Biology Chapter 14 Part 2 Student Notes

Precambrian

- Nearly 90 percent of Earth's entire history, stretching from the formation of Earth to the beginning of the Paleozoic era about 542 million years ago
- Autotrophic prokaryotes enriched the atmosphere with oxygen.

The Paleozoic Era

- The ancestors of most major animal groups diversified in what scientists call the Cambrian explosion.
- Life in the oceans continued to evolve at the end of the Cambrian period.
- Fish, land plants, and insects appeared during the Ordovician and Silurian periods.
- The first tetrapods emerged in the Devonian.
- A mass extinction ended the Paleozoic era at the end of the Permian period.
- Between 60 and 75 percent of the species alive went extinct.

The Mesozoic Era

- Mammals and dinosaurs first appeared late in the Triassic period, and flowering plants evolved from nonflowering plants.
- Birds evolved from a group of predatory dinosaurs in the middle of the Jurassic period.
- About 65 million years ago, a meteorite struck Earth.
- Plate tectonics describes the movement of several large plates that make up the surface of Earth.
- These plates, some of which contain continents, move atop a partially molten layer of rock underneath them.

The Cenozoic Era

- Mammals became the dominant land animals.
- After the mass extinction at the end of the Mesozoic era, mammals of all kinds began to diversify.