EDIACARAN: All life in the Ediacaran was soft-bodied - there were no bones, shells, teeth or other hard parts. The world's first ever burrowing animals evolved in the Ediacaran, though we don't know what they looked like. This period gets its name from the Ediacara Hills in Australia.

CAMBRIAN: The Cambrian is famed for its explosion of abundant and diverse life forms. Some creatures had evolved hard parts such as shells, however there are excellent examples of soft and squishy creatures in the Burgess Shale (formed during this period). In Cambrian times there was no life on land and little or none in freshwater - the sea was still very much the centre of living activity.

ORDAVICIAN: During the Ordovician, a few animals and plants began to explore the margins of the land, but nothing colonised beyond these beachheads. It began with shallow, warm seas but the end of the period experienced a 500,000 year long ice age, triggered by the drift of the supercontinent, Gondwana, to the south polar regions. The Ordovician ended with a mass extinction.

SILURIAN: Reefs made an appearance, and bony fish. Meanwhile, on land, plants became more established, and grew in a zone along the edges of rivers and lakes to give Earth its first riverine and wetland habitats.

DEVONIAN: The Devonian is also known as the Age of Fishes, since several major fish lineages evolved at this time. Sea surface temperatures in the tropics averaged 30 Celsius, much like the warmer parts of the Pacific today.

CARBONIFEROUS: The Carboniferous is famed for having the highest atmospheric oxygen levels the Earth has ever experienced and for the evolution of the first reptiles. Plants grew and died at such a great rate that they eventually became coal. Though the Carboniferous started off warm - hence its lush coal forests - the temperature began to drop and the polar regions were plunged into an ice age that lasted millions of years.

PERMIAN: The Permian started with an ice age and ended with the most devastating mass extinction the Earth has ever experienced. It's also when all the continents of the world finally coalesced into one supercontinent, named Pangaea (meaning 'the entire Earth'). As the globe warmed up and the ice retreated, many areas of Pangaea became very arid. The oxygen level plummeted too.

TRIASSIC: Life on Earth took a while to recover and diversify. The Triassic was characterised by heat, vast deserts and warm seas. Even the polar regions were warm, so lush forests grew there. As a result, the very first mammals and dinosaurs evolved. During this time, the giant supercontinent of Pangaea began to break apart. End with another mass extinction.

JURASIC: The first birds and some of the dinosaurs. Continental break-up during this time gave rise to the sea that would eventually widen to become the Atlantic Ocean. The ocean floor that formed at this time is the oldest surviving on the planet.

CRETACEOUS: The Cretaceous ended with the most famous mass extinction in history - the one that killed the dinosaurs. The Atlantic Ocean grew much wider as North and South America drew apart from Europe and Africa.