. The animals in each group are the same in many ways, and they often have very similar life cycles. The two biggest animal groups are invertebrates and vertebrates.

Invertebrates are animals that have no backbone. More than 95% of the animal species in the world are invertebrates, and most of them are very small. There are many different groups of invertebrates. The biggest group is called arthropods. Insects, spiders, and animals like crabs that have a hard shell, are all arthropods.

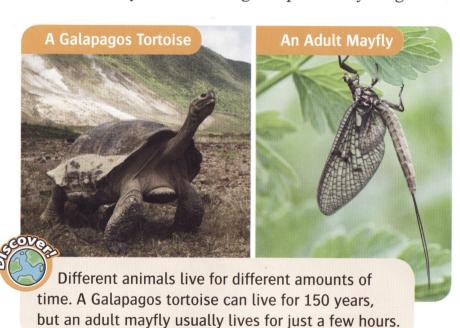
Animals that have a backbone are called vertebrates. Only a few percent of the animals in the world are vertebrates, and most of them are much bigger than invertebrates. Because of this, we see vertebrates more often than invertebrates. Scientists put vertebrates into five big groups – they are called fish, amphibians, reptiles, birds, and mammals.



Staying Alive

All animals need to find food to stay alive. Some animals are carnivores. This means that they eat other animals. Herbivores eat plants, and omnivores eat plants and animals.

There are many dangers for animals. They have to keep safe from predators – animals that hunt and eat other animals. People hunt birds and other animals. People also cut down trees and build houses and roads on land. When they do this, animals lose their homes and their food. Many animals also become sick or die because of pollution of the land, oceans, rivers, and air. Life is very dangerous for animals. Many animals die before they are old enough to produce young.

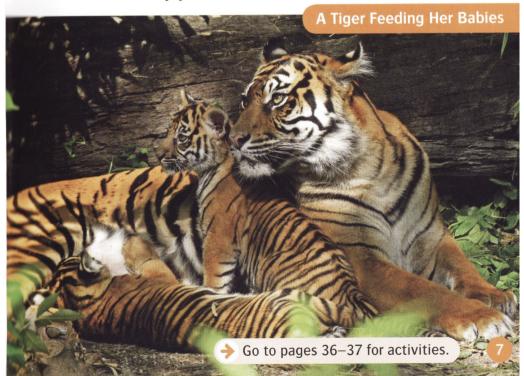


Breeding

Most species of animal have males and females. Males produce sperm, and females produce eggs. Baby animals are made when sperm from the male joins together with an egg from the female. This is called fertilization.

Some animals give birth to baby animals. Other animals, like reptiles and birds, lay eggs. Their babies hatch – they break the egg open and come out.

Most reptiles and birds care for their babies. Most insects and fish do not care for their eggs or their babies. All mammals care for their babies and feed them milk. Some big mammals stay with their babies for many years.



1 Life Cycles

- ← Read pages 4–7.
- 1 Complete the sentences.

vertebrates backbone invertebrates small arthropods

1 Animals that have no backbone are invertebrates.

- are invertebrates
- 2 Most invertebrates are very _____
- 3 The biggest group of invertebrates is the ______.
- 4 95% of the animal species in the world are _____.
- 5 Animals that have a backbone are _____.
- 2 Complete the chart.

threadworm Mammals Echinoderms sponge snail Reptiles Flatworms frog Arthropods

| Invertebrates | | | |
|---------------|----------------|--|--|
| | spider | | |
| Mollusks | | | |
| Sponges | | | |
| Cnidarians | jellyfish | | |
| Echinoderms | starfish | | |
| | ocean flatworm | | |
| Roundworms | | | |
| Annelids | earthworm | | |

| Vertebrates | | |
|-------------|-------------|--|
| Fish | tuna fish | |
| Amphibians | | |
| - 14 | snake | |
| Birds | hummingbird | |
| | lion | |

3 Match

- 1 animals that eat plants and animals
- 2 when sperm joins with an egg
- 3 animals that have a backbone
- 4 animals that produce sperm
- 5 animals that eat plants
- 6 an important group of invertebrates
- 7 an important group of vertebrates
- 8 animals that eat other animals
- 9 animals that produce eggs
- 10 animals that have no backbone

carnivores
invertebrates
herbivores
arthropods
omnivores
fertilization
males
reptiles
females
vertebrates

| 4 Answer the question | 4 | Answer | the | questions | |
|-----------------------|---|---------------|-----|-----------|--|
|-----------------------|---|---------------|-----|-----------|--|

1 How do scientists put animals into groups?

When animals are the same in many ways.

- 2 Why are people dangerous for animals?
- 3 How long can a Galapagos tortoise live for?
- 4 How long does a mayfly usually live for?
- 5 Do birds and reptiles give birth to baby animals?
- 6 How do mammals care for their babies?