

Dear President Bush:

We learned that the average age of oceanic crust is 55 million years and the average age of continental crust is 2.3 billions years old. The name of the first super- continent was Pangaea.

Also, the tectonic plates are anywhere from 50 to 250 miles thick. The continental crust is about 20-80 kilometers thick and is about 3 billion years old.

There are three types of plate movement: divergent plate movement, convergent plate movement, and lateral slipping plate movement. Also, there are four types of plate boundaries: divergent, convergent, transform, and plate boundary zones.

Volcanoes can occur between oceanic and continental plates, between two oceanic plates, or between two continental plates. The location where the sinking of a plate occurs is called a subduction zone. The trenches in the deepest parts of the ocean floor are created by subduction. This is a result of oceanic-continental convergence. Also, volcanic activity occurs as a result of oceanic continental convergence in the Andes and Cascade Range in the Pacific Northwest. This has been named the Ring of Fire.

Oceanic convergence between the Pacific Plate and Philippine Plate has caused the Challenger Deep, which plunges 11,000 meters (8,854 miles) into the Earth's interior. Continental convergence has created the Himalayan Mountain Range, 8,857 meters above sea level.

The zone between two plates sliding horizontally past one another is called a transform-fault boundary. The average rates of plate motion are less than 2.5 centimeters/year. We can send help from Arizona to California when they have their earthquakes, sending medicine, food, clothing, and doctors.

Thank you,

Rey and Juan