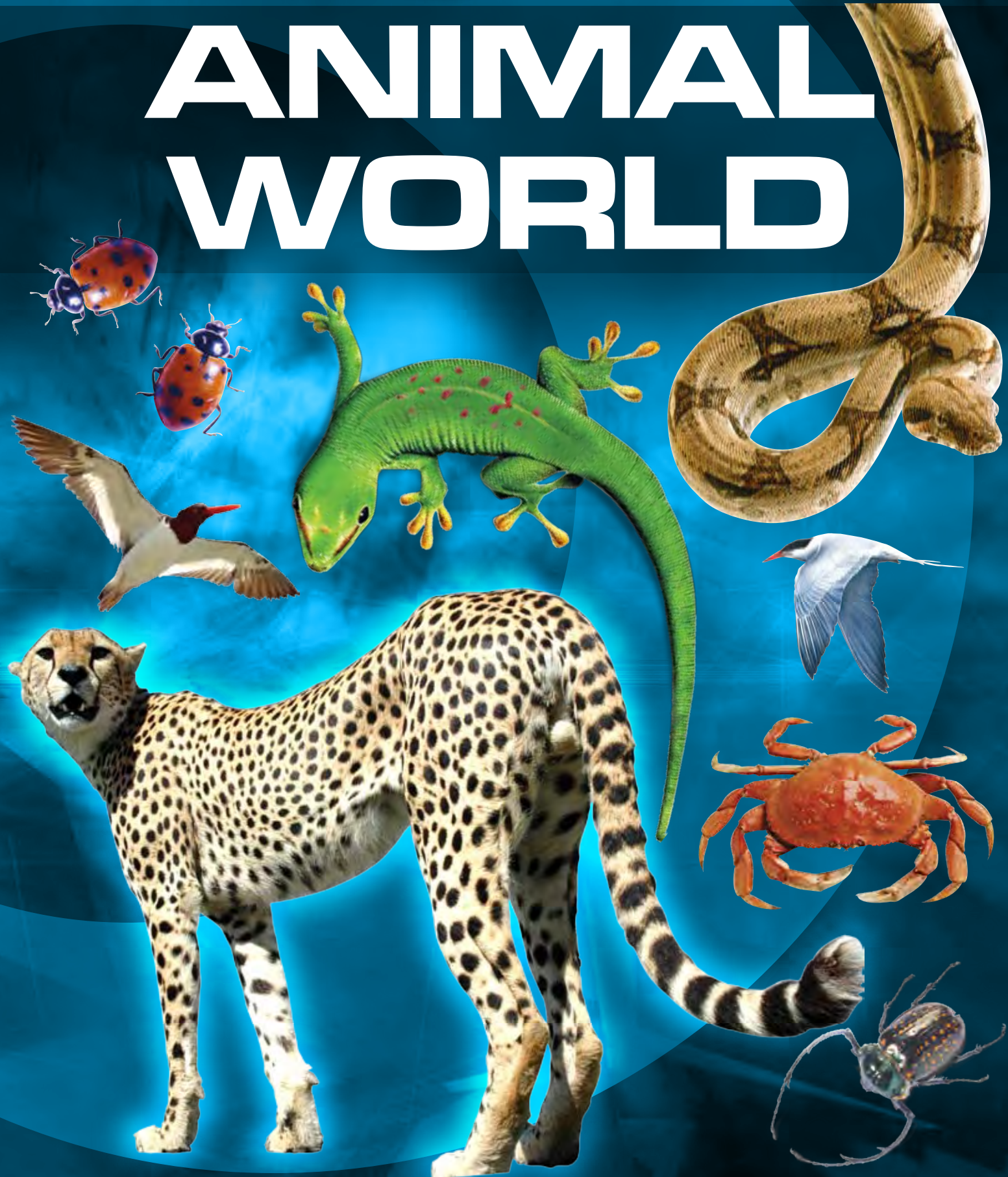


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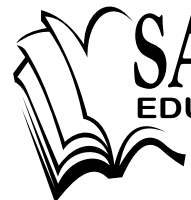
ANIMAL WORLD



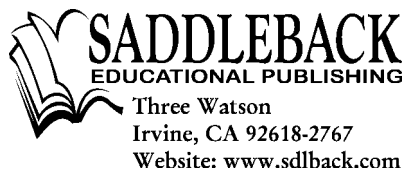
fact scope



Animal World



SADDLEBACK
EDUCATIONAL PUBLISHING



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ISBN-10: 1-59905-232-6

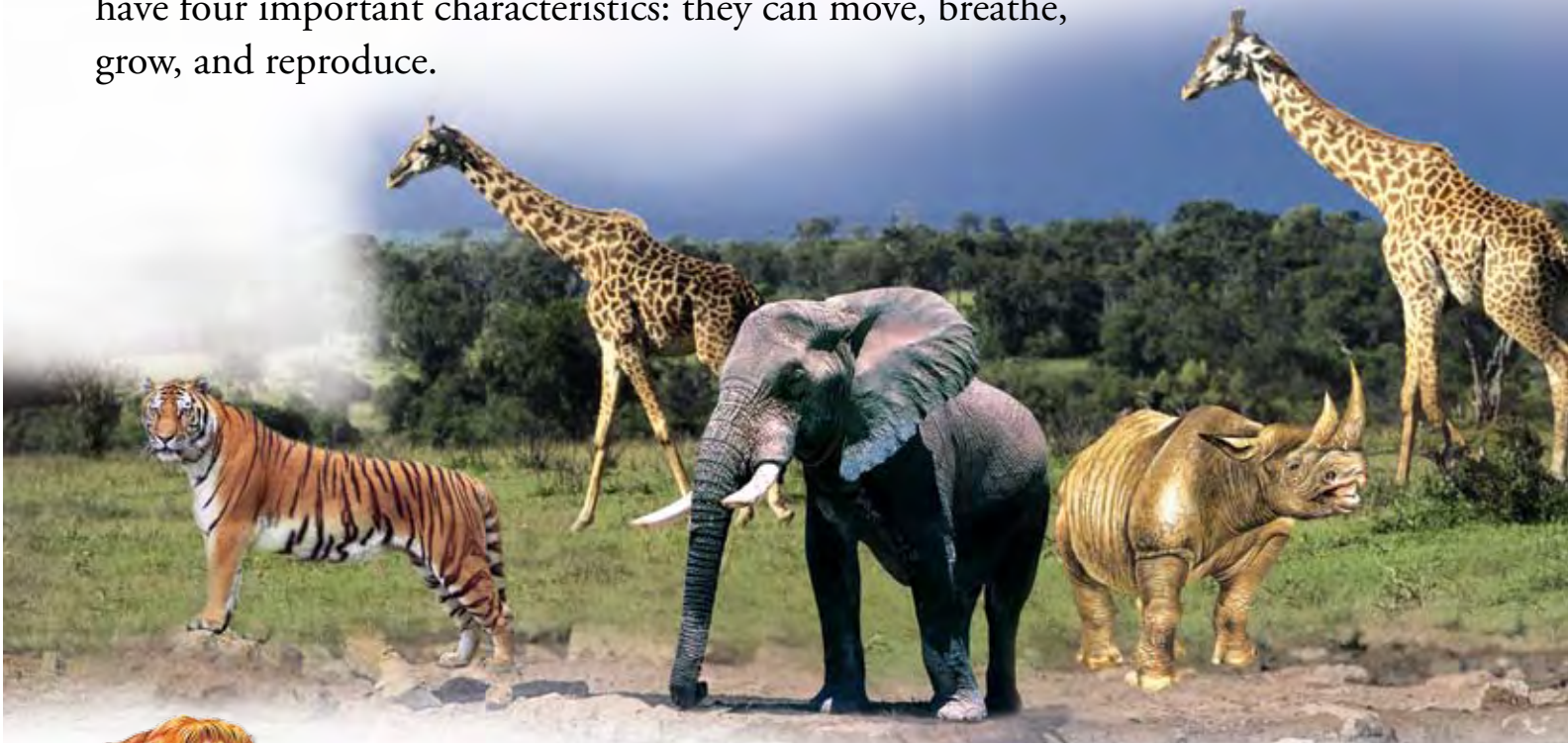
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eBook: 978-1-60291-594-7

Animals



Animals form one of the largest groups of living organisms. Scientists believe that there may be around 30 million different kinds of animals living on the planet. They range in size from the tiny mosquito to the gigantic blue whale. All animals have four important characteristics: they can move, breathe, grow, and reproduce.

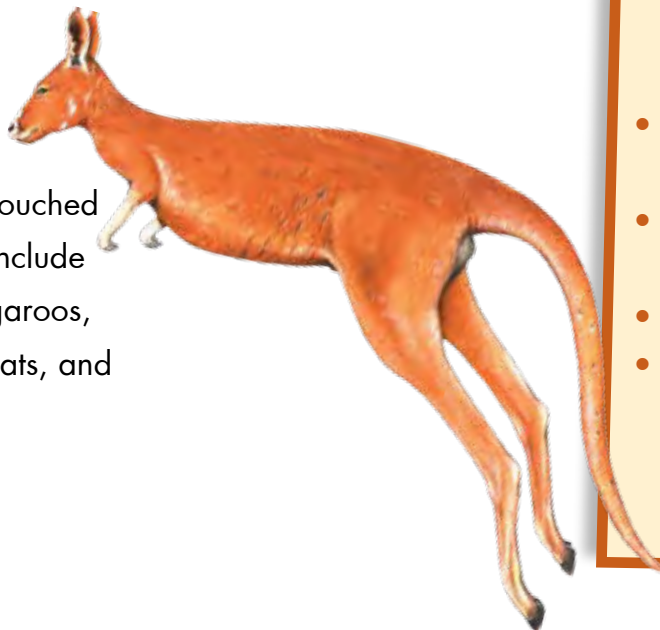


Primates

Primates are placental mammals. They include human beings, apes, monkeys, lemurs, and prosimians or lesser primates, such as lorises and aye-eyes.

Marsupials

Marsupials are pouched mammals. They include animals like kangaroos, opossums, wombats, and koalas.



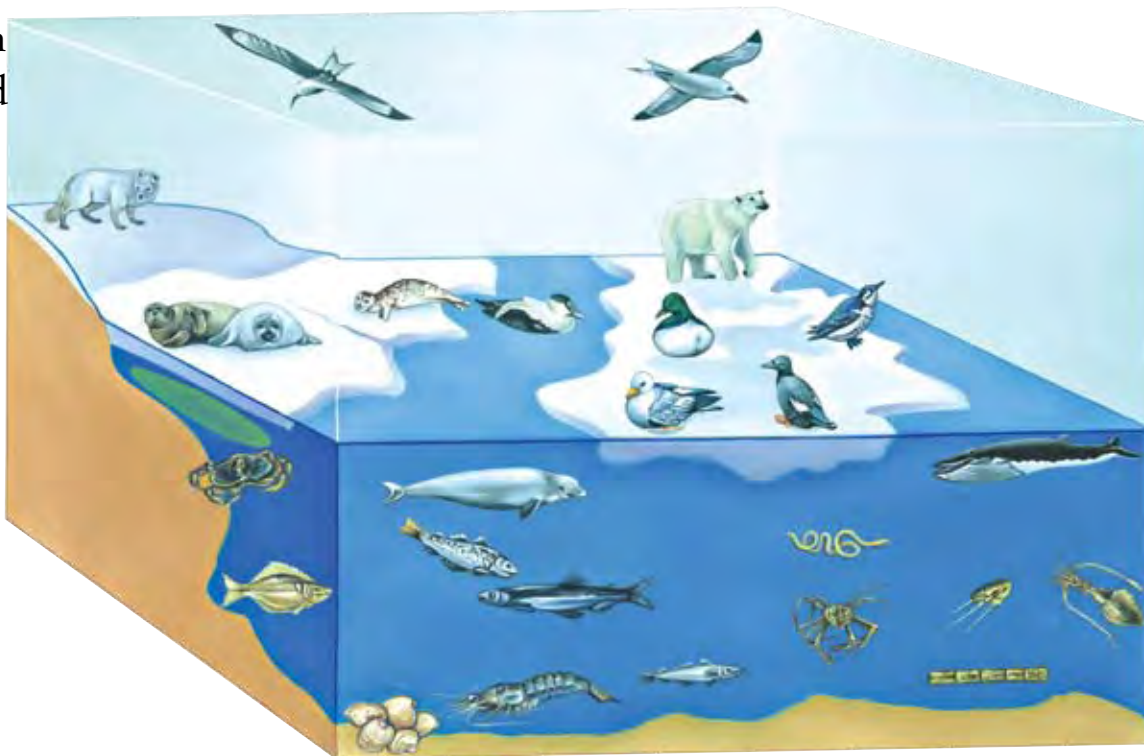
fact scope

- The fastest land animal is the cheetah with a maximum speed of 60–68 mph.
- The sloth is one of the slowest animals and can even take up to a month to digest its food.
- The biggest animal that ever lived on the earth is the blue whale.
- The biggest land mammal is the African elephant.
- Tallest mammal – the giraffe
- Smallest mammals – the pygmy shrew (weighing .04–.09 oz) and the bumblebee bat (weighing about .07 oz)



Evolution

The ancestor of all modern animals is believed to be protozoa. They represent present day descendants of the earliest forms of life on the planet. During the Cambrian explosion, around 540 million years ago, several complex multicellular organisms appeared on the earth. Most fossil finds of the earliest living organisms belong to this period.



Six Eras

There are six eras on the geological timescale. They are Hadean, Archaean, Proterozoic, Paleozoic, Mesozoic, and Cenozoic.

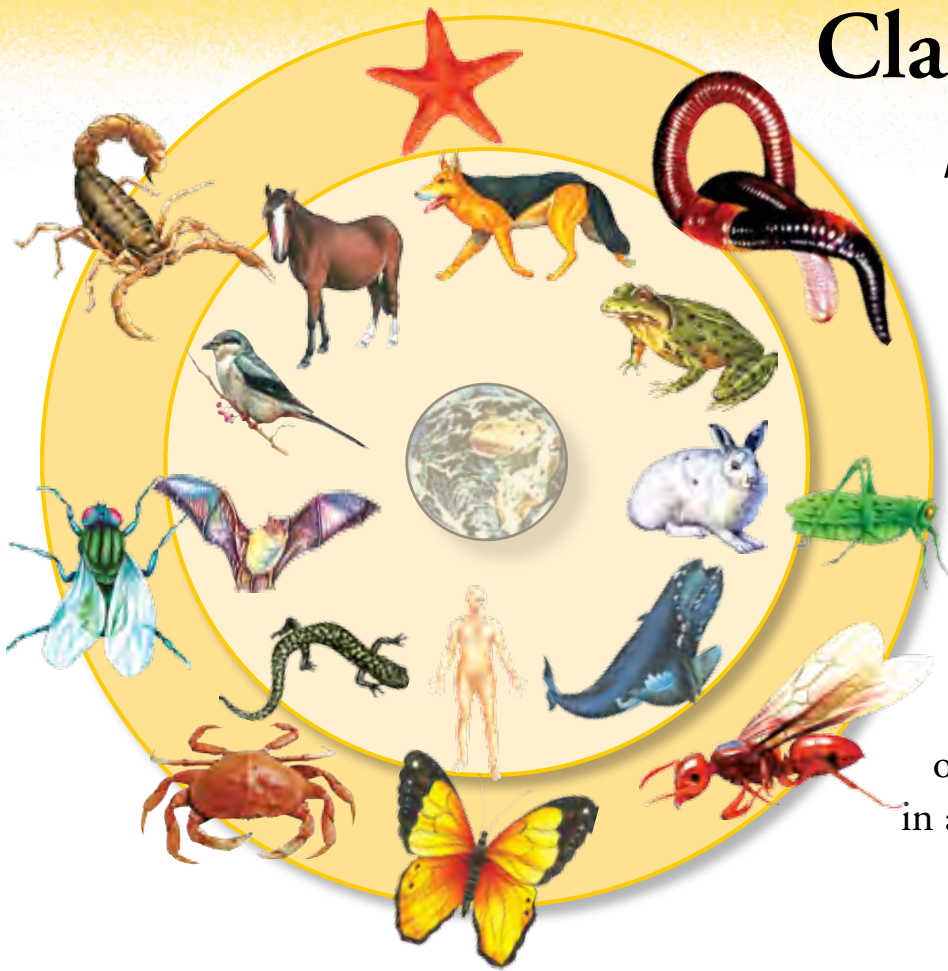
Hadean Era

The Hadean era contained the building blocks of life such as amino acid and proteins. It lasted approximately from 3.8 to 4.5 billion years ago.

fact scope

- Anthozoans were cnidarians that lived at least 550 million years ago.
- In the Cambrian period, the first mineralized coral-like organisms appeared.
- True corals appeared during the middle Triassic.
- Oxygen began building up in the atmosphere during the Proterozoic era.
- Simple bacteria and plant-like algae evolved during the Archean era about 3.8 to 2.5 billion years ago.
- Many life forms began to flourish during the Paleozoic era.
- Dinosaurs evolved during the Mesozoic era.
- Several complex multicellular organisms appeared on the earth during the Cambrian explosion.

Classification



The world of living things is generally divided into five kingdoms. Animals belong to the kingdom Animalia, one of the five kingdoms. The kingdom Animalia consists of multicellular organisms that generally develop from an embryo. Animals are heterotrophs i.e., they eat other organisms as their food in any form.

Hierarchy of Classification

Kingdom, Phylum, Class, Order, Family, Genus, Species

Scientific Classification

- | | |
|----------------------------|---------------------------|
| a. Kingdom Animalia | b. Phylum Chordata |
| c. Class Mammalia | d. Order Carnivora |
| e. Family Felidae | f. Genus Panthera |
| g. Species Leo | |



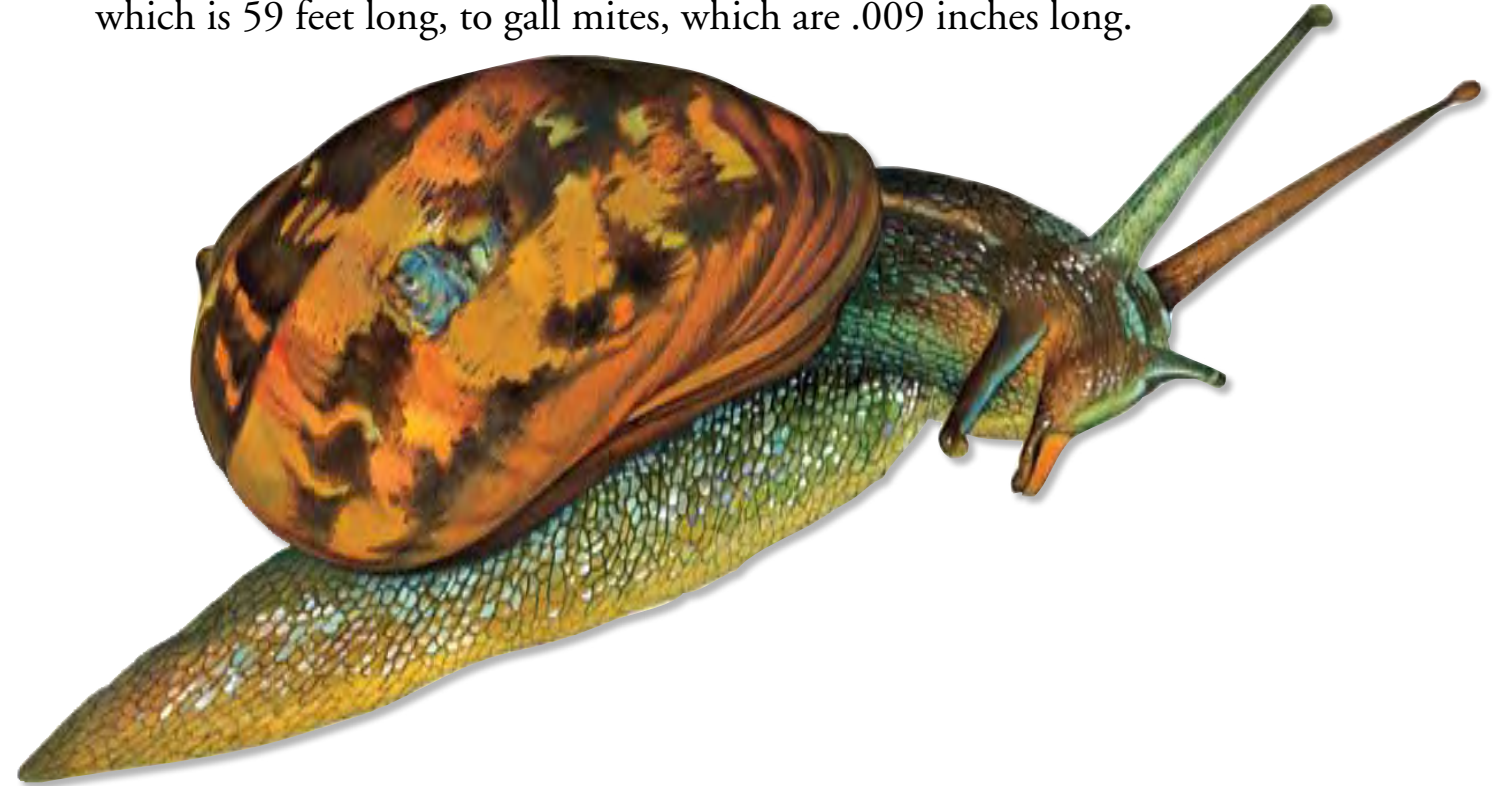
fact scope

- All animals are grouped into the animal kingdom.
- The animal kingdom can be split up into main groups on the presence or absence of a backbone.
- There are around 800,000 species in the animal kingdom.
- The inventor of modern scientific classification was Carolus Linnaeus (1707–1778), a Swedish botanist who classified and described more than 4,400 species of animals and 7,700 species of plants.



Invertebrates

Invertebrates are animals that do not have a spinal column. Jean-Baptiste Lamarck coined the term invertebrate. Invertebrates are all over the world and constitute about 90% of the animals inhabiting the Earth. They range from the giant squid, which is 59 feet long, to gall mites, which are .009 inches long.



Main Group of Invertebrates Are:

- Porifera (sponges)
- Cnidaria (jellyfish, hydras, sea anemones, Portuguese man-of-wars, and corals)
- Platyhelminthes (flatworms, including planaria, flukes, and tapeworms)
- Nematoda (roundworms, including rotifers and nematodes)
- Mollusca (mollusks, including bivalves, snails, slugs, octopuses, and squids)
- Annelida (earthworms, leeches, and marine worms)
- Echinodermata (sea stars, sea cucumbers, sand dollars, and sea urchins)
- Arthropods (arachnids, crustaceans, millipedes, centipedes, and insects)

fact scope

- More than 98% of all animal species are invertebrates.
- Invertebrates do not have an internal skeleton made of bone.
- Invertebrates are cold-blooded; their body temperature depends on the temperature of their environment.
- Many invertebrates have a fluid-filled, hydrostatic skeleton—like the jellyfish or worm.
- Jellyfish are made up of more than 95% water.

Vertebrates



Vertebrates are animals that have a spinal column. Vertebrates are believed to have evolved around 530 million years ago during the Cambrian period. There are around 57,000 species of vertebrates inhabiting the Earth. Fish, frogs, and reptiles are examples of vertebrate animals.



fact scope

- Only 2% of all animal species are vertebrates.
- The first vertebrates were toothless fish known as agnathans.
- Reptiles breathe through lungs.
- Dinosaurs were reptiles that laid eggs in nests.
- Some birds like penguins and ostriches cannot fly.
- Mammals are warm-blooded and give birth to live young ones.
- Most vertebrates have very advanced nervous systems.
- Vertebrates have muscles and skeletons.



Fish

Fish are vertebrates that live in water. Most are cold-blooded and lay eggs.

Amphibians

Amphibians are vertebrates that live both on land and water. There are three types of amphibians: frogs and toads, salamanders, and caecilians.





Reproduction

Animals reproduce in two ways: give birth to live offspring or lay eggs. Animals that give birth to live offspring are known as viviparous. Animals that lay eggs are called oviparous. Most animals undergo sexual reproduction. Some animals such as sponges, however, reproduce asexually.



fact scope

- All mammals give birth to live young.
- The duck-billed platypus and the spiny anteater are the only mammals that lay eggs.
- All birds are oviparous.
- Most reptiles are oviparous. Some lizards and snakes are live-bearing such as vipers.
- Most amphibians are oviparous. A few species of frogs living in South America and West Africa give birth to live young.
- Most fish are oviparous.
- Sharks and guppies are fish that give birth to live young.

Sharks

Sharks exhibit two types of reproduction. Some sharks lay eggs and others give birth to young.



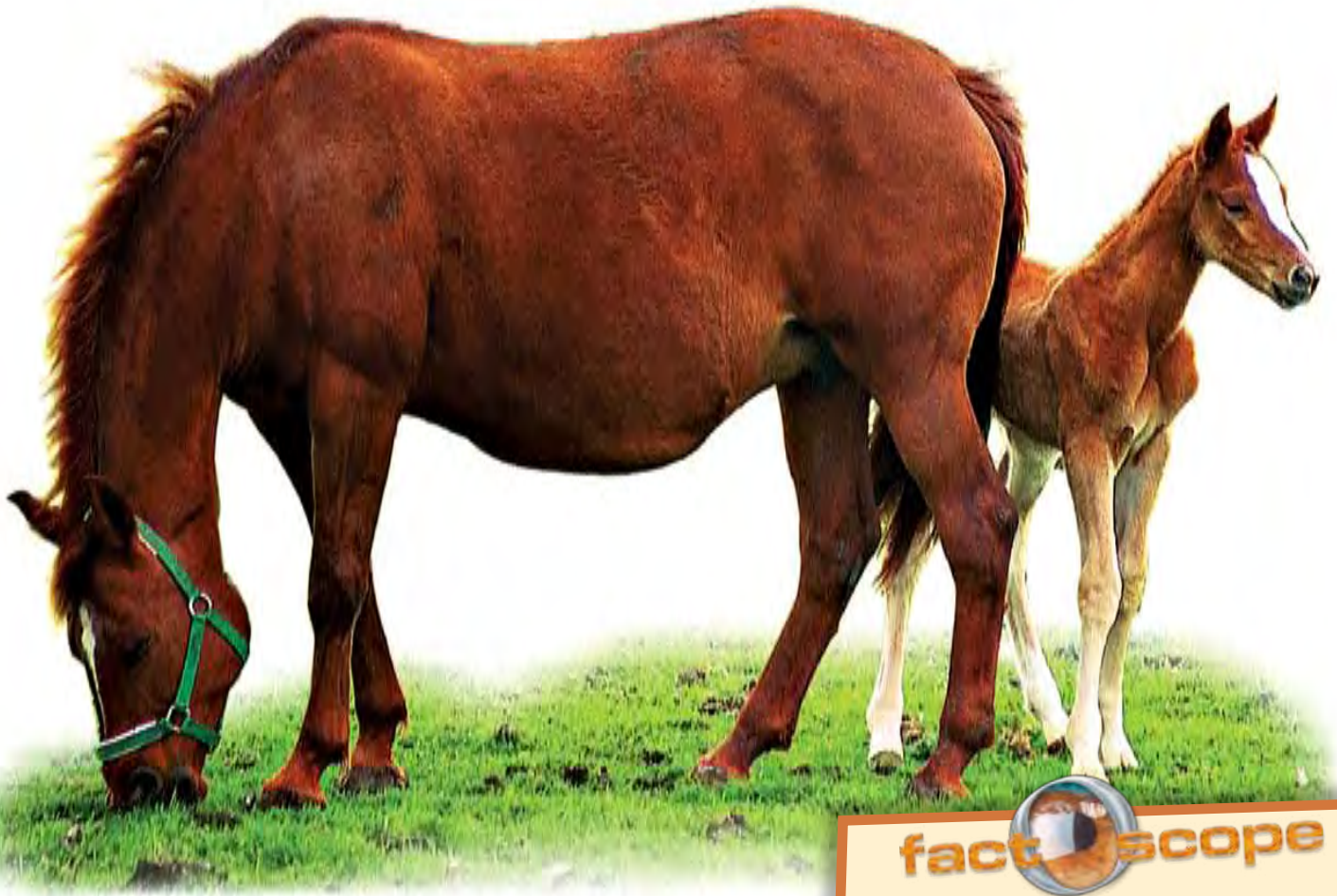
Spiders

Female spiders sometimes eat the male spiders after mating. The baby spiders eat each other.

Food



Animals can be classified into four categories based on their eating habits. Animals such as goats and horses, which feed only on plants, are called herbivores. Animals like tigers and lions that eat other animals are called carnivores. Omnivores, like human beings, consume both plants and animals, while scavengers, like vultures, feed on dead plants and animals.



Killer Whales

Killer whales are known to eat the remains of other animals. Sometimes they eat the remains of dead killer whales.



Insectivores are animals that mostly eat insects.

fact scope

- Bobcats eat rabbits, rodents, sheep, deer, and birds.
- Chimpanzees eat nuts, berries, fruit, insects, and small mammals.
- Deer eat leaves, fruit, vines, and grasses.
- Otters eat fish, frogs, small mammals, and insects.
- Giraffes eat leaves, shrubs, vines, and herbs.
- Eagles eat fish, small mammals, and waterfowl.
- Frogs eat insects.



Habitats

A habitat is a place where an animal can live naturally. Animals have adapted themselves to live almost anywhere on the planet. Some animals live underwater, while others live on snowy mountaintops. Various animals can live only in one or two specific



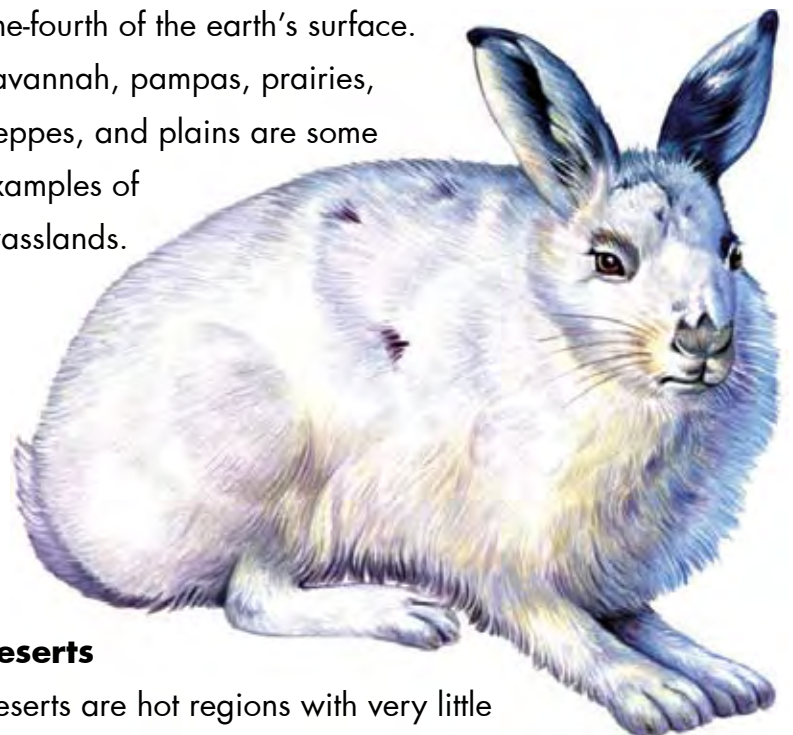
habitats. Some animals migrate from one place to another depending on weather conditions and food availability.

fact scope

- Camels, gazelles, lizards, snakes, antelopes, and shrews are common desert animals.
- African and Asian elephants, antelopes, marsupials, grasshoppers, hyenas, leopards, and jaguars live in grasslands.
- The tundra region is the coldest habitat with extremely low temperatures.
- Animals like arctic hare, arctic fox, polar bears, cod, flatfish, and caribous live in the tundra.

Grassland

Grasslands are grassy areas covering one-fourth of the earth's surface. Savannah, pampas, prairies, steppes, and plains are some examples of grasslands.



Deserts

Deserts are hot regions with very little rainfall. Animals, which can cope with extreme temperatures, live in deserts.

Warm-blooded



Warm-blooded animals have the ability to maintain a constant body temperature in any kind of environment. Warm-blooded animals are also known as endotherms. Birds and mammals are examples of warm-blooded animals. These animals maintain their body temperature by converting food into energy.



Staying Warm

Smaller warm-blooded animals lose heat more quickly. Therefore the larger the mammal the easier it is to stay warm.

fact scope

- Scientists refer to warm-blooded animals as endothermic or homeothermic.
- Dogs and cats have sweat glands only on their feet.
- Whales are mammals that do not have sweat glands because they live in the water.
- Many mammals have thick coats of fur to keep them warm in winter.

Constant Temperature

Warm-blooded creatures maintain a constant temperature by generating their own body heat when they are in a cooler environment, and by cooling themselves when they are in a hotter environment.



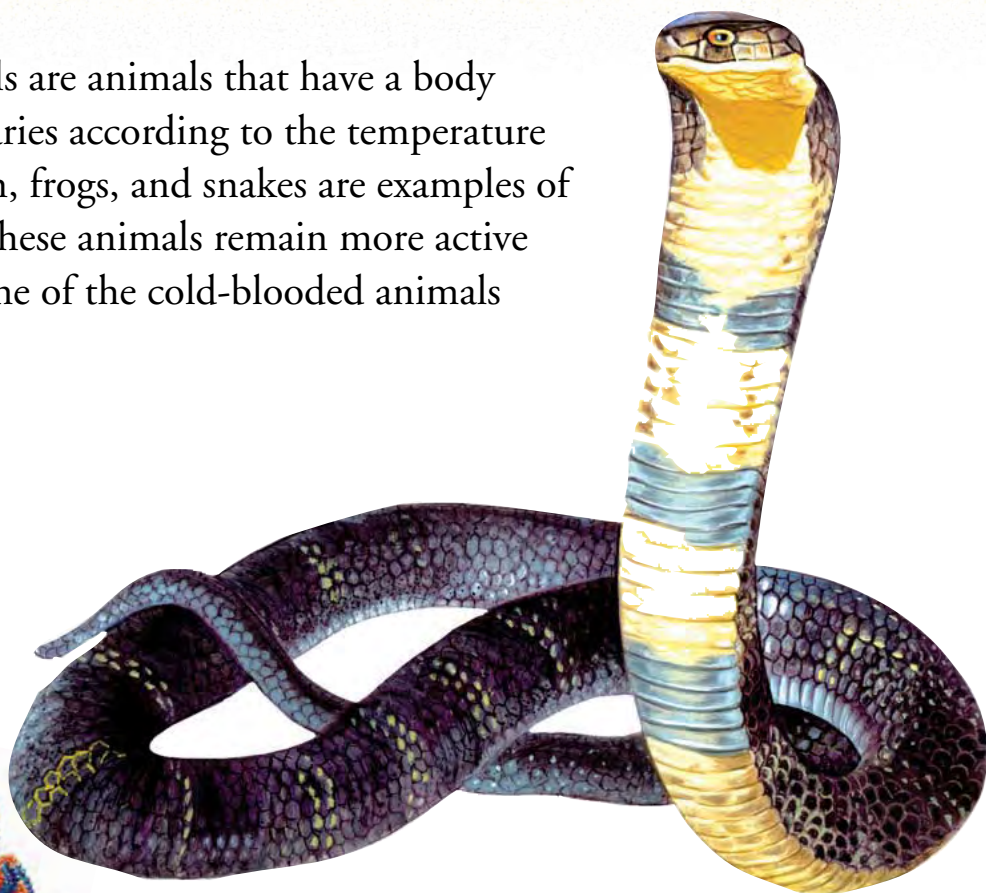


Cold-blooded

Cold-blooded animals are animals that have a body temperature that varies according to the temperature of the surroundings. Fish, frogs, and snakes are examples of cold-blooded animals. These animals remain more active in warm conditions. Some of the cold-blooded animals hibernate during winter.

Advantages

Cold-blooded animals require less food and energy to survive than warm-blooded animals do.



Losing Heat

When a reptile is too hot, it will lie parallel to the sun's rays, go into a shady area, open its mouth wide, lighten its skin color, or burrow into cool soil.

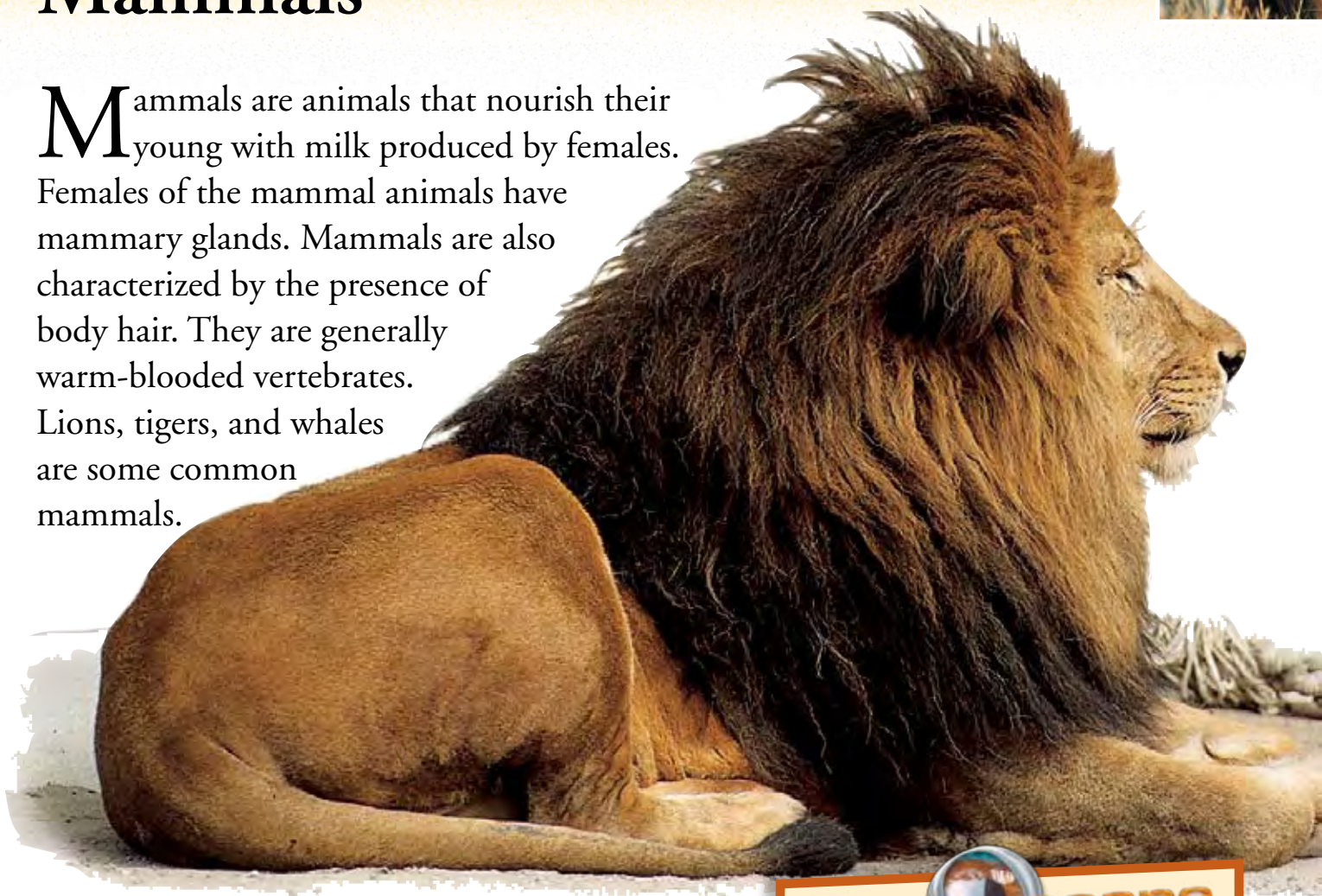
fact scope

- Cold-blooded animals bask in the sun to warm up.
- Reptiles will lie perpendicular to the direction of the sun to maximize the amount of sunlight falling on their skin.
- Reptiles expand their rib cage to increase their surface area and will darken their skin to absorb more heat.
- Bees and dragonflies shiver to stay warm.
- Fish that live in areas where the winters are cold move to deeper waters during the colder months or migrate to warmer waters.
- Some fish have a special protein in their blood, which acts as an anti-freeze.
- Snakes, lizards, toads, frogs, salamanders, and most turtles hibernate during cool winters.
- Honeybees stay warm by crowding together and moving their wings to generate heat.

Mammals



Mammals are animals that nourish their young with milk produced by females. Females of the mammal animals have mammary glands. Mammals are also characterized by the presence of body hair. They are generally warm-blooded vertebrates. Lions, tigers, and whales are some common mammals.



Mammal Characteristics

Mammals have body hair, three middle ear bones (the malleus, incus, and stapes), and nourish their young with milk. Females of mammals have mammary glands that produce milk.



Venomous Mammals

Only a few mammals are venomous. The male duck-billed platypus, several species of shrews, and the solenodon are venomous.

fact scope

- There are about 5,000 species of living mammals.
- Most mammals are placental mammals like cats, dogs, horses, and human beings.
- Armadillos, anteaters, and sloths are toothless mammals.
- The striped skunk is the smelliest mammal.
- Teeth are the hardest part of any mammal.
- Monotremes are primitive egg-laying mammals.
- Moles, shrews, and hedgehogs eat insects.
- Bats are the only flying mammals.



Birds

Birds are egg-laying vertebrate animals with feathers. They evolved millions of years ago from land reptiles. Birds are animals with their forelimbs modified into wings. Almost all birds can fly with a few exceptions. Some birds are perching birds, which feed on fruits while others are great predators like vultures and eagles. Today, around 10,000 known species of birds exist.



Study of Bird

Ornithology is the study of birds. A scientist who studies birds is called an ornithologist.

Syrinx

Syrinx is the vocal organ in songbirds, located in the throat. Birds sing by blowing air from the lungs through the syrinx.



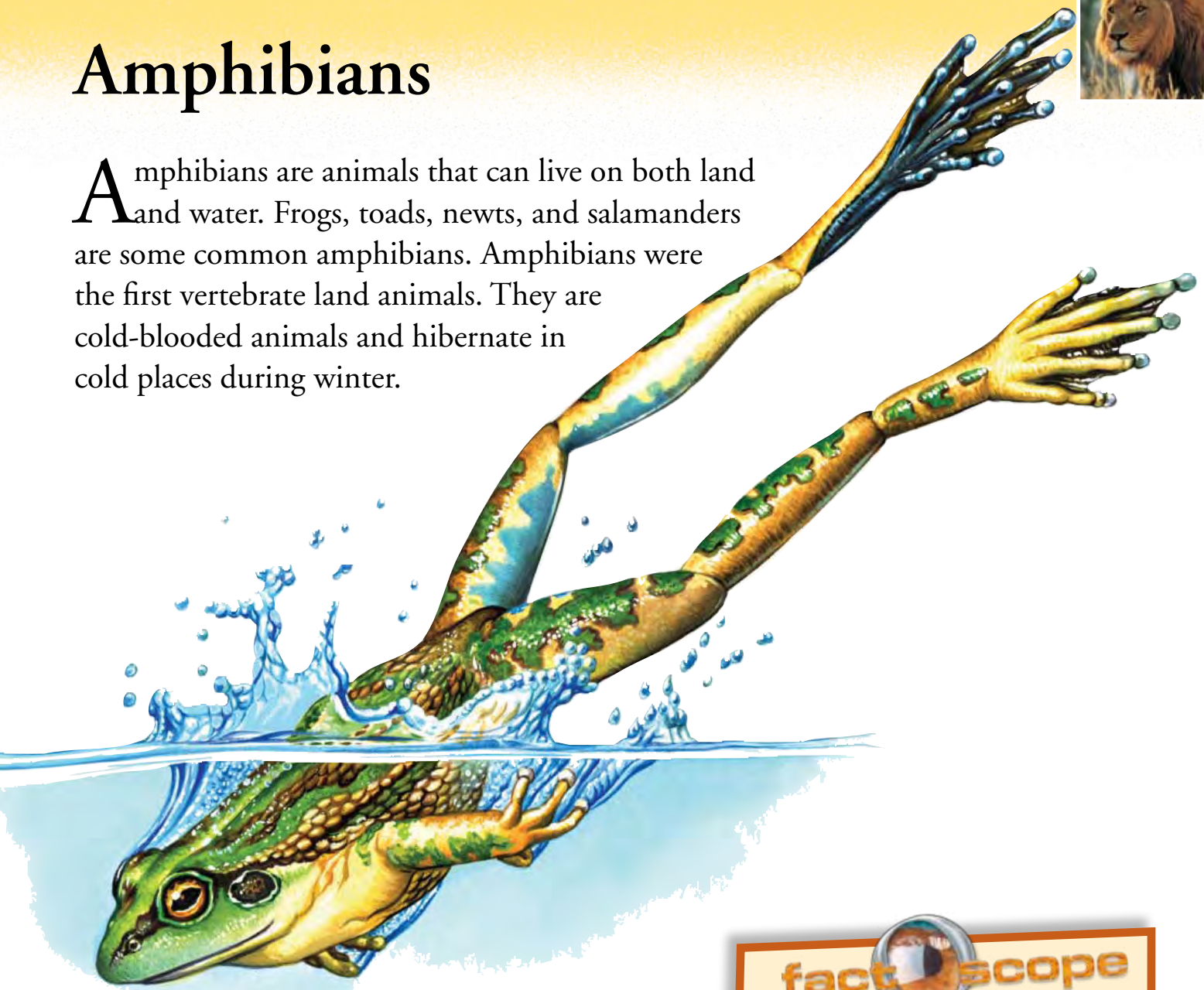
fact scope

- Birds do not have any teeth.
- The wrybill is the only bird that has the beak bent to the right side.
- The Arctic tern is the longest distance migrant bird.
- The peregrine falcon is the fastest bird on the earth.
- Emperor penguins can stay about 11 minutes under water during a dive.

Amphibians



Amphibians are animals that can live on both land and water. Frogs, toads, newts, and salamanders are some common amphibians. Amphibians were the first vertebrate land animals. They are cold-blooded animals and hibernate in cold places during winter.



Giant Salamanders

Giant salamanders are aquatic amphibians found in the United States, China, and Japan. The Japanese giant salamander can reach up to 5 feet in length and can live for up to 80 years.



Neoteny

Certain species of salamanders remain in larval form all their lives. This phenomenon is called neoteny.

fact scope

- Amphibians are able to breathe through their skin.
- The first true amphibians appeared during the early Carboniferous period.
- There are three groups of living amphibians: urodeles, anurans, and caecilians.
- Newts are brightly colored salamanders found in moist areas in North America, Europe, and Asia.
- Red efts are newts that leave the water and go onto the land.



Reptiles



Reptiles are cold-blooded, scaly, vertebrate animals. Crocodiles, snakes, tortoises, and lizards are some of the common reptiles. Reptiles appeared around 340 million years ago. Lizards and snakes, turtles and tortoises, crocodiles and alligators, and tuatara are the four groups of reptiles. Reptiles prefer to live and lay eggs in warm areas.

Common Iguanas

Green Iguanas are also called common iguanas. They are a type of lizard.



Slow Worm

Slow Worm is a legless lizard. It looks, however, more like a snake.

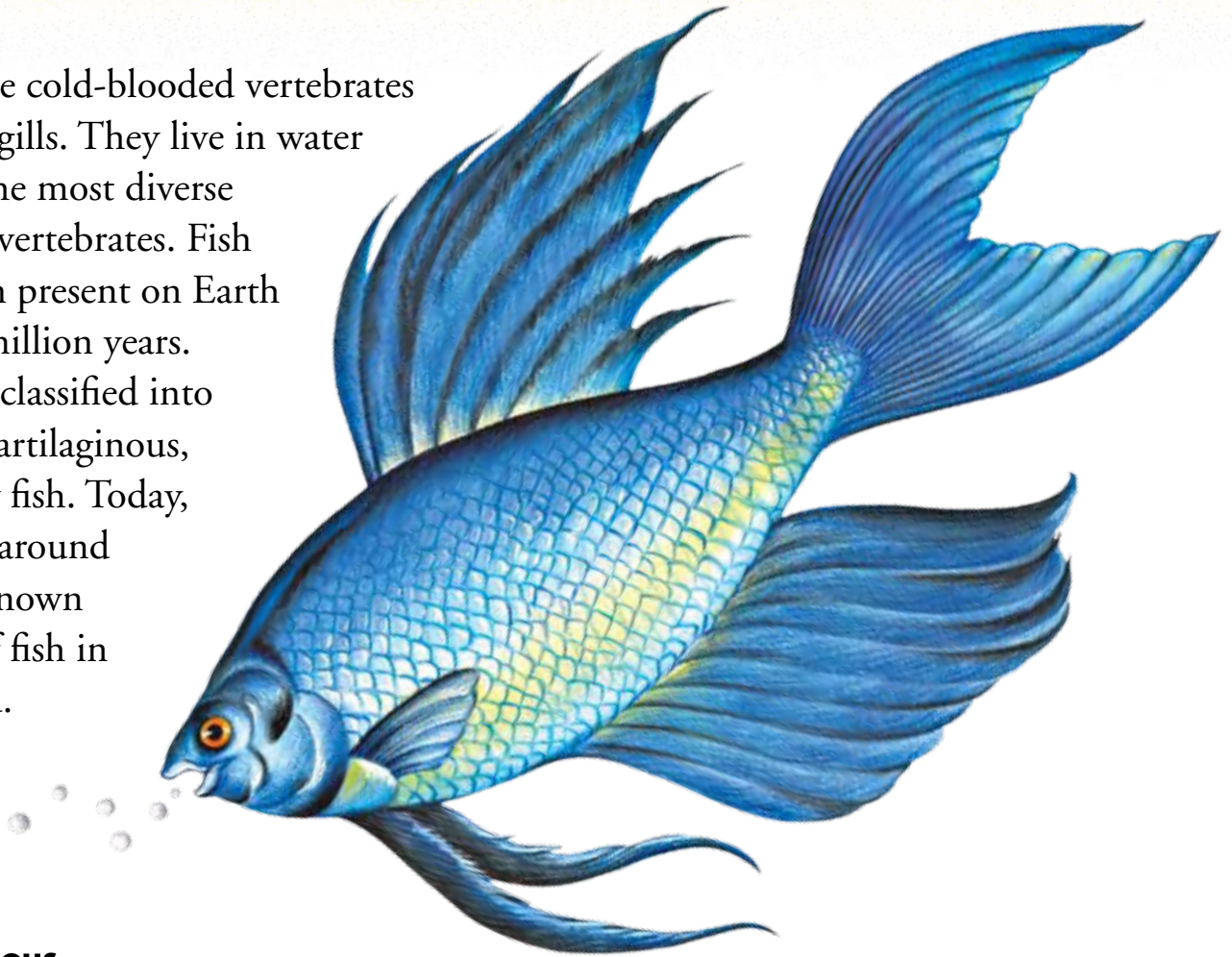
fact scope

- Reptiles are found on every continent except for Antarctica.
- The Hylonomus is the oldest-known fossil reptile, and was about 7.8 to 11.8 inches long.
- The spiny-tailed iguana is the fastest reptile.
- The Komodo dragon is the biggest lizard that can grow up to 10 feet long.
- The Gila monster is a poisonous lizard.
- Horned lizards can squirt blood from their eyes.

Fish

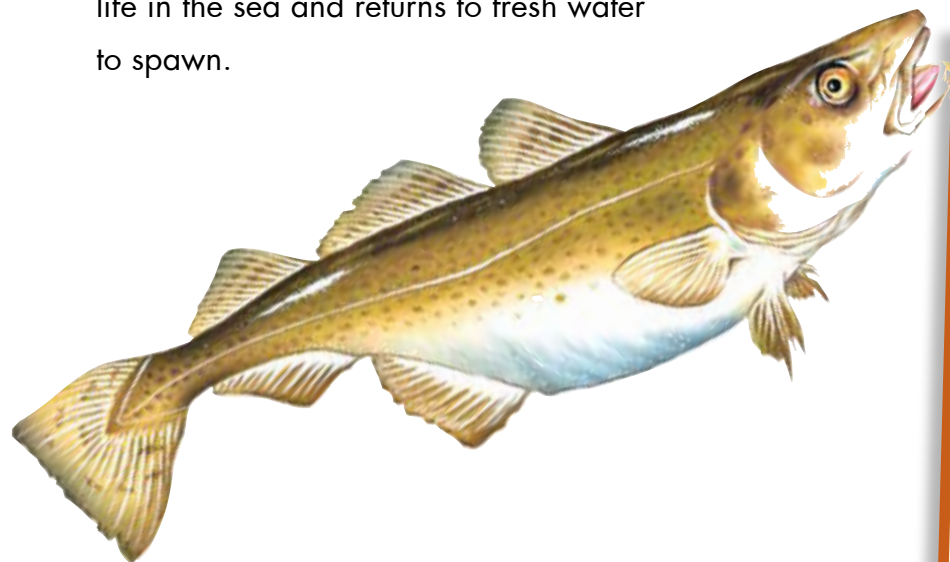


Fish are cold-blooded vertebrates with gills. They live in water and are the most diverse group of vertebrates. Fish have been present on Earth for 400 million years. They are classified into jawless, cartilaginous, and bony fish. Today, there are around 21,000 known species of fish in the world.



Anadromous

An anadromous fish spends most of its life in the sea and returns to fresh water to spawn.



Catadromous

A catadromous fish lives in fresh water and enters salt water to spawn.

fact scope

- Most fish, except for sharks, do not have eyelids.
- Tuna is a warm-blooded fish.
- Salmon, smelt, shad, striped bass, and sturgeon are anadromous fish.
- Eels are catadromous fish.
- Fish secrete a type of mucus from their skin for protection against parasites and diseases.
- An ichthyologist is a person who studies fish.

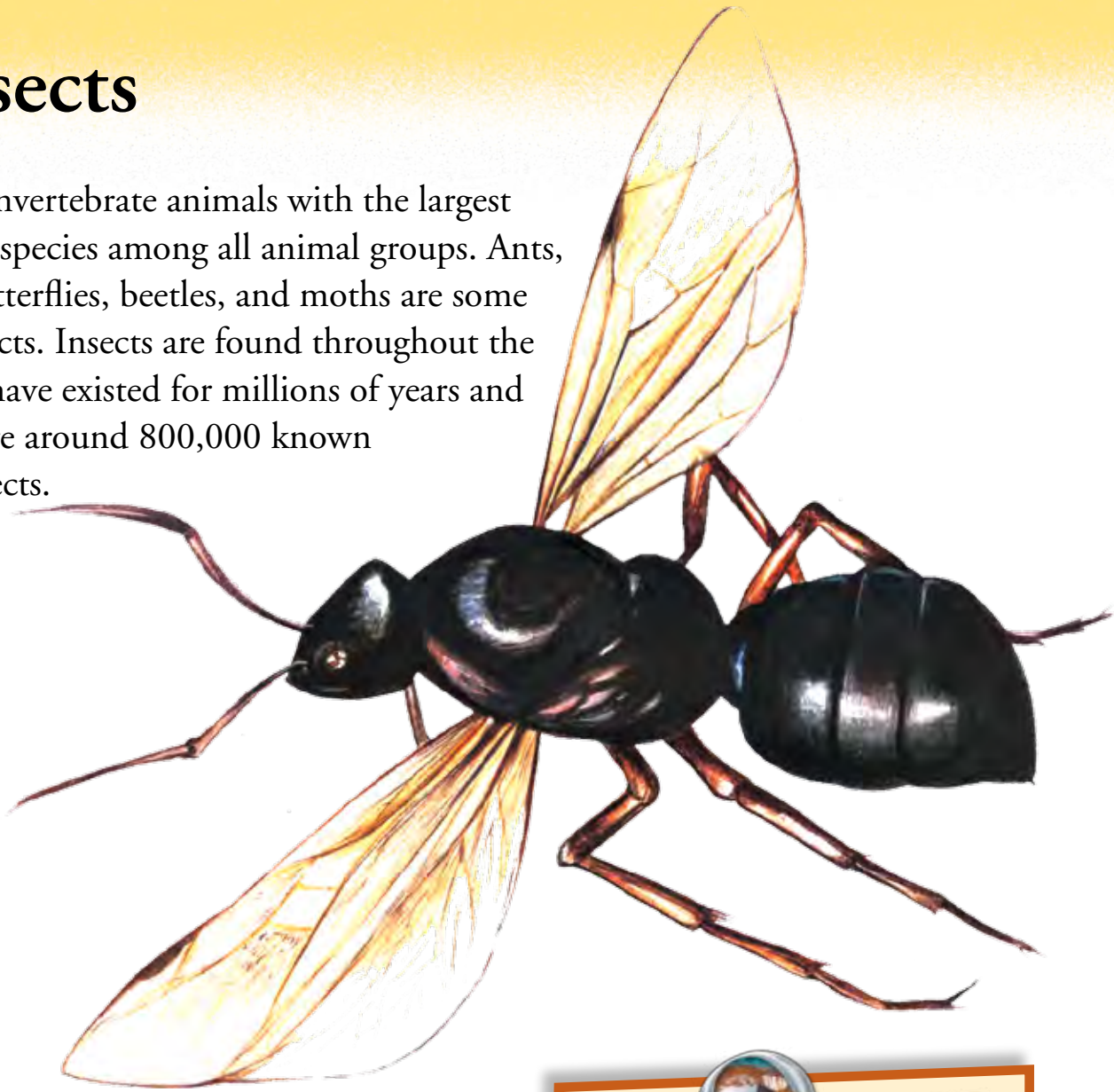


Insects

Insects are invertebrate animals with the largest number of species among all animal groups. Ants, bees, flies, butterflies, beetles, and moths are some common insects. Insects are found throughout the world. They have existed for millions of years and today there are around 800,000 known species of insects.

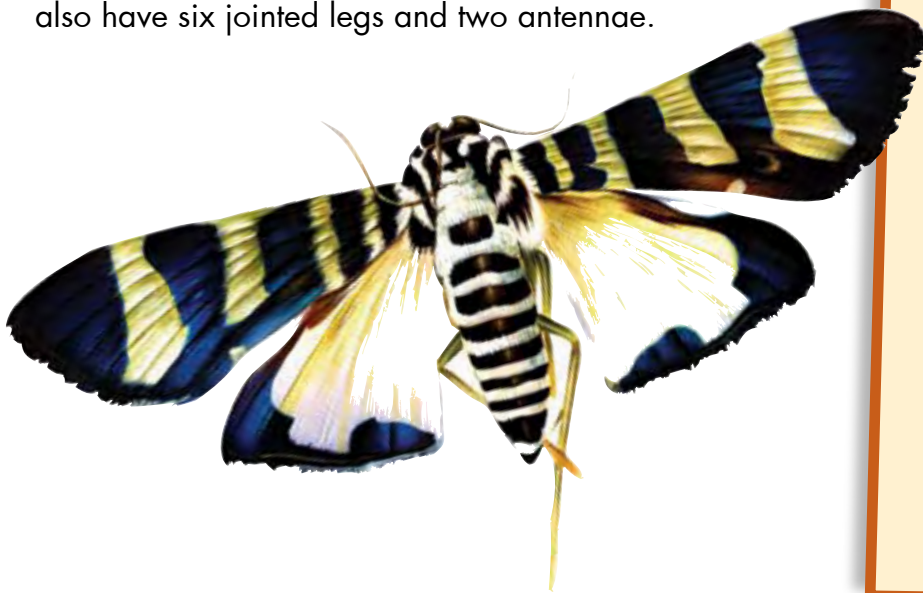
Entomology

The study of insects is called entomology.



Body Parts of Insects

All insects have a body divided into three parts: head, thorax, and abdomen. They also have six jointed legs and two antennae.



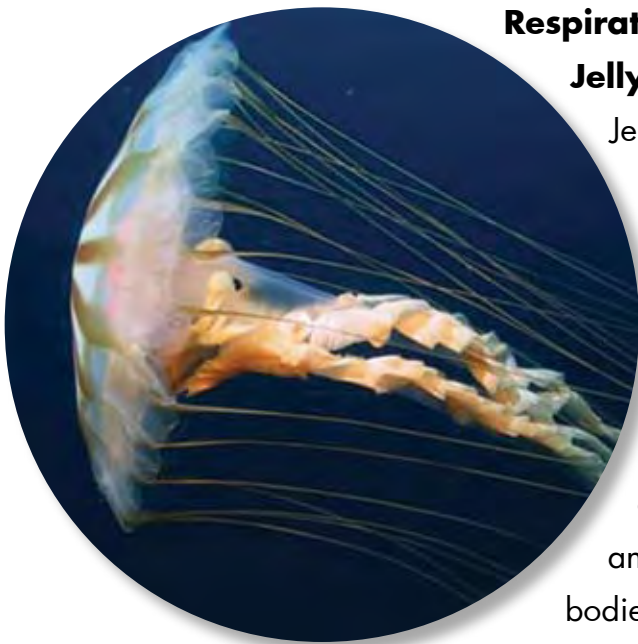
fact scope

- There are around 800,000 known species of insects.
- There are over 3,000 different species of ladybugs.
- An adult mantis can grow about 4 inches long.
- The giant stick of Indonesia is the longest insect of the world.
- Ears of katydid, an insect, are located on its knees.
- The nervous system of insects can be divided into a brain and a ventral nerve cord.

Sponges and Jellyfish



Sponges are simple bodied invertebrate animals. Jellyfish are saucer-shaped marine animals. Sponges are found in almost all aquatic habitats. They remain fixed and spend their whole life in one place. Jellyfish drift along the water currents.



Respiration in Jellyfish

Jellyfish do not need a respiratory system. Their skin is thin enough that oxygen easily diffuses in and out of their bodies.

Respiration in Sponge

A sponge takes in water through its pores. It then uses the oxygen from the water taken inside.

fact scope

- A jellyfish is composed of about 98 percent water.
- Jellyfish have stinging cells on their tentacles called nematocysts.
- Rhizostomae are jellyfish that do not have tentacles.
- Jellyfish can be found in every ocean in the world.
- The venomous sting of the box jellyfish can kill a person.
- Sponges are found in different colors, such as white, red, orange, green, yellow, brown, purple, and black.
- There are about 5,000 known species of sponges.



Corals

Corals are small marine animals found in dense colonies under the ocean. They are made up of tiny, fragile animals called coral polyps and their skeletons. Corals secrete calcium carbonate and can be either hard or soft.



Coral Habitat

Corals are generally found in shallow water, because they require sunlight to survive.

Atoll

Atolls are coral reefs formed in the deep ocean. They generally form around a volcanic island.



fact scope

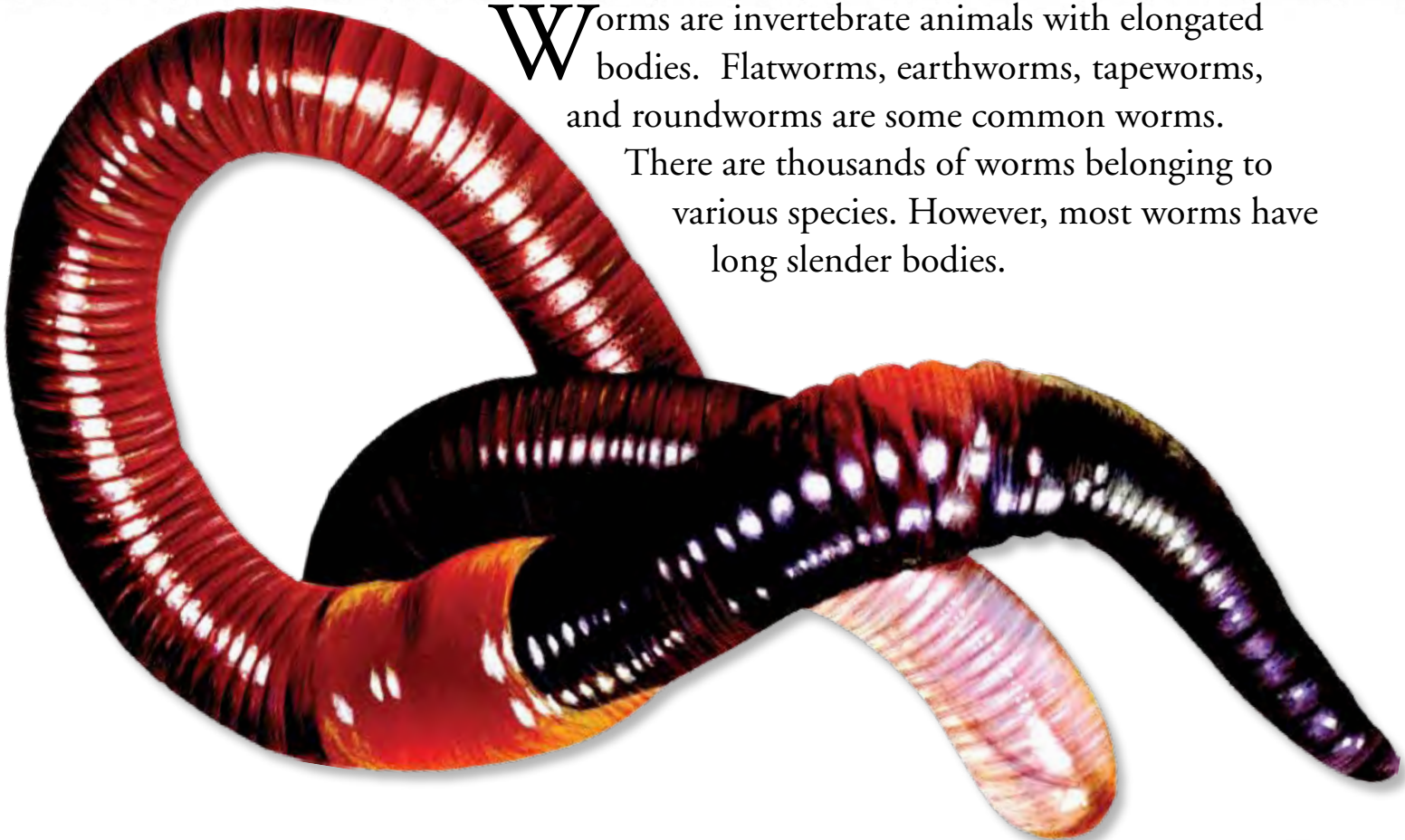
- Coral reefs are among the oldest ecosystems on Earth.
- Coral reefs cover less than 1% of the planet's surface.
- The world's first coral reefs occurred about 500 million years ago.
- Charles Darwin was the first to put forward theories on the formation of coral reefs.
- It is estimated that 70% of the world's coral reefs will be destroyed by the year 2050.
- *Puna* is the Hawaiian word for lobe coral.
- Corals reproduce in two ways: asexually and sexually.

Worms



Worms are invertebrate animals with elongated bodies. Flatworms, earthworms, tapeworms, and roundworms are some common worms.

There are thousands of worms belonging to various species. However, most worms have long slender bodies.



Groups of Worms

There are four main groups of worms: flatworms, ribbon worms, roundworms, and segmented worms.

Helminthology

Helminthology is the study of worms.



fact scope

- There are about 4,400 different types of worms.
- Most worms have a soft rounded body.
- Tapeworms are parasitic worms that live in the intestine of animals and humans.
- Leeches are worms that suck blood.
- An earthworm's body is divided into 100 or more body segments.
- The largest earthworm was found in South Africa and measured about 22 feet.



Arachnids



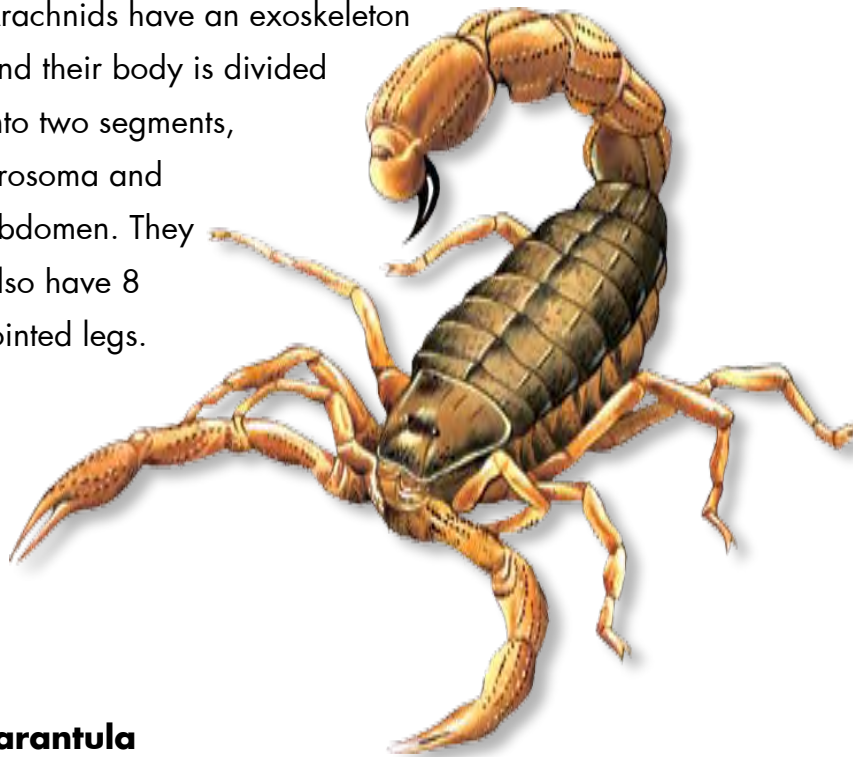
Arachnids are violent predators. Spiders, scorpions, ticks, and mites are some of the common arachnids. Arachnids are arthropods and are found in almost every part of the world. They were some of the first animals to live around 400 million years ago. Today there are around 70,000 known species of arachnids.

fact scope

- There are about 30,000 species of spiders.
- Spiders have eight legs and two body parts, the abdomen and the thorax.
- Spiders have silk spinning glands called spinnerets.
- Scorpions have been on the planet for over 400 million years.
- Scorpions range in size from .39 to 8.25 inches.
- Vinegarroon is a type of scorpion that emits a vinegar-like mist made mostly of acetic acid.
- Acarology is the study of mites and ticks.
- A daddy long-leg is a type of

Body Parts of Arachnids

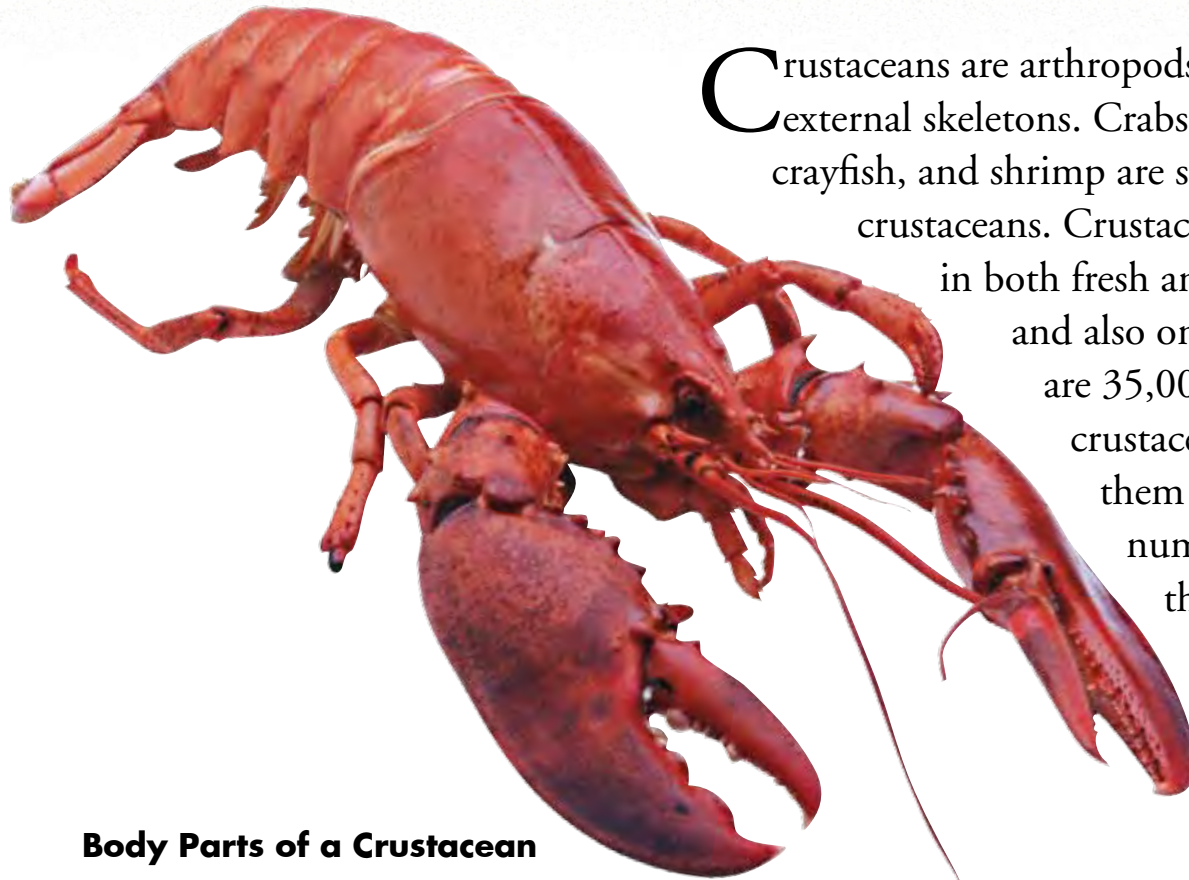
Arachnids have an exoskeleton and their body is divided into two segments, prosoma and abdomen. They also have 8 jointed legs.



Tarantula

Tarantulas are large hairy spiders found in South America, southern North America, southern Europe, Africa, southern Asia, and Australia. They have a very long life span of over 30 years.

Crustaceans



Crustaceans are arthropods with hard external skeletons. Crabs, lobster, crayfish, and shrimp are some common crustaceans. Crustaceans are found in both fresh and marine water and also on land. There are 35,000 species of crustaceans, making them the most numerous animals in the oceans.

Body Parts of a Crustacean

Crustaceans have three distinct body parts: head, thorax, and abdomen.

The abdomen of the crustacean is also known as the pleon.



Study of Crustaceans

The scientific study of crustaceans is known as carcinology. A scientist who works in carcinology is called a carcinologist.

fact scope

- Crabs are ten-legged animals.
- Crabs are found in all of the world's oceans.
- The Japanese spider crab is the largest living crab.
- The pea crab is a small crab that is about the size of a pea.
- Smaller varieties of lobsters are also known as lobsterettes.
- The nauplius is the first larva of many kinds of crustaceans.
- Crabs are omnivores.
- Shrimp are small crustaceans found widely around the world in both fresh and salt water.

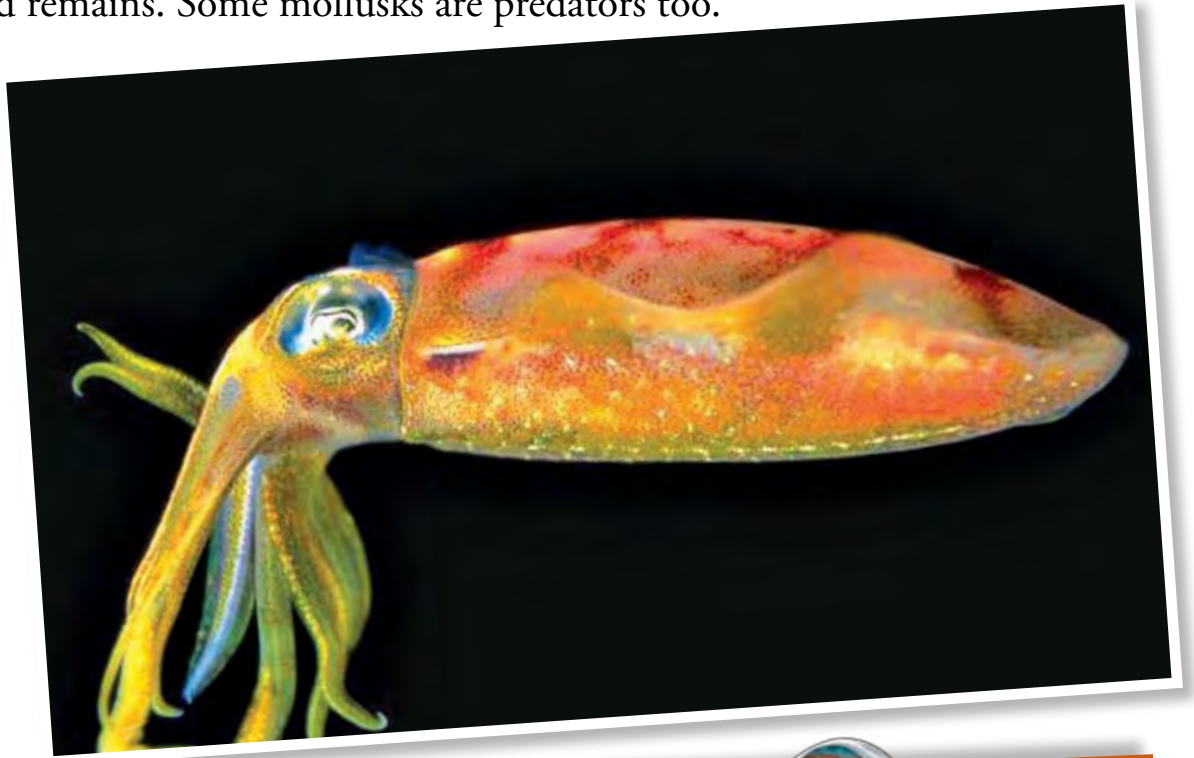


Mollusk

Mollusks are soft-bodied, invertebrate animals. Snails, octopuses, squids, and cuttlefish are some of the common mollusks. Mollusks are found in marine, freshwater, and terrestrial environments. Some feed on plants, while some feed on blood and dead remains. Some mollusks are predators too.

Bivalves

Bivalves are soft-bodied mollusks. Two hard shells protect them.



Major Classes of Mollusks

Major classes of mollusks include bivalves, cephalopods, aplacophorans, chitons, monoplacophorans, scaphopods, and gastropods.



fact scope

- There are over 50,000 living species of mollusks.
- The blue ring octopus is the most venomous octopus.
- Oysters spend their entire lives in one underwater location.
- Cephalopods are a class of fast-swimming mollusks.
- The giant squid is one of the largest squids that swim the oceans at great depths.
- The cuttlefish is an intelligent mollusk that can change its skin color.

Echinoderms

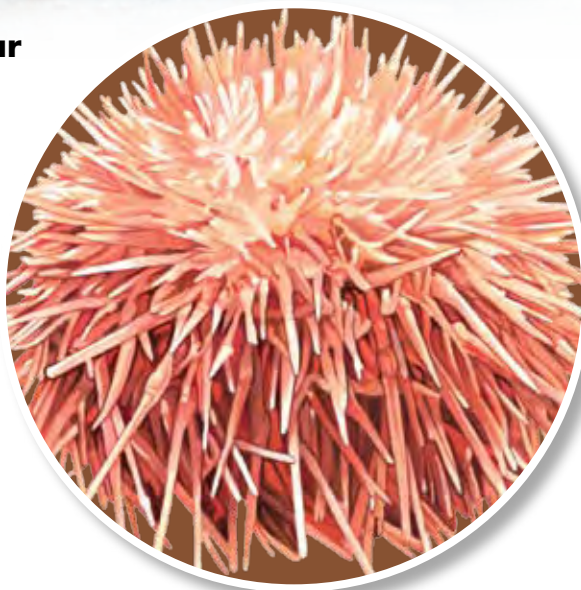


Echinoderms are invertebrate marine animals. Sea stars, urchins, sea cucumbers, and brittle stars are some common echinoderms. Echinoderms are generally found in the bottom of the ocean. They are brightly colored animals with hard and spiny skin. Today there are around 6,000 known species of echinoderms.



Water Vascular System

Echinoderms possess a water vascular system. It helps them in locomotion, feeding, and gas exchange.



Appearance

Echinoderms have five arms and spines all over the body. They use spines to protect themselves. Spines also help them with respiration.

fact scope

- Echinoderms appeared in the early Cambrian period.
- Echinoderms are found in all the oceans.
- Echinoderms range in size from less than .39 inches to 6.56 feet.
- Echinoderms have an internal skeleton.
- Echinoderms sense their environment from all sides.
- Echinoderms can regenerate their arm if lost.
- Sea urchins are consumed by humans, either raw or lightly cooked.



Carnivores

Carnivores are flesh-eating mammals. This group includes a variety of animals such as cats, dogs, wolves, lions, tigers, and cheetahs. Most carnivores generally live alone but many of them also hunt in small groups. Carnivores usually feed on herbivores but many carnivores often attack and eat other carnivores too.

Largest Land Carnivore

The largest land carnivore is the polar bear. It is the only animal that actively hunts humans.

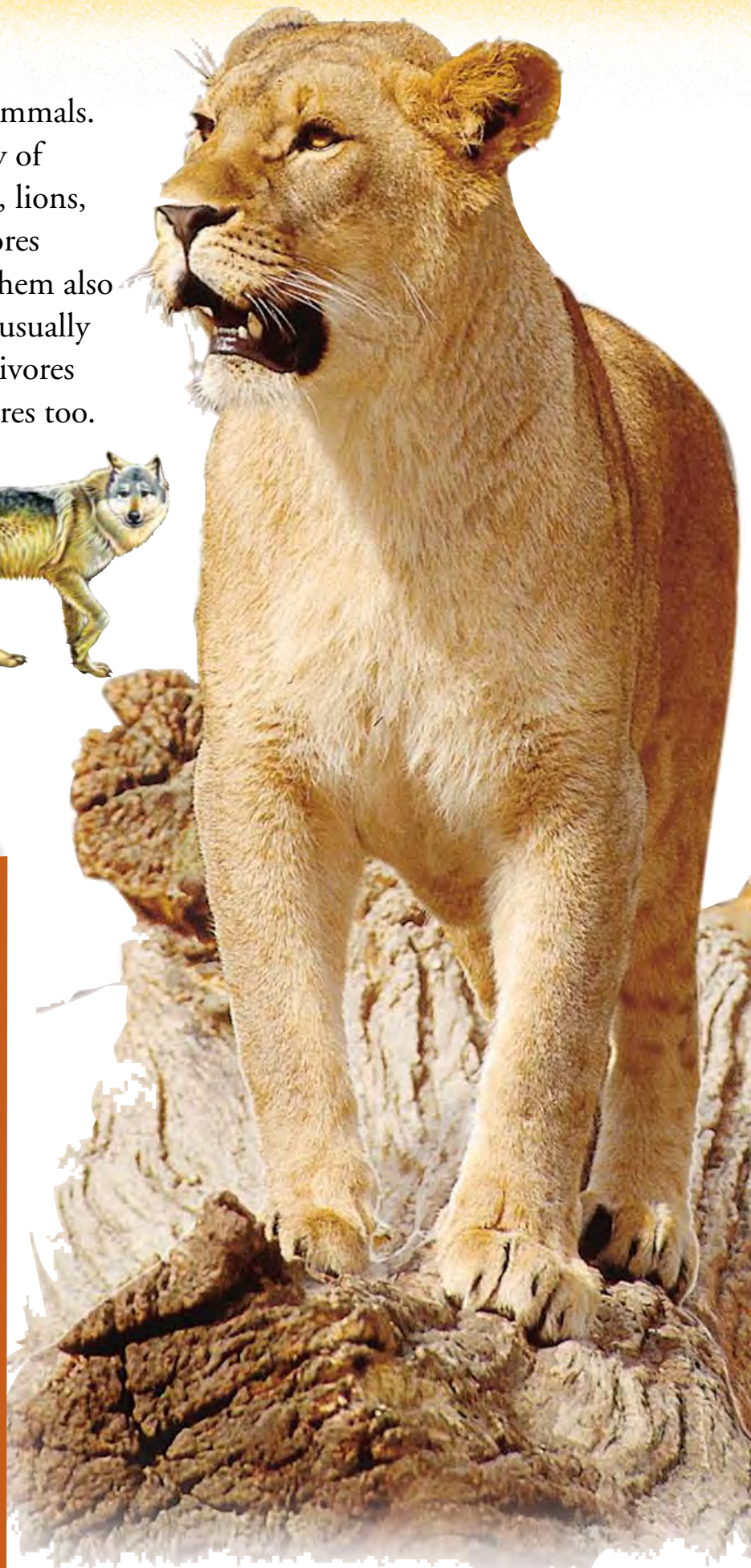


Food According to Size

The bigger the carnivore, the more it has to eat.

fact scope

- The weasel is the smallest living carnivore with an overall length of about 8 inches and weight of 1.5 ounces.
- The grizzly bear or brown bear is the largest carnivore and weighs up to 850 pounds with a length of up to 8 feet.
- Carnivores are at the top of the food chain.
- Carnivores are divided into pinnipeds (fin footed) and fissipeds (land).
- Carnivores are not able to move their jaws side to side very easily.



Herbivores



Herbivores are animals that eat mostly plant materials. They are also called primary consumers. Herbivores are further subdivided into several types, such as frugivores or fruit-eating animals, folivores or leaf-eating animals, and nectarivores or nectar-eating animals.



Teeth for Stripping

Herbivores usually have blunt teeth that are useful for stripping leaves, twigs, etc.

Without Teeth

Herbivorous birds do not have teeth to mince the vegetation they eat.

fact scope

- The moose is a large herbivore that eats any kind of plant and fruit.
- Many herbivores have a digestive system that helps them get the most out of the plants they eat.
- The bee is a small pollinator that uses nectar and pollen from some kinds of plants to make honey.
- The stegosaurus and apatosaurus were herbivore dinosaurs.
- Herbivores spend more time eating than doing anything else.



Omnivores

Omnivores are animals that have specialized teeth that enable them to eat both plants and animals. Pigs, bears, foxes and chickens are examples of omnivorous

animals. Because of their feeding habits, omnivores easily adapt to different environments.



Less Specialized Teeth

Omnivores have less specialized teeth than carnivores and herbivores.



fact scope

- Some of the omnivores eat eggs of other animals.
- Omnivores cannot digest plants that do not produce fruits and grains.
- Omnivores eat plants so they are able to survive in many environments.
- Omnivores do not eat all kinds of plants.
- The housefly is a scavenger that also eats fruit-bearing plants.
- Black bears and grizzly bears belong to the order carnivora, but they are omnivores.

Role in the Lifecycle of Plants

Some omnivores are pollinators which play a very important role in the life cycle of some kinds of plants.



Elephants



Elephants are the largest living land mammal. They are ungulates with wrinkled gray-brown skin. They are divided into two major groups—African and Asian elephants. Elephants are herbivores. They are found in India, southeastern Asia, and Africa.



Emotional Attachment

Elephants mourn at the loss of a baby, a family member, and in many cases, other elephants.



Longest Gestation Period

Elephant's gestation period is 22 months. It is the longest of any land animal.

fact scope

- Elephants live in groups known as herds.
- Elephants sleep while standing.
- Elephants cry, play, laugh, and have incredible memories.
- Elephants collect food with their trunks but do not drink with their trunks.
- Elephants can run 23 mph for short distances.
- Elephants weigh around 4.9 tons.
- Elephants are excellent swimmers.



Giraffes

Giraffes are mammals with long necks, long legs, and spots all over their body. They are found in central, eastern, and southern Africa. They feed on the leaves of tall trees. Giraffes can live without water for several days because they get moisture from leaves.



Blood Pressure

The average blood pressure of a giraffe is two to three times more than that of a healthy man.



Busy and Big Heart

A giraffe's heart can pump 16 gallons of blood in one minute and weighs up to 24.25 pounds.

fact scope

- Giraffes can go for several days without water.
- A male giraffe weighs between 2,200 and 2,800 pounds and is up to 18 feet in length.
- A female giraffe grows to be 15 feet tall and weighs between 1,500 and 2,425 pounds.
- A giraffe uses its own tongue to clean its ear.
- A baby giraffe is about 5 feet 9 inches tall at birth.
- A giraffe can drink 12 gallons of water in one sitting.
- The giraffe is the tallest mammal in the world.

Rhinoceros



Rhinoceroses are mammals. They are massive odd-toed ungulates, with a heavy body, a horn on the forehead, and a large middle toe. They feed on grass and other foliage. There are only five species of rhinoceroses found in Africa and Asia.

Medicinal Value

It is inaccurately believed that the rhino's horn cures everything from fever to food poisoning.

Fast Runner

Despite their huge body, rhinoceroses can run at speeds of about 28 mph for short distances.

fact scope

- The white rhino is the second largest land mammal after the elephant.
- Habitats of rhinos range from savannas to dense forests in tropical and subtropical regions.
- Wild rhinos live up to 35 years.
- There are five species of rhinos—two African and three Asian.
- Rhinoceroses are herbivores.
- A group of rhinos is sometimes known as a crash.





Lions

Lions are the second largest feline mammals, also known as the king of beasts. Male lions have mane on their neck. They are found in Africa and India.

Lions are carnivores. They hunt and eat animals such as antelope, gazelles, warthogs, wildebeest, buffalo, and zebras.



factoscope

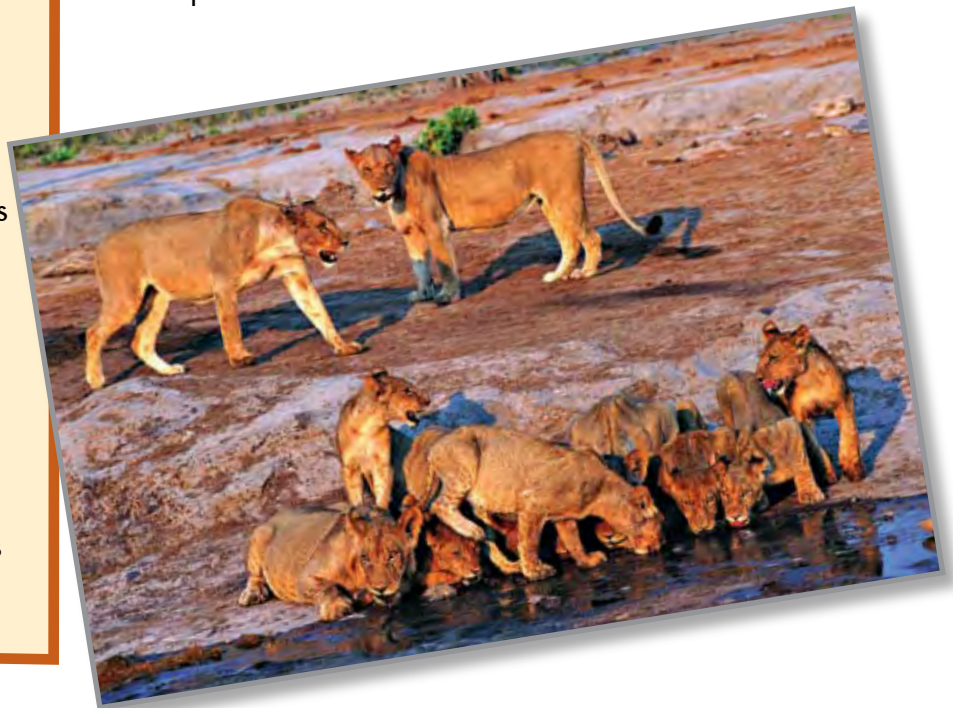
- Lions live in large groups known as prides consisting of about 15 lions.
- Lions can run for a short distance at 49 mph and leap as far as 11 yards.
- Cubs remain with their mothers for at least two years but start hunting at 11 months.
- A male lion's roar can be heard up to 5 miles away.
- A lion's heel does not touch the ground.
- Lions can sleep up to 20 hours in a day.

Sense of Smell

Lions have a great sense of smell. They mark their territories by means of scent deposits.

Vision Power

A lion's eyesight is 5 times better than a human.



Tigers



Tigers are the largest and most powerful feline mammals living on the planet. They are found in India and other parts of southeastern Asia. Tigers are carnivores. They hunt and eat animals such as deer, cattle, frogs, and fish.



Smallest Tiger

The Sumatran tiger is the smallest tiger with an average length of 7 feet. It weighs around 242 pounds.



Heaviest Tiger

The Siberian tiger is the heaviest tiger and weighs around 1,000 pounds.

fact scope

- Tigers hunt smaller birds and mammals.
- Cubs weigh 2 to 2.8 pounds and are born blind.
- A tiger weighs between 399 to 573 pounds and attain the length of up to 9.8 feet.
- A wild tiger can live up to 10–15 years.
- Some body parts of a tiger are used in traditional Asian medicines.
- Tigers have the largest canine teeth of any land-based carnivore.
- The Bengal tiger has the largest population with around 3,000.

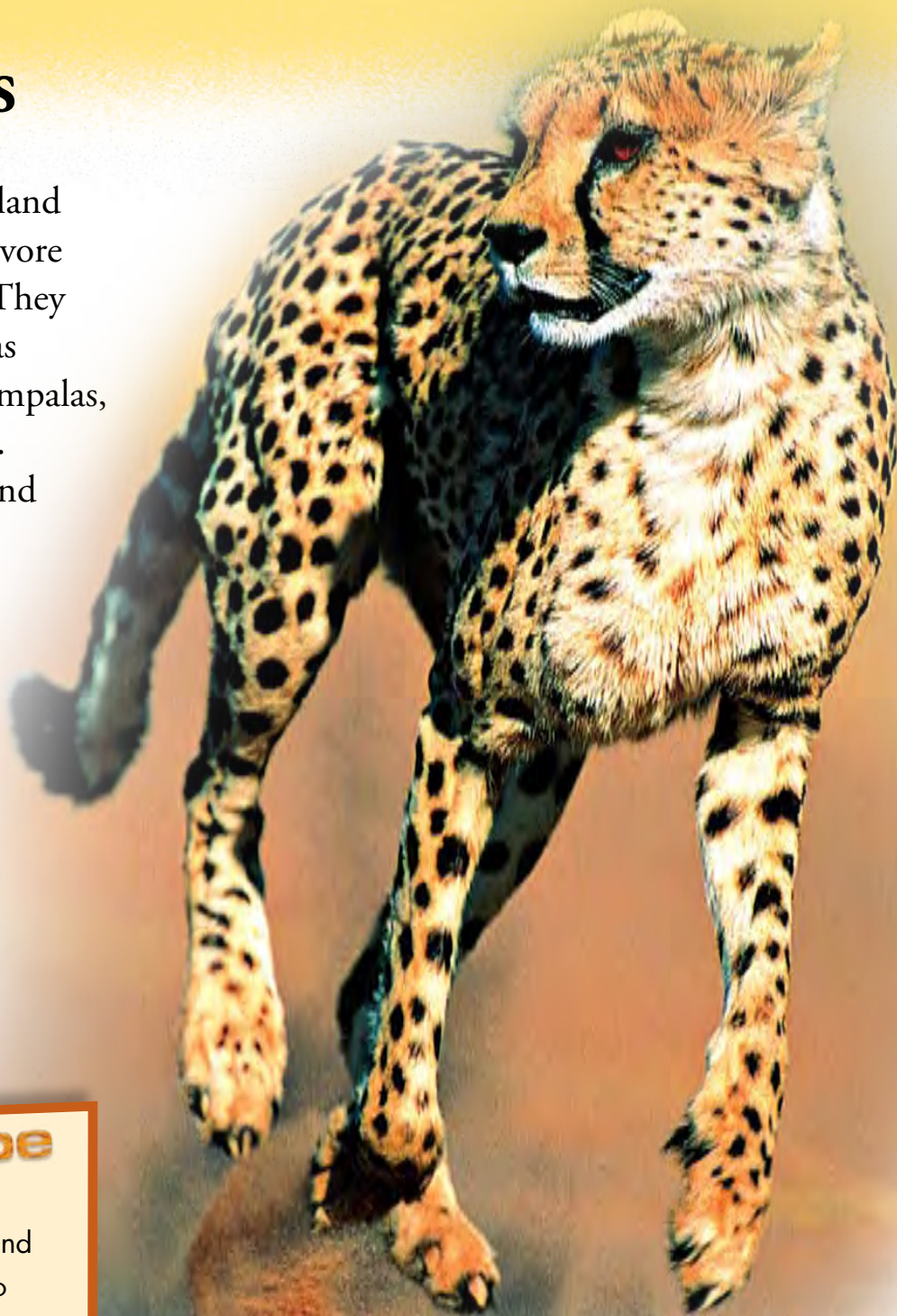


Cheetahs

Cheetahs are the fastest land animal. They are carnivore felines that hunt by speed. They hunt and eat animals such as gazelles, wildebeest calves, impalas, and smaller hoofed animals. They are found in eastern and southwestern Africa.

Distinction in Weight

An adult male cheetah weighs up to 123 pounds whereas a female weighs about 99 pounds.



fact scope

- Cheetahs are the fastest land animal. They can run up to 62 mph during hunting.
- Cheetahs depend on sight rather than smell.
- The word *cheetah* is derived from an Indian word meaning "spotted one."
- Cheetahs produce a bird-like chirping sound.
- Almost 90% of all cheetah cubs end up as prey to other carnivores within the first 6 weeks of their life.



Hunting Speed

A cheetah can chase its prey for 3.5 miles at an average speed of 44 mph.

Polar Bears



Polar bears are the biggest carnivores on earth with white-fur and long-legs. They are found in Alaska, Canada, Greenland, Norway, and Russia. They have a strong sense of smell. They eat animals such as ringed seals, hooded seals, and walrus.



Scientific Name

Ursus maritimus is the scientific name of polar bears. It means "sea bear" in Greek.

Body of Fur

A polar bear's entire body is covered with fur. Even the bottom of its paw is covered with fur.

fact scope

- Polar bears are powerful swimmers.
- Polar bears are the world's largest land predators.
- An adult male polar bear weighs between 771 to 1,499 pounds, whereas a female weighs between 330 to 551 pounds.
- The body temperature of a polar bear is 98.6 °F.
- Polar bears don't drink water.
- Polar bears have 42 teeth.
- Climatic change is the main threat to polar bears.

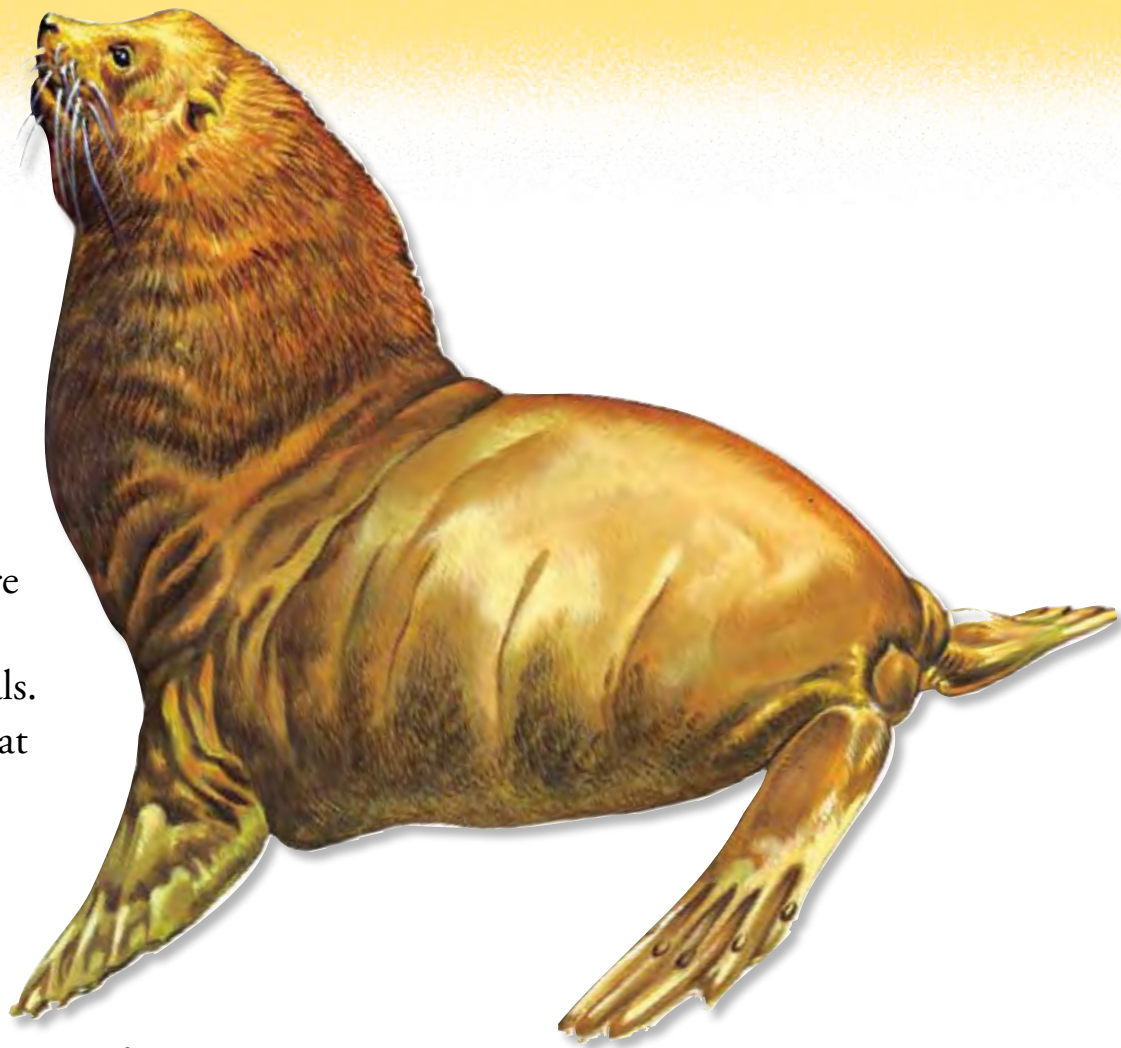


Seals

Seals are aquatic mammals. They have fins in place of feet. Pinnipeds may be eared, earless, or walrus. Sea lions and sea bears are eared seals. All other seals are earless seals. They are also known as true seals. Seals are carnivores that feed on fish, shellfish, and other marine animals.

Habitat

Seals are found in all the oceans of the world. They are also found near Antarctica and the Arctic Circle.



Arctic Seals

Ringed seals, bearded seals, harp seals, hooded seals, spotted seals, and ribbon seals are some of the varieties of seals that live near the Arctic Circle.

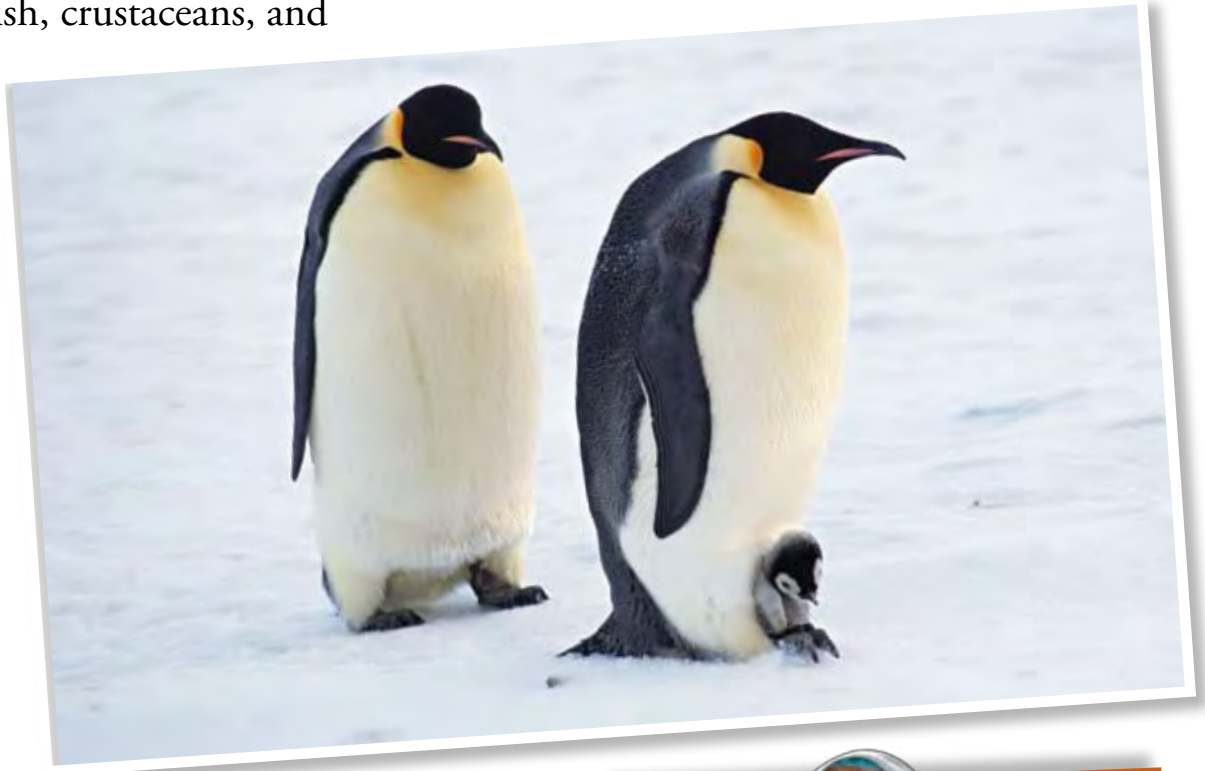
fact scope

- Fur seals are covered with a thick fur coat.
- Adult male elephant seals have a large snout.
- Steller sea lions are the largest eared seals.
- Weddell seals are Antarctic seals.
- Galapagos fur seals are the smallest fur seals.
- Walruses are the only pinnipeds that have tusks.
- The closest living relatives of pinnipeds are bears.

Penguins



Penguins are aquatic, flightless birds. They are found exclusively in the Southern Hemisphere along the coasts of Antarctica, South America, Africa, Australia, New Zealand, and the Galapagos Islands. There are 18 species of penguins. Penguins eat fish, crustaceans, and other small sea animals.



Great Divers

Penguins can dive to a depth of 820 feet or more.



Layer of Fat

Penguins have a layer of fat under their skin known as blubber.

fact scope

- Penguins live in huge colonies known as rookeries.
- A fairy penguin is the smallest penguin about 15 inches tall.
- Penguins are able to hold their breath for a long time.
- Penguins cannot breathe under the water.
- Penguins can swim at an average speed of about 14 to 15 mph.
- 75% of their time is spent underwater in search of food.
- The emperor penguin is the biggest swimming bird.



Apes

Apes resemble humans. They do not have external tails. Apes include gorillas, chimpanzees, orangutans, gibbons, and siamangs. They are found in Africa and Southeast Asia. Gibbons and siamangs are the smallest apes. The gorillas of Africa are the largest apes.



Humans and Apes

Some scientists believe that humans should be considered great apes. Chimpanzees share about 99% of genetic material with humans, more than they do with gorillas.



Great Apes

Gorillas, orangutans, chimpanzees, and bonobos are the four kinds of great apes.

fact scope

- The word "ape" was originally used to refer to baboons, an African monkey.
- Apes are capable of grasping things.
- Apes have flat fingernails and complicated fingerprints.
- Apes have arms longer than their legs.
- Apes walk on the knuckles of their hands.
- Siamang, the largest gibbon, weighs up to 50 pounds.

Lemurs



Lemurs are African mammals found only in the islands of Madagascar and Comoro. They are omnivorous and feed on fruit, invertebrates, small animals, eggs, birds, and insects. Most lemurs have long tails and large eyes.

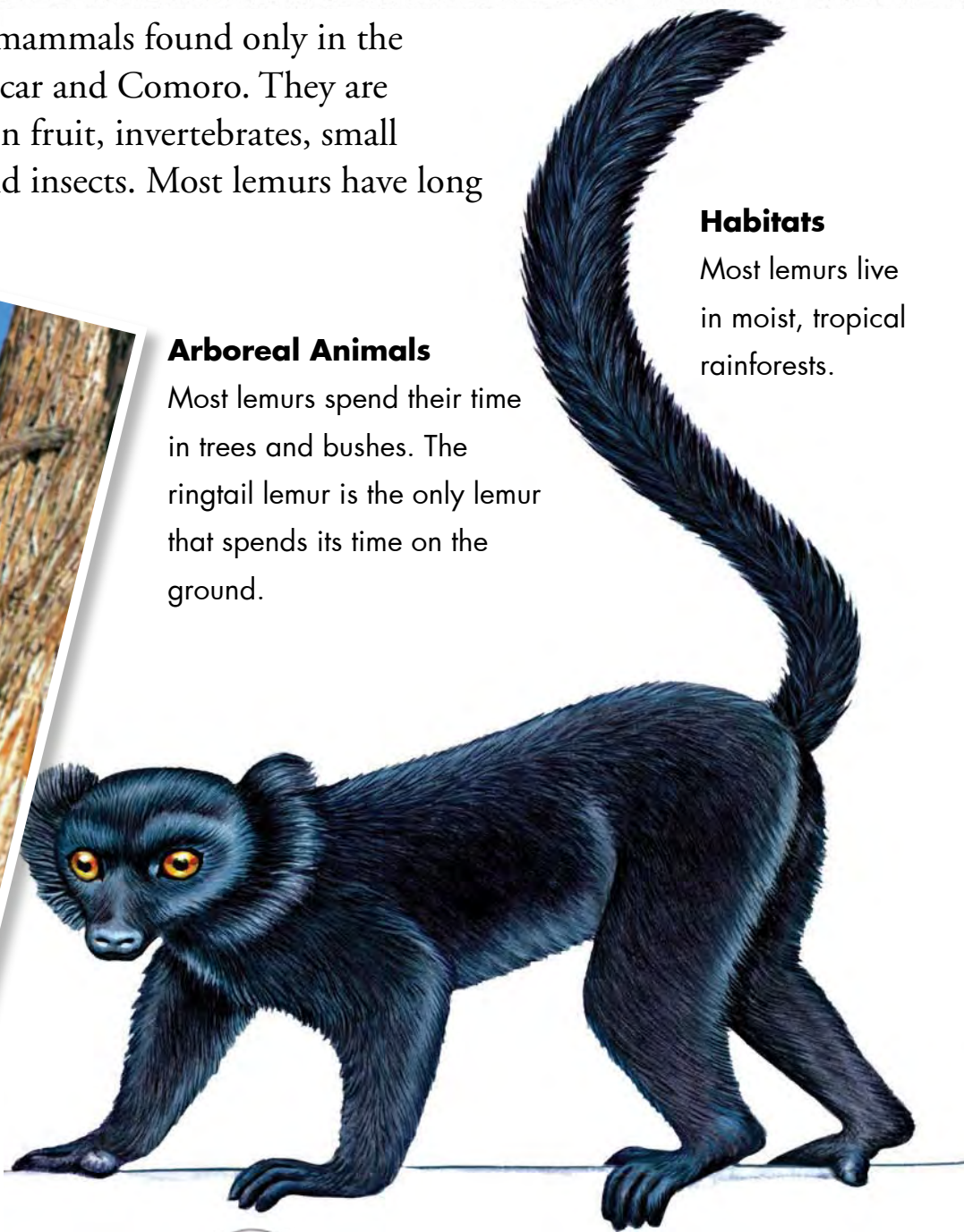


Arboreal Animals

Most lemurs spend their time in trees and bushes. The ringtail lemur is the only lemur that spends its time on the ground.

Habitats

Most lemurs live in moist, tropical rainforests.



fact scope

- Lemurs are primitive primates.
- There are 50 species of lemurs.
- Around 17 species are endangered.
- The pygmy mouse lemur is the smallest lemur.
- The indri and Diademed sifaka lemurs are the biggest lemurs.
- Lemurs have scent glands on their feet and bottom, which leaves odors on the surface as they walk.
- They use their sense of smell to communicate with each other.



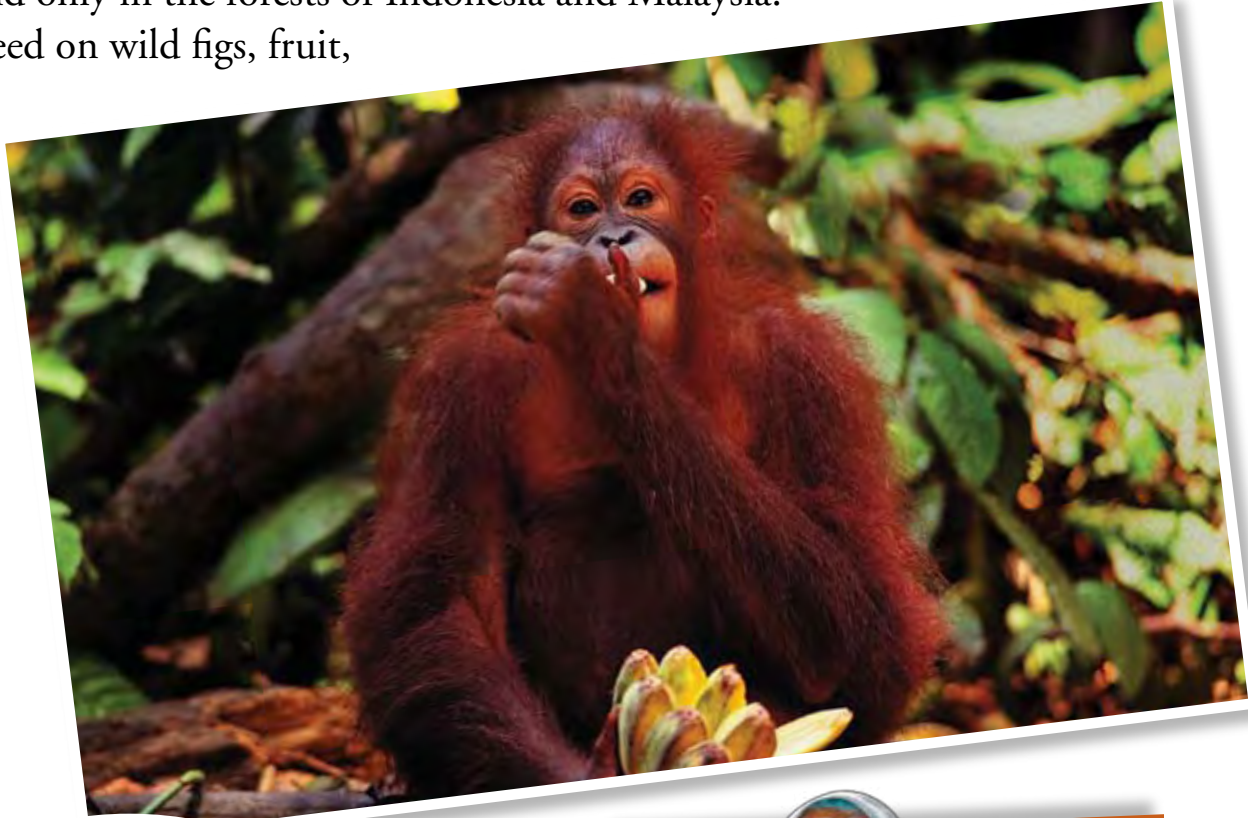
Orangutans

Orangutans are great apes that usually live alone. They have long arms and reddish or brown hair. They are considered to be highly intelligent animals. They are found only in the forests of Indonesia and Malaysia.

Orangutans feed on wild figs, fruit, leaves, bark, and even insects.

In the Wild

Orangutans in the wild are found in Borneo and northern Sumatra.



Threats

Poaching and habitat destruction threaten the existence of these animals.

fact scope

- The lifespan of an orangutan is about 35 years in the wild and up to 50 years in captivity.
- The scientific name of an orangutan is *Pongo pygmaeus*.
- Female orangutans give birth to a baby once every eight years.
- In the Malay language, the word *orangutan* means "man of the forest."
- Orangutans are hunted by tigers, leopards, and large pythons.

Monkeys



Monkeys are divided into New World and Old World. New World monkeys are found in South America, and Old World monkeys are found in the forests of Africa and warm areas of Asia. The pygmy marmoset is the smallest monkey and the mandrill monkey is the largest.

Colobinae Subfamily

Members of the Colobinae subfamily include colobus lutungs, langurs, proboscis, and leaf-monkeys.

Cercopithecinae Subfamily

Members of the Cercopithecinae subfamily are baboons, mangabeys, mandrills, guenons, patas monkeys, and macaques.



fact scope

- The Old World monkeys are divided into two subfamilies:
 - the Cercopithecinae
 - the Colobinae
- There are around 78 species of Old World monkeys.
- Baboons, mangabeys, mandrills, guenons, and patas monkeys are African species.
- Macaques live in Asia and Gibraltar.
- The Colobinae are herbivores.
- The New World and the Old World monkeys differ in their noses, cheek pouches, rump pads, and tails.



Snakes

Snakes are cold-blooded reptiles that belong to the suborder Serpentes. Snakes are legless, but they use special locomotion techniques such as an undulating crawl, caterpillar locomotion, and sidewinding to move ahead. Snakes are carnivores that feed on animals such as lizards, other snakes, rodents, birds, and insects.

King Cobra

The king cobra found in India, southern China, and Southeast Asia is the largest venomous snake.



The African Rock Python

The African rock python found in sub-Saharan Africa is killed for its beautiful skin, meat, and fat.

fact scope

- There are over 2,000 different species of snakes.
- Snakes have a long, narrow body and scaly skin
- Snakes are not found in Antarctica.
- Snakes have no eyelid and no external ears.
- Snakes shed their skin and acquire new ones.
- The anaconda, found in South America, is the biggest snake.
- The inland taipan is considered to be the most venomous land snake.
- All snakes swallow their prey.

Crocodiles and Alligators



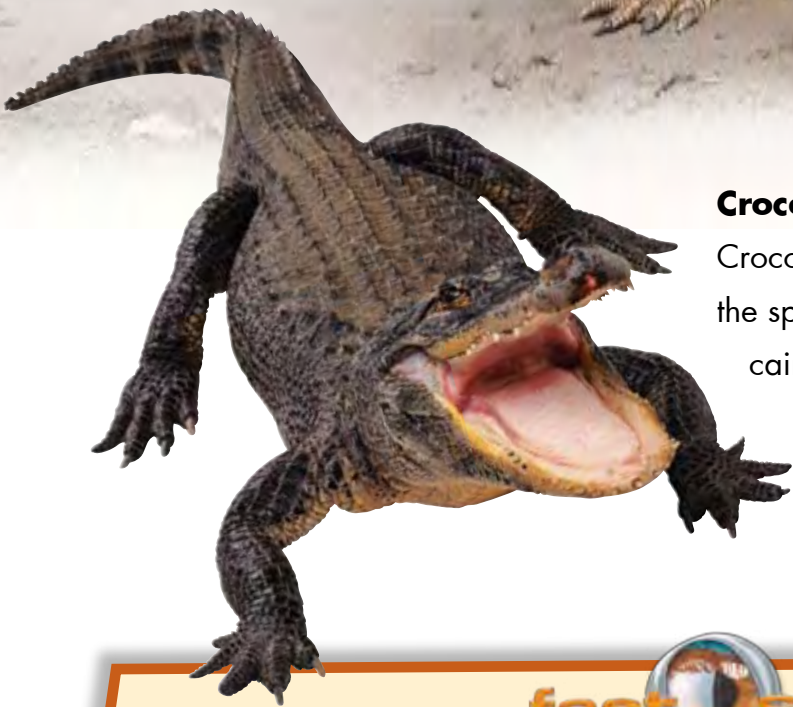
Crocodiles are huge semi-aquatic reptiles with a long snout. They are carnivorous and feed on fish, birds,

and mammals. Alligators are like crocodiles but have a shorter and broader snout.

They are also carnivorous.

Crocodiles are found in Africa, Asia, the Americas, and Australia.

Alligators are found only in the United States and China.



Crocodylians

Crocodylians include all the species of alligators, caimans, and crocodiles.

Crocodylus Porosus

The *Crocodylus porosus* is considered to be the largest species of crocodile.

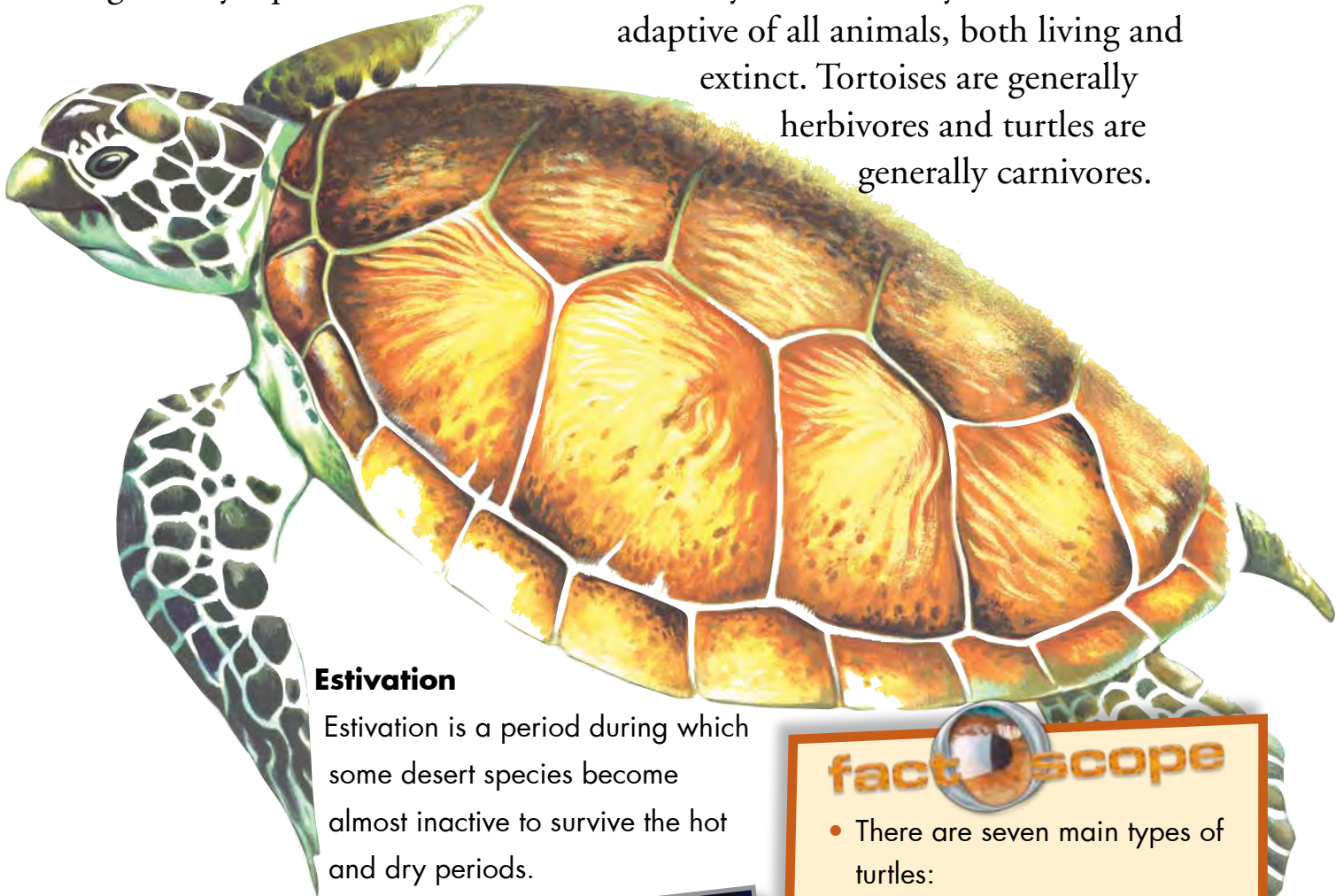
fact scope

- Crocodiles and alligators are found in grassy swamps and slow-moving rivers.
- Alligators have rounded U-shaped snouts.
- Crocodiles have pointed V-shaped snouts.
- The teeth are visible even when the crocodile's mouth is shut.
- Crocodiles mostly live in saltwater.
- Alligators generally live in freshwater.



Turtles and Tortoises

Tortoises and turtles are reptiles that are covered by a hard shell. Turtles are generally aquatic, while tortoises live mostly on land. They are the most adaptive of all animals, both living and extinct. Tortoises are generally herbivores and turtles are generally carnivores.



Estivation

Estivation is a period during which some desert species become almost inactive to survive the hot and dry periods.



Threats

Many species of turtles are endangered. Humans are the greatest threat to these species.

fact scope

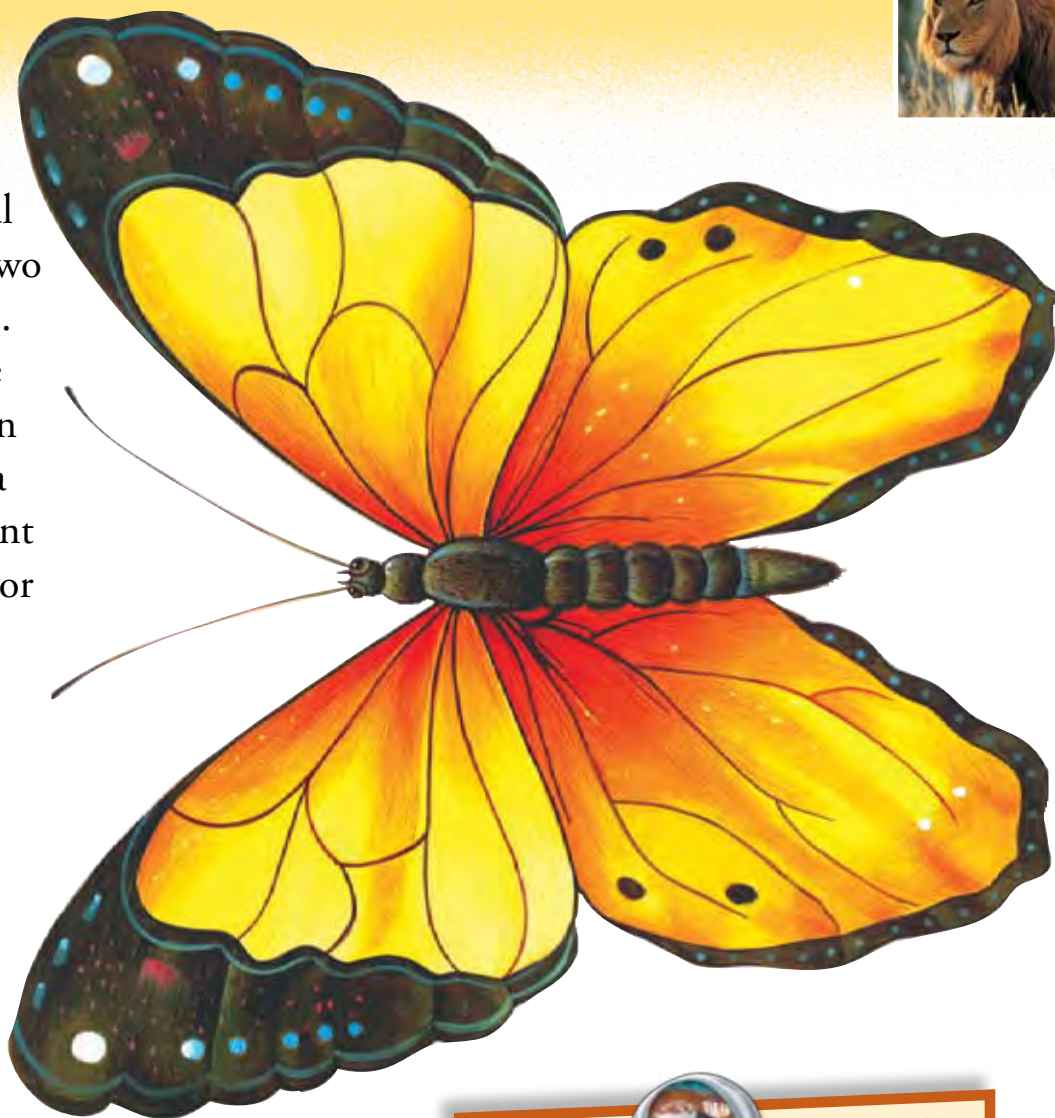
- There are seven main types of turtles:
 - Mud and musk turtles
 - Pond and marsh turtles
 - Sea turtles
 - Side-necked turtles
 - Snapping turtles
 - Soft-shelled turtles
 - Tortoises
- All turtles are cold-blooded.
- There are more than 250 species of turtles.
- Turtles are found almost everywhere in the world except Antarctica.
- Terrapins are turtles that live in or near freshwater.

Butterflies

Butterflies are colorful flying insects with two pairs of large scaly wings. They fly only during the day and generally feed on nectar. The life cycle of a butterfly has four different stages—egg, larvae, pupa or caterpillar, and adult.

Migration

Several species of butterflies migrate to avoid adverse conditions. The monarch butterflies migrate thousands of miles.



Habitat

Butterflies are found almost everywhere. They are generally found in the tropical rainforests.

fact scope

- Butterflies have a hard exoskeleton.
- They have three pairs of jointed legs, antennae, and compound eyes.
- The body of a butterfly is divided into three main parts:
 - head
 - thorax
 - abdomen
- The long flexible tongue of a butterfly is called the proboscis.
- Butterflies live up to 20 to 40 days.
- Some species of butterflies live for just three to four days.



Beetles

Beetles are known to have the maximum number of species among all insects. They have hardened forewings made of chitin plates that protect them from predators.

They eat plants, fungi, other invertebrates, and animal and plant debris. Coleopterology is the study of beetles.



Complete Metamorphosis

In complete metamorphosis, insects pass through four stages of development—egg, larva, pupa, and adult.

Coleoptera

Beetles and weevils make the largest group of insects called coleoptera.

fact scope

- Some common beetles are:
 - Japanese beetle
 - Potato beetle
 - Wood-boring beetle
 - Boll weevil
 - Ladybug
 - Carrion bug
- The top pair of beetle's wings is hard and shell-like.
- Beetles can be found in land and freshwater habitats.
- The lady bug is a beetle that eats harmful insects and is helpful to man.
- There are about 350,000 known species of beetles in the world.



Ants



Ants are social insects that live in colonies under the ground or in tree holes. Ant colonies have thousands of ants, which include the queen, male ants, worker ants, and soldier ants. The queen mates with the males and the workers collect food and feed members of the colony.



Ant Attack

Ants can damage crops and ornamental plants and clear large areas of all vegetation. Many species of ants also attack livestock.

Carpenter Ants

Carpenter ants cause damage to wooden structures by cutting out tunnels in them.

fact scope

- Ants undergo complete metamorphosis.
- Ant eggs are minute and usually white.
- In the larvae stage an ant has no legs.
- Ants can lift 20 times their own body weight.
- The brain of an ant has about 250,000 brain cells.
- Ants have compound eyes.
- Ants have two stomachs.
- There are around 10,000 species of ants.





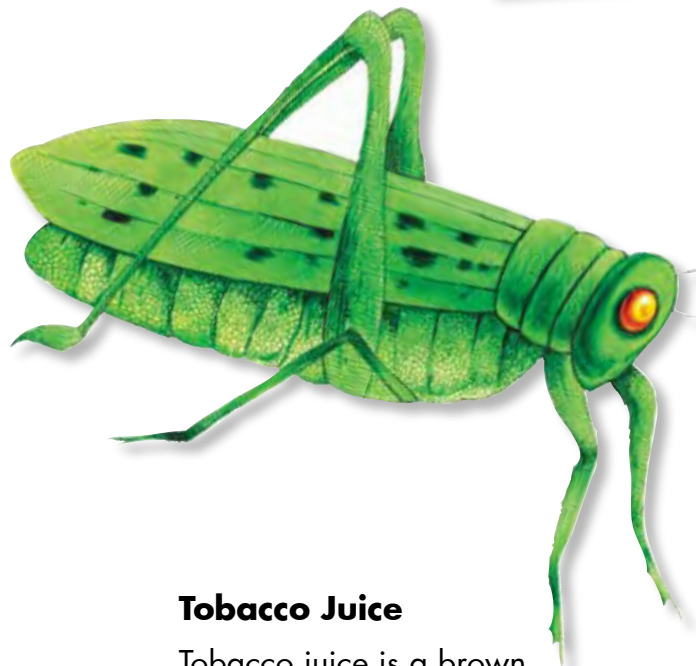
Grasshoppers

Grasshoppers are insects. They have strong, large hind legs that enable them to jump and leap. There are about 10,000 species of grasshoppers worldwide.

Grasshoppers are herbivores with powerful mouthparts that help them to bite and chew.

Color

Grasshoppers are generally green, brown, or olive-green.



Tobacco Juice

Tobacco juice is a brown, bitter liquid that some grasshoppers spit out as a defensive behavior when they are threatened.

fact scope

- The mouth parts of a grasshopper are specially designed for chewing with jaws that move back and forth.
- Grasshoppers use their long hind legs for hopping and the short front legs for walking.
- Grasshoppers can leap up to 20 times the length of its own body.
- Long-horned grasshoppers and crickets have their hearing organs on the forelegs.
- Grasshoppers eat plants.

Dragonflies



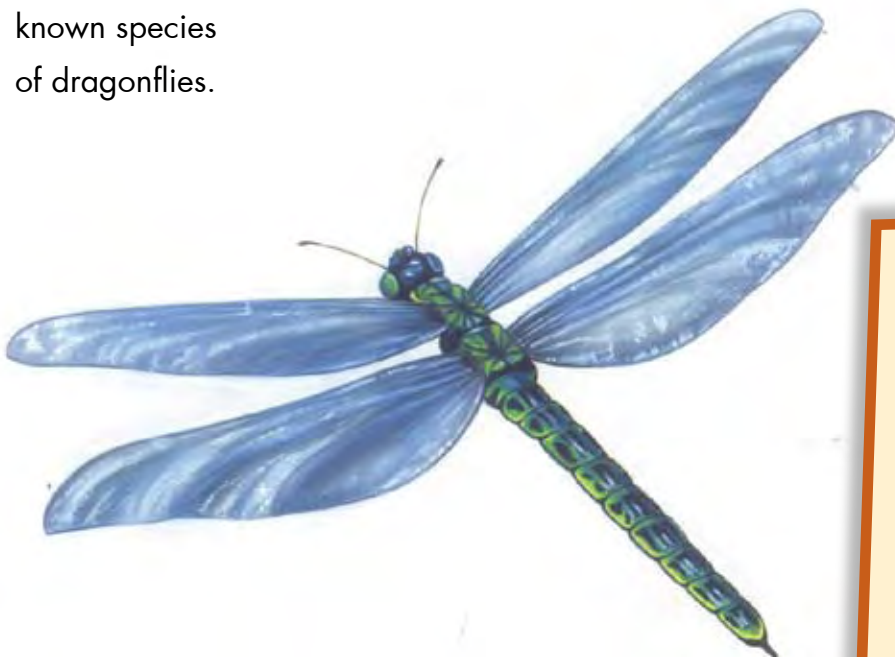
Dragonflies are the fastest insects in the world. They have large eyes, transparent wings, and an elongated body. They are also known as darning needles, snake feeders, and mosquito hawks. Dragonflies are found all over the world. Dragonflies

usually feed on mosquitoes, flies, bees, and butterflies.



Species

There are more than 5,000 known species of dragonflies.



Mosquito Hawk

Dragonflies are often called mosquito hawks because they catch and eat mosquitoes.

fact scope

- Dragonflies are some of the oldest living insects.
- Adult dragonflies have long slender bodies with net-like veins.
- Dragonflies hunt and mate during the daytime.
- Dragonflies can see in color as well as ultraviolet and polarized light.



Frogs and Toads

Frogs inhabit moist and warm areas. They are generally found near bodies of water. They have strong muscular hind legs with webbed feet. Toads are found almost all over the world. They have a warty, dry, and leathery skin, which helps them to retain water.



Frog Skin

Frogs drink and absorb most of the moisture they need through their skin.



Life Span

The European common toad has a life span of 40 years.

fact scope

- Frogs and toads generally have large protruding eyes.
- The necks of frogs and toads are almost non-existent.
- The goliath frog found in Cameroon in West Africa is the largest frog.
- The gold frog is the smallest frog in the Southern Hemisphere.
- The body length of adult gold frogs is only .38 inches.
- *Eleutherodactylus Iberia* is a small frog.
- Some frogs are poisonous.

Rodents



Rodents are a group of small mammals. Rats, squirrels, porcupines, and moles are some common rodents. Rodents are the single largest group of mammals. Most rodents are land animals, while some are aquatic and arboreal. There are around 2,000 known species of rodents.



Beaver

The beaver is a large, semi-aquatic rodent that can swim at a speed of 4.5 mph and can swim underwater for up to 15 minutes.



Rodentia

Rodents belong to the class *Rodentia*. The word *Rodentia* means "to gnaw."

fact scope

- Most rodents are herbivores.
- Rodents like the house mouse are omnivores and a few, like the Australian water rat, are carnivores.
- The capybara is the biggest rodent, almost 4.2 feet long.
- The pygmy jerboa is the smallest rodent, around 1.8 inches long.
- The guinea pig is an example of a domesticated rodent.



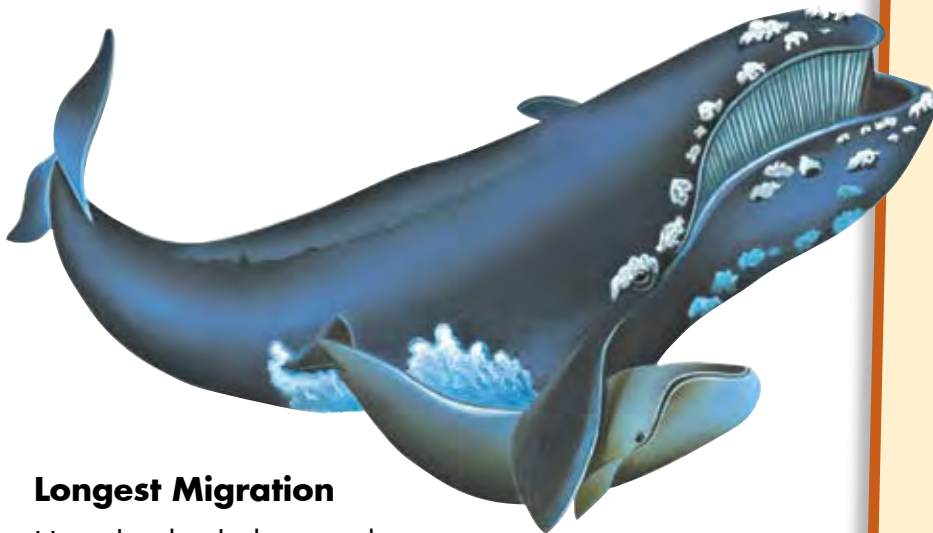
Whales

Whales are of two type—toothed and baleen. Baleen whales have baleen plates in their mouths instead of teeth. They are very large in size. They are carnivores and eat shrimp and krill. Toothed whales are active hunters and feed on fish, squid, and marine mammals.



Young Blue Whales

Young blue whales drink about 50 –150 gallons of milk a day.



Longest Migration

Humpback whales travel the longest distance among mammals.

fact scope

- The blue whale is the largest mammal on Earth.
- The blue whale is an endangered species of whale.
- Sperm whales have the largest brain among all animals.
- The humpback whale is also known as the singing whale.
- Fin whales use their flukes as a weapon.
- The right whale does not sink when killed.
- Newborn blue whales are at least 19 feet long.
- Blue whales live for more than 80 years.

Dolphins

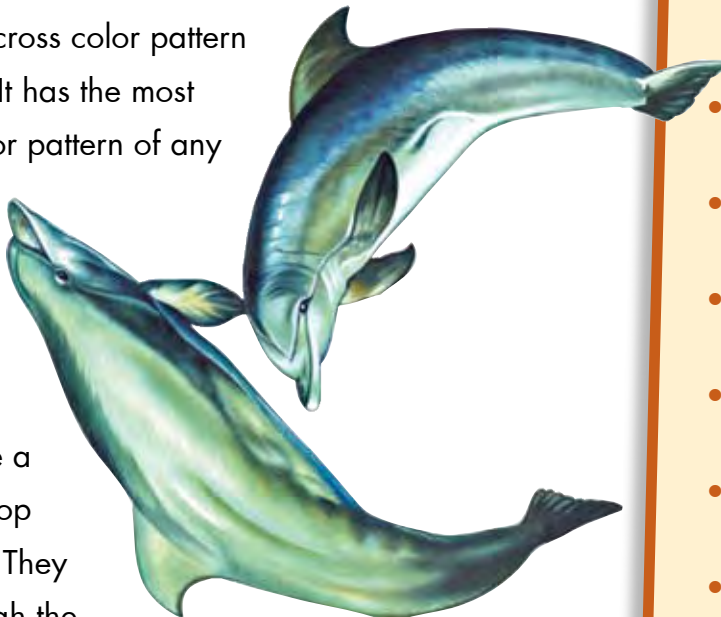


Dolphins are aquatic mammals. They are toothed whales, closely related to whales and porpoises. They have many small pointed teeth inside their mouth. They are known to be intelligent animals. Dolphins eat mostly fish and squid.



Common Dolphin

Common dolphins have a complex crisscross color pattern on their side. It has the most elaborate color pattern of any cetacean.



Blowhole

Dolphins have a blowhole on top of their head. They breathe through the blowhole.

fact scope

- Most of the species of dolphins live in tropical and temperate oceans.
- Some dolphins live for more than 100 years.
- The gestation period of dolphins is 9 to 17 months.
- Dolphins feed on squid, fish, and crustaceans.
- Usually dolphins live in groups of five to hundreds.
- Tucuxi is the smallest species of dolphin.
- Orca is the largest species of dolphin.



Sharks

Sharks are cartilaginous fish found in the seas and oceans. Most sharks are predators, but a few species eat plankton. They hunt with the help of their sharp sense of hearing and smell. Sharks are generally gray in color. Sharks eat fish, carrion, seals, turtles, birds, whales, crabs, and smaller sharks.



fact scope

- There are about 360 species of shark.
- Sharks can only swim forward.
- The skin of sharks is rough and has sandpaper like placoid scales.
- The size of sharks ranges from about 7 inches to 49 feet.
- Most sharks have streamlined, torpedo-shaped bodies.
- The whale shark is the largest fish in the world.
- The number of teeth can reach to 3,000 at a time in sharks.

Evolution of Sharks

Sharks evolved about 300 million years ago. Fossilized teeth and few skin impressions are the fossil evidence of early sharks.



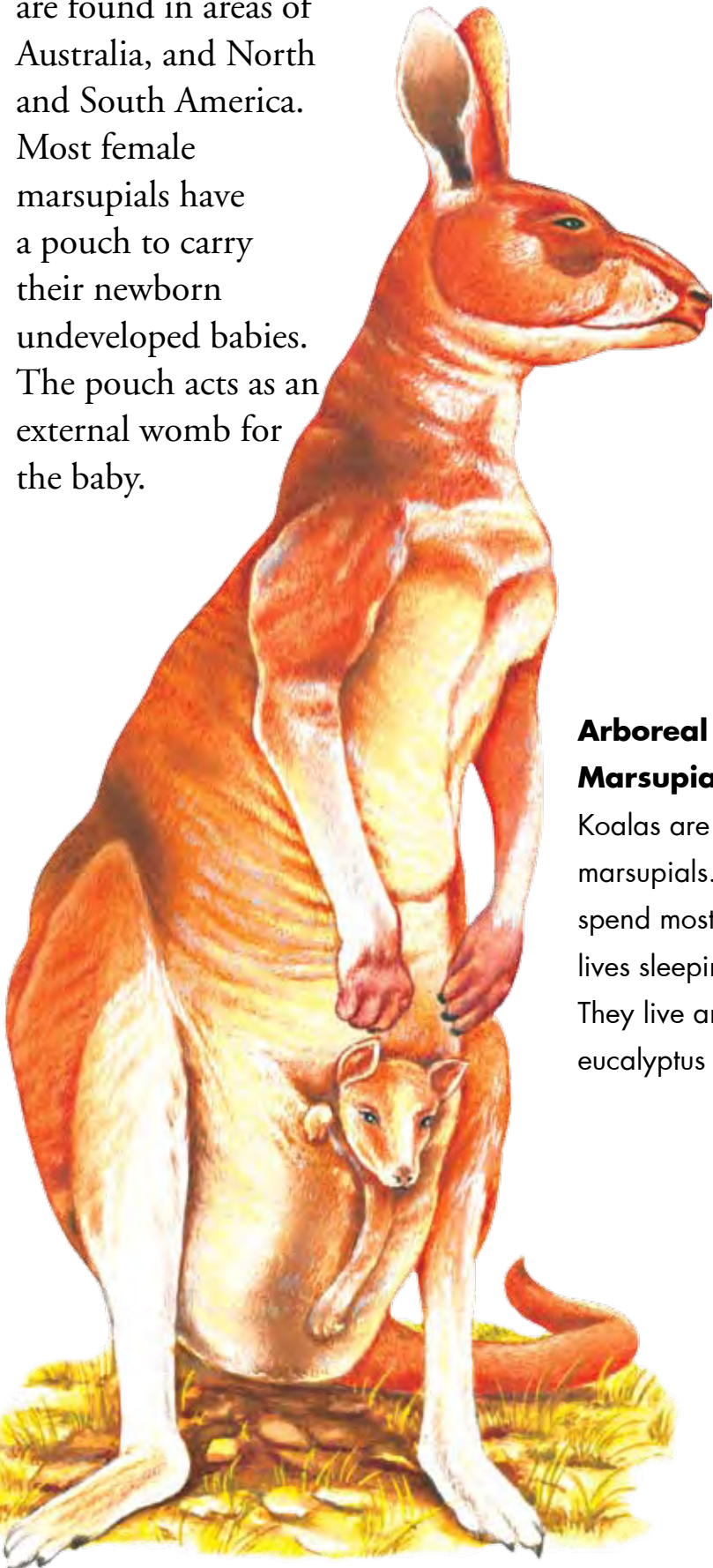
Shark Attacks

Generally, sharks do not attack human beings. Only 25 species of shark are known to attack human beings.

Marsupials



Marsupials are pouched mammals. They include animals like kangaroos, opossums, wombats, and koalas. Marsupials are found in areas of Australia, and North and South America. Most female marsupials have a pouch to carry their newborn undeveloped babies. The pouch acts as an external womb for the baby.



fact scope

- The young marsupials are born at a very immature stage.
- The pouches of kangaroos open towards their heads.
- Koalas have pouches that open towards their hind legs.
- Some kangaroos take a jump of 32 feet in one big leap.
- A koala sleeps for 18 hours a day.
- All opossums do not have a pouch.
- Wallabies are kangaroos of medium size.

Arboreal Marsupials

Koalas are arboreal marsupials. They spend most of their lives sleeping in trees. They live and feed on eucalyptus trees.



Wombats

Wombats are active at night and live in burrows. They have strong teeth to eat roots and grasses.



Ungulates



Ungulates are hoofed mammals. This group includes animals like horses, deer, camels, sheep, and rhinoceroses. Ungulates are a diverse group of mammals. They are broadly classified into even-toed ungulates and odd-toed ungulates. Even-toed ungulates include sheep, goats, camels, and pigs. Odd-toed ungulates include horses and rhinoceroses.

Antelopes

Antelopes are a group of ungulates that include animals such as the impala, wildebeest, and eland.

Camels

Camels are ungulates. They live in deserts. The bactrian camel and dromedary camel are the two types of camels. Bactrian camels have one hump and dromedary camels have two humps.



fact scope

- Ungulates usually live in grasslands.
- Most of the ungulates are herbivores.
- They grind their food with the complex molar teeth.
- Elephants, the largest land animals, are also ungulates.
- Some ungulates are powerful runners e.g., horses.
- The Arabian oryx is an ungulate that can live for months without water.
- The furry ungulates with short legs are hyraxes.
- Horses send signals to each other with their tails.

Raptors



Raptors are meat-eating birds. Eagles, hawks, kites, and vultures are some of the common raptors. They hunt down their prey using their strong feet and hooked beaks. Many raptors such as vultures feed on the remains of dead animals.



Elf Owls

The smallest owls are elf owls. They hide in the holes of the saguaro cactus during daytime and cover their eyes with a wing.



Nests

Raptors generally do not make their own nests. They nest and lay their eggs in nests made by other birds, cavities, gravel, treetops, or ground burrows of mammals.

fact scope

- Raptors have incredible vision through which they see their prey from long distances.
- The hooked beaks of raptors help to rip the flesh of prey.
- The clawed feet help them to pierce the internal organs of prey.
- Barn owls have the most powerful sense of hearing.
- Eagles have more than 7,000 feathers.
- 450 species of raptors are found worldwide.
- Owls swallow their prey whole since they do not have teeth.



Flightless Birds

Flightless birds are birds that cannot fly. The ostrich is the biggest flightless bird alive. Though they cannot fly, they can run with the help of their powerful legs at speeds exceeding 38 mph. Other flightless birds include penguins and kiwis.



Emperor Penguin

The emperor penguin is the largest penguin that lives on ice packs in Antarctica. They keep their skin dry with the help of shiny waterproof feathers.

fact scope

- 40 species of flightless birds exist today.
- Flightless birds have small wing bones.
- Ostriches use their claws as their weapons.
- The Auckland island teal is a flightless duck.
- Flightless birds have a flat breastbone.
- Penguins can swim and spend most of their lives in water.
- The cassowary has a helmet-like crest on its head.
- Kakapo is the only flightless parrot that lives in New Zealand.



Evolution

Flightless birds evolved from flying birds. It is believed that they had no predators so they lost their flying power.

Desert Animals



Deserts are regions with extreme temperature and very little rainfall. Animals that can cope with extreme temperatures, lack of water, and shortage of food can survive in deserts. Many desert animals are nocturnal. Common desert animals include camels, gazelles, lizards, snakes, antelopes, and shrews.

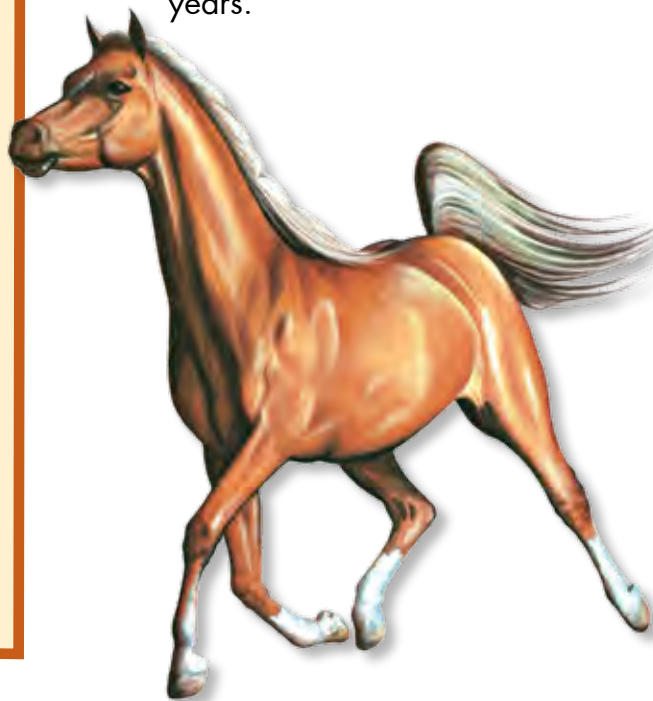


Arabian Horses

Arabian horses are intelligent horses. They live for 20 to 35 years.

fact scope

- Armadillo lizards are found in the deserts of Africa.
- Desert kangaroo rats are found in large dens in the Mojave and Sonoran deserts.
- The cactus wren is a bird found in the semi-arid deserts of California.
- The dromedary and dung beetle are some of the animals found in Arabian deserts.



Gazelles

Gazelles are antelopes. They are medium in size. 14 species of gazelles are found across North Africa and southwest Asia.



Arctic Animals

The Arctic region is located around the North Pole. It is one of the coldest habitats with extremely low temperatures. Arctic hare, arctic fox, polar bears, cod, flatfish, and caribous are examples of Arctic animals. During the extreme winter conditions, some arctic animals, such as the Arctic tern, migrate to warmer areas.

Walrus

Walrus have a layer of blubber that protects them from the cold wind when they lie out on ice.



Arctic Tern

The Arctic tern flies from the Antarctic to the Arctic to nest and raise its young.

fact scope

- Caribou go to the forests in the winter and leave the forests in spring.
- Musk oxen shed some of their thick overcoat in summer.
- Arctic wolves feed on arctic hare and musk oxen.
- Ermines have white winter coats and brown summer coats.
- Wolverines are fierce animals that look like a small bear.
- Arctic hares hide from the wolves, foxes, and owls and lives among the rocks.

Rainforest Animals



Rainforests are wet and dense forests. Tropical rainforests are situated between the Tropic of Cancer and Tropic of Capricorn. More than half of the world's animals live in tropical rainforests. These animals include insects, worms, fish, reptiles, amphibians, birds, and mammals.

Macaws

Macaws are the largest parrots. They are found in the rainforests of Central and South America.

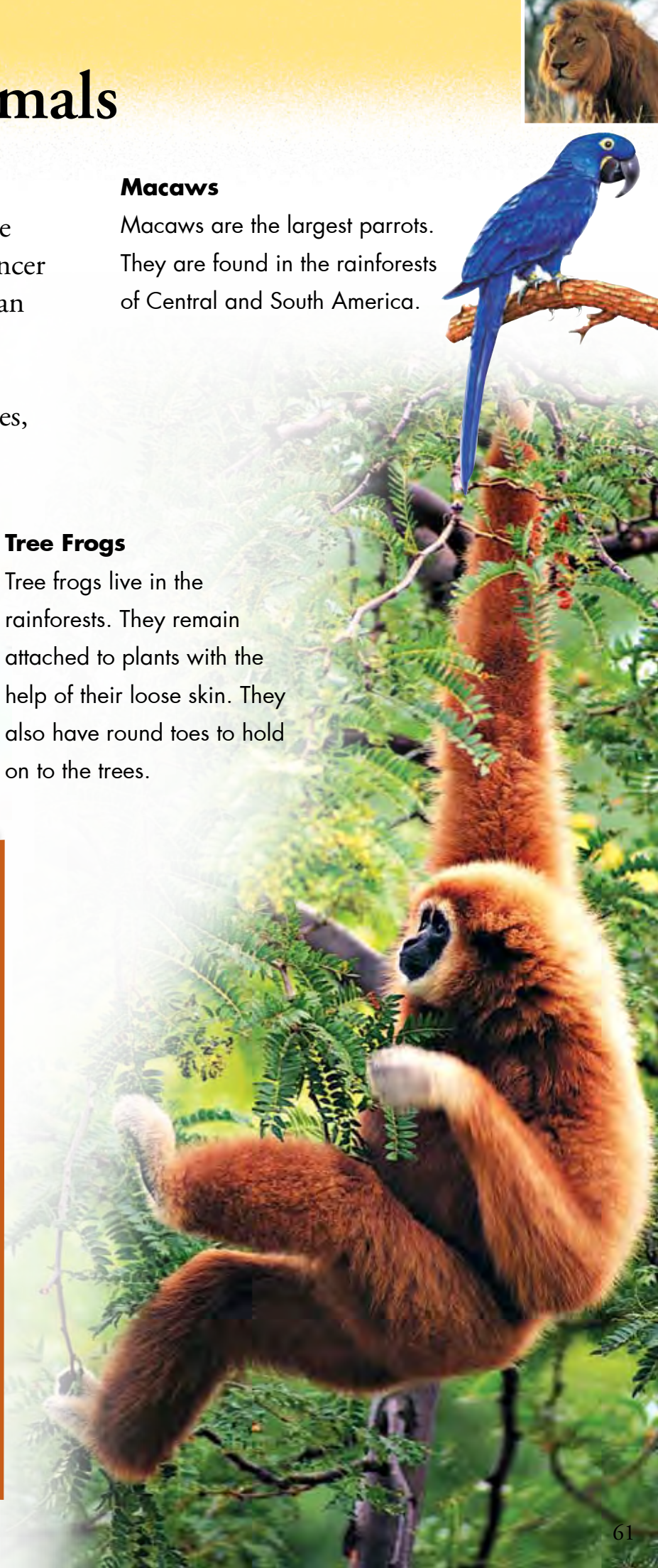


Tree Frogs

Tree frogs live in the rainforests. They remain attached to plants with the help of their loose skin. They also have round toes to hold on to the trees.

fact scope

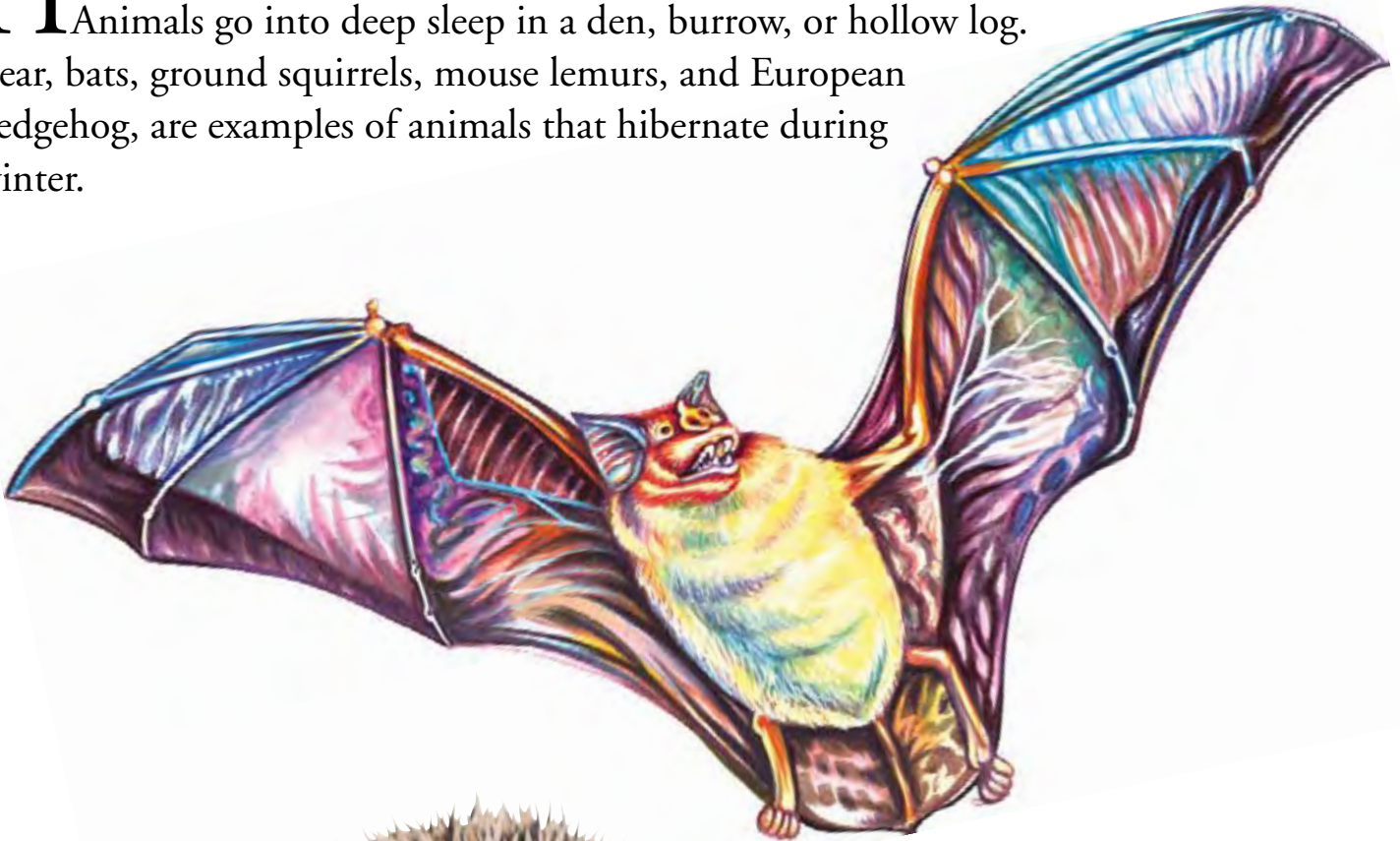
- Anacondas can climb trees and are good swimmers.
- Colobus monkeys have tails longer than their bodies.
- Okapi are the most unusual animals of the rainforest.
- Ants carry leaves bigger than their body from top of the forests to the forest floor.
- Chameleons change their skin color when they are in danger.
- Gray parrots are noisy birds that live in the African rainforests.
- Nocturnal animals like bats are also found in rainforests.





Hibernation in Animals

Hibernation is a sleep-like condition found in animals during winter. Animals go into deep sleep in a den, burrow, or hollow log. Bear, bats, ground squirrels, mouse lemurs, and European hedgehog, are examples of animals that hibernate during winter.



Red-eared Terrapins

Red-eared terrapins bury themselves in the mud at the bottom of a pond and hibernate in water.



Internal Clocks

It is believed that animals have an internal clock to break their hibernation period.

factoscope

- The true hibernation results in a drop of heart rate.
- The body temperature goes to 32° F in hibernation.
- Hibernation lasts for several days or weeks.
- The metabolism level of animals becomes very slow during hibernation.
- Animals use the fat reserves of the body stored in the summer months.
- Bears are not true hibernators.
- Animals that are aquatic can hibernate in water and out of water.

Extinct Animals



Most animal species that lived on Earth are extinct due to various reasons. Dinosaurs, dodos, and woolly mammoths are a few examples of species that have become extinct. Several species become extinct every year. Habitat destruction, new species introduction, and hunting are the major reasons for extinction in modern times.

Largest Extinct Bird

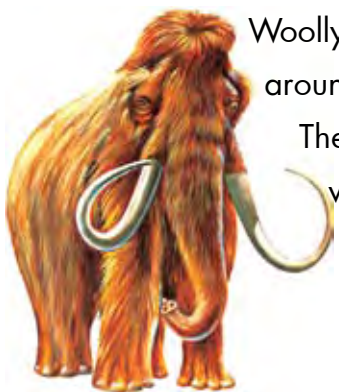
Dromornis stirtoni is the largest extinct bird that was about 9.8 feet tall and weighed 992 pounds.

fact scope

- Archaeopteryx, the earliest known bird, had features of both birds and reptiles.
- Ichthyosaurus is an extinct marine reptile that existed at the time of the dinosaurs.
- The saber toothed cat, a fierce predator, lived during the Ice Age.
- Dodos are flightless extinct birds from Mauritius.
- The Tasmanian wolf is an extinct marsupial native to Australia.
- American mastodons were the largest land animals of the Ice Age.

Woolly mammoths

Woolly mammoths lived around 100,000 years ago. They were large elephants with long shaggy fur and two huge tusks.





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fact  scope

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EDUCATIONAL PUBLISHING
Three Watson
Irvine, CA 92618-2767
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