

Evolution

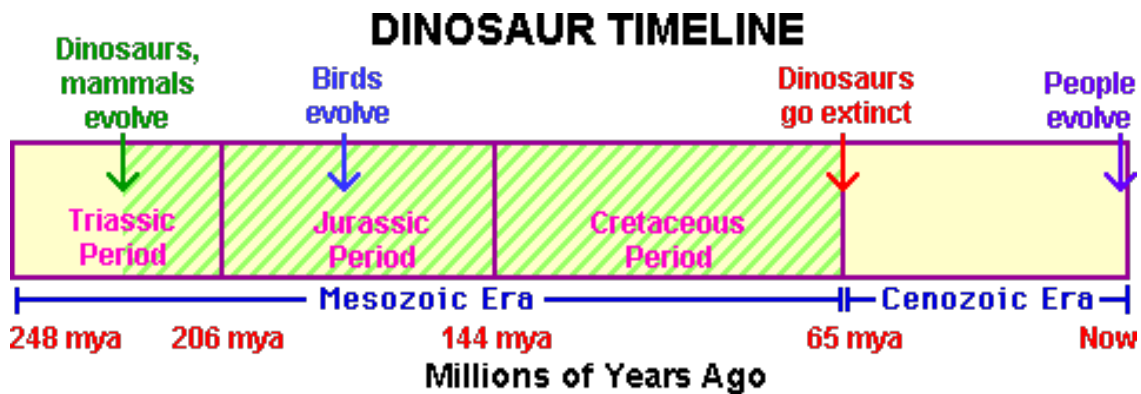
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Evolution is defined as something that develops over time. Most people don't realize it, but you cause evolution by eating, drinking, sleeping and living in general. Here we will discuss some popular topics of evolution.

Dinosaurs

Dinosaurs lived a long time ago. Today we speak of the word dinosaur relating back to birds and crocodiles. Dinosaurs lived shorter lives than humans, therefore their lifetime or evolution only existed for 170 million years.

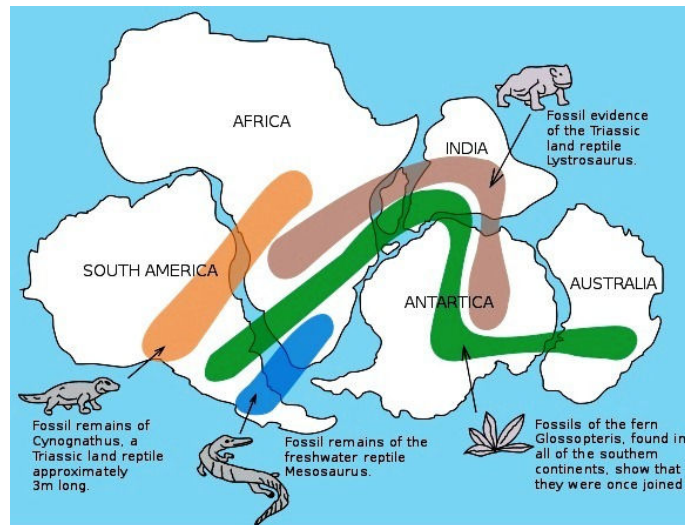
I write this only because humans have outlived the Dinosaurs! Remains of Dinosaurs were found nearly 230 million years ago. They call this period the Late Triassic Period. Argentina withholds many of those fossils like the Rhynchosaurs and many others in the same family. For example, the Cynodonts family.



Next I am writing about how land has evolved over time. But first, let's go over the meaning of some words. Erosion is the process of eroding or being eroded by wind, water, or other natural agents. Coiled is arranged in a joined sequence. Erosion is the process of eroding or destruction by wind, water, or other natural agents.

Land

Now let's get into where land came from. Landforms are created by erosion, which means this process is called fluvial erosion. When water, dirt or dirt move overtime, it brings something called sediment, or other forms of natural debris. The accumulation of the debris creates what we call, land.



The continents weren't always separated. They actually were all one big landmass, called Pangaea. Alfred Wegener came up with the name and proved the single landmass existed.

Fossils of the reptile Mesosaurus are ONLY found in south Africa and South America; therefore bringing the assumption that they had to be connected. Why? Because this reptile can only get up to 3.3 feet long and there is no possible way the creature swam across the entire Atlantic Ocean at that's size.

Another thing that Wegener found is that the east part of South America and west coast of Africa fit perfectly together and even the rock features on land!

The separation of the landmass happened about 200 million years ago. Now, the cause for the separation was just a guess for Wegener because there was not enough technology to tell back then.

Wegener assumed the separation of the landmass was from the rotation of the earth causing the continents to shift further and further apart. This is not true. We now know of these things called tectonic plates. They are constantly moving, causing the continents to shift. They are still shifting today and always will.

Climate

Climate has been a huge part of evolution as well. We have had both cold and warm periods within the last millions of years that have caused many disasters and miracles.

Not to mention all the plants, animals and humans had to adapt to any changes the earth had throughout those times of severe climate change.

In the Quaternary period, which is the past 2.5 million years, humans made their first appearance on earth. This was due to the polar caps decreasing sea level, allowing land to form. The sea level was decreased to 120 - 140 meters lower than today's sea level. But land was formed and humans began.

Even before the Quaternary period, the tectonics plates caused a massive shift bringing enormous river that brought water 100 times the size of the Amazon River. That amount of water is actually still a large current today.

Something that takes part in our climate change is the earth's axis. It has a very slow oscillation from 21.8 degrees to 24.4 degrees in a stable period. Our current angle is 23.45 degrees and is going down. This results in an odd contrast between summers and winters.

Large climate shifts are said to occur the year without summer. Back in 218 B.C., the Roman Era, Hannibal crossed the Alps with elephants. This tells us there was no snow or it was incredibly easier to travel through before now. This dryness spanned from the 9th century to the 12th century as well! Another form of proof of this year without winter, was the breeding of eel from the very warm waters.

This article taught me a lot about the world before and how I should take better care of the earth so this doesn't happen too drastically again! I hope you learned something too.



Hannibal's army and elephants crossing the Alps.

Citation:

- <https://www.nhm.ac.uk/discover/where-did-dinosaurs-come-from.html>
- <https://languages.oup.com/google-dictionary-en/>
- <http://www.eniscuola.net/en/argomento/climate-change/climate-through-the-ages/the-evolution-of-climate/>