



with





Turtles evolved around 220 million years ago, making them among the oldest and most primitive reptiles. In fact, turtles have been around longer than lizards, snakes, and crocodiles. They have even existed for longer than any mammal! The only real difference between the first turtles and turtles today is that early turtles could not pull their heads into their shells.

Turtles live all over the world and different species can survive in nearly any climate. The only place they don't live is Antarctica. There are 327 species of turtle on Earth. Sometimes people confuse tortoises, terrapins, and turtles, but there are differences between the three.

A turtle spends most of its life in water. In fact, sea turtles only leave the ocean to lay their eggs in the sand. Turtles have webbed feet for swimming and streamlined bodies for moving through the water.

Tortoises spend their lives on land. Their feet are round and stumpy, better for walking than swimming. They use their strong forelimbs to dig burrows where they hide when the sun gets too hot. Tortoises have rounder backs than turtles.

Terrapins divide their time between water and land. They usually live in ponds, swamps, lakes, or rivers.

All of these creatures are unique because of their hard shells. A turtle's shell is made up of 60 different bones. The bones are covered with plates to make the shell even stronger. It is actually a modified rib cage attached to the spinal column. The shell has nerve endings in it, so if you touch a turtle on its shell or pick it up by the shell, the turtle can feel it. The shell protects the turtle from predators like



raccoons, dogs, and coyotes. Box turtle shells have hinges so that the turtle can completely enter its shell by closing it up. The top part of the shell is called the carapace, and the bottom is called the plastron. The plates, called scutes, are made of keratin, the same substance that makes up human fingernails. So you kind of have turtle shells at the ends of your fingers.

There are so many types of turtle that it is impossible to pinpoint an average size. Turtle sizes vary from the 3-inch Speckled Cape Tortoise to the 6-foot Galapagos Tortoise, with every size in between. The largest sea turtle is the leatherback at around 5 feet long and the alligator snapping turtle is the largest in North America at roughly 2.5 feet long.

Turtles are not social creatures. Though you can often see a row of them sunning on a log, they aren't socializing, just taking advantage of a convenient sunny spot. They don't really interact with each other, but neither are they as silent as we imagine them. Some bark like a dog, some make a sound like a human burp, and some make a sound very like an electric motor. There's even one that clucks like a chicken! However, these sounds are not turtles talking to each other. Although a group of turtles is called a bale, that's mostly for human categorization—the turtles don't consider themselves a group.



Turtles are omnivores, just like us. They eat a variety of plants, grasses, and algae, as well as insects, small fish, snakes, frogs, worms, and mollusks. The alligator snapping turtle uses its tongue, which looks like a worm, to lure fish. The leatherback turtle eats jellyfish. However, turtles do not have teeth. Their mouth has a sharp, hard, pointed edge like a bird's beak. They use that edge to bite their food. Some turtles can live up to a year without food, and red-footed tortoises can go for 2-3 years without eating.

Turtles have long lifespans, some living as much as twice as long as humans can. Box turtles can live for 40 years or more, but sea turtles live 80-100 years or longer and Galapagos Tortoises live for around 200 years.

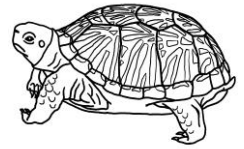
All turtles lay eggs to procreate. While sea turtles lay their eggs in sandy nests on the beach, while land turtles dig their nests in soil. Some turtles lay just a few eggs per nest, but a sea turtle can lay as many as 110 eggs in a single nest. No matter where the nest is, the turtle lays the eggs, buries them, and walks away, never returning to see how things turn out. Not a single turtle species nurtures its young. The

temperature of the nest determines the gender of the hatchlings in many species. Warmer nests produce females while colder nests produce males.

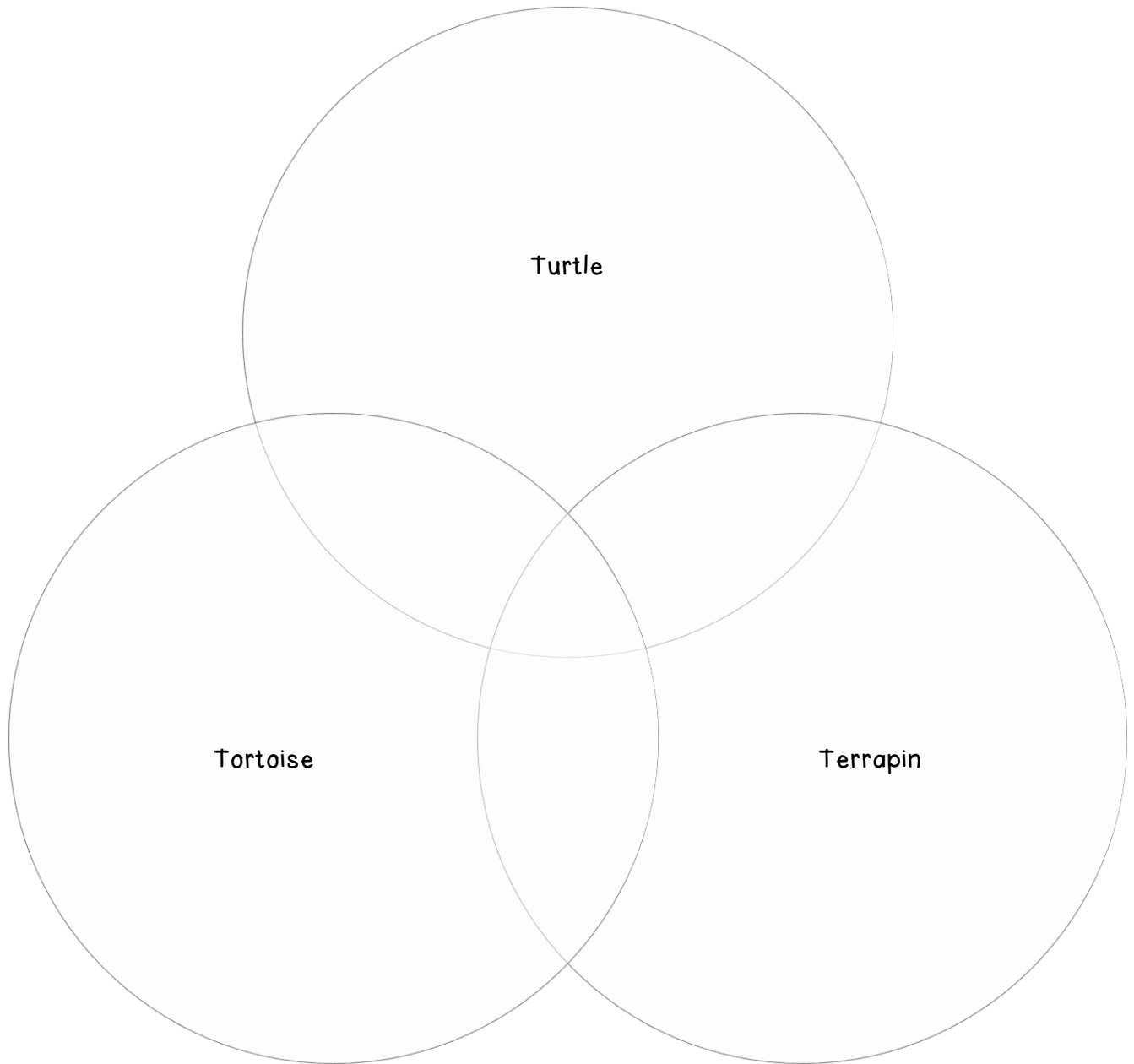
Many turtle species are endangered, some very close to being extinct. According to the International Union for Conservation of Nature (IUCN), both the plowshare tortoise and the radiated tortoise are estimated to be extinct within the next 45 years. Still, turtles have had an interesting history, and two tortoises even went to space in a 1968 Soviet Union probe. They were, in fact, the first living creatures to orbit the moon.



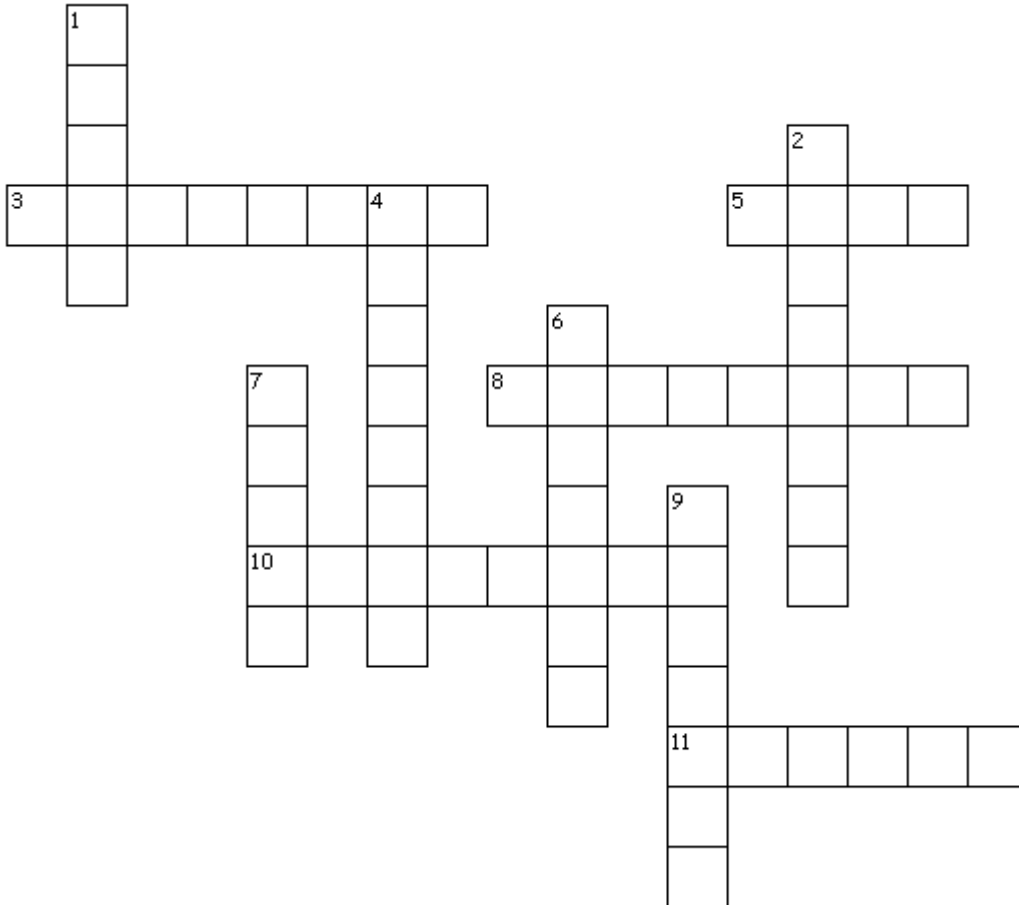
Turtles, Tortoises, and Terrapins



Use the Venn diagram to show the similarities and differences in these reptiles.



Turtle Crossword Puzzle



Across

- 3. bottom of a turtle shell
- 5. group of turtles
- 8. shelled reptile that lives on land and in water
- 10. shelled reptile that lives on land
- 11. shelled reptile that lives in water

Down

- 1. ribcage of turtle that forms protection
- 2. top of a turtle shell
- 4. creature that eats plants and animals
- 6. cold-blooded animal that lays eggs
- 7. plate of a turtle shell
- 9. material that turtle shells and fingernails are made of

Word Bank		
BALE	CARAPACE	KERATIN
OMNIVORE	PLASTRON	REPTILE
SCUTE	SHELL	TERRAPIN
TORTOISE	TURTLE	

Turtle Word Search

E Y N W J J L Q O T I H E F Z
B C A C L B C M G B F S V P N
N C X K B D N N E L I T P E R
N M A J W I T V P O Y K L L J
U I E R V V J J T X E P A T B
Z X T O A B X R A K W O S R U
A B R A M P O S C U T E T U Y
J E A D R T A V C P T G R T C
X E G L O E I C W R D R O U Y
H H U Z E P K M E E W L N T W
Z C T E R R A P I N L J H W X
U T S Z A V H G I E U G E M X
H Y V B P I H F H O I T S U O
L M F O B J P S G O F G D S O
X F O D B K G G G I E R X B F

BALE
OMNIVORE
SCUTE
TORTOISE

CARAPACE
PLASTRON
SHELL
TURTLE

KERATIN
REPTILE
TERRAPIN

Parts of a Turtle Shell

