

# Fossils & Dinosaurs



Everything that we know about dinosaurs today comes from fossils. Fossils are the remains of ancient plants and animals that can be found preserved in rocks. They have the ability to tell us many things about the past. Fossils can tell us about the great variety of life forms that once lived and also give us clues about the history of our planet.

The word fossil actually means, 'dug up,' and comes from the Latin word 'fossils.' Humans have known about these traces of plant/animal life for a very long time.

Back in ancient Greece, scholars found and collected fossils, but unfortunately they weren't quite sure what they were. They generally treated them as freaks of nature, things that couldn't be explained, and use them as ornaments. Many people thought fossils were the bones of giants, and other believed that they had magical powers. In a way this is sort of true because fossils have given us today a much better view of what the world was like before man existed.

Fossils come in all shapes and sizes. They can either be the remains, patterns, or imprints of ancient animals/plants. In most cases, fossils are made up of the hardest parts of an animal/plant that has managed to last long after it died like shells, teeth, bones, and wood. There are also another type of fossils named trace fossils, these tend to be tracks, spoor, nests, eggs, or even animal dung.

A large majority of fossils found in the world are from creatures/plants that lived in rivers, lakes or the ocean. This is because when these animals died they quickly became submerged in sand or mud which preserved them very well.

It is more likely for land animals to be disturbed after they have died by scavengers, weather, and bacteria. In most cases the best preserved land fossils are found in dry conditions like deserts or caves. However, extremely cold conditions are good too because they freeze the animal, preserving it for thousands, sometimes millions, of years.

The best place to find fossils is in a type of rock formation called sedimentary rocks. Sedimentary rocks are formed by layers and layers of sediments forming on top of each other over very long periods of time. Eventually these layers become solid rock like limestone, sandstone, and mudstone. The easiest place to find a fossil is an area where the sedimentary rock has been exposed. This could be a quarry, river bed, beach or bottom of a cliff.

It is believed that dinosaurs first appeared on earth about 230 million years ago. They ruled the land for approximately 165 million years. There were many different types but not all lived through this time. Some would become extinct and others were just evolving.

It is believed that the last of the dinosaurs died out about 65 million years ago; this was long before any humans appeared on earth. The first human species is believed to have

developed about 3 million years ago. This is probably why humans are so fascinated by the dinosaurs – no one has ever actually seen one. If we were to see a dinosaur, we would probably be most amazed by their size and diversity in appearance: scaly bodies with neck frills, spikes and spines, armour plating, bony breasts, elongated necks and clubbed tails, bizarre horns and claws and an astonishing range of hands and feet.