

Earth Science 11

Unit 2 – The Geology of Earth

Day 3 – Faults & Hot Spots

Name: _____

Date: _____

Block: _____

Different types of plate boundaries:

Divergent Plate Boundary: _____

a linear feature that exists between two tectonic plates that are moving away from each other. Divergent boundaries within continents initially produce rifts, which eventually become rift valleys. Most active divergent plate boundaries occur between oceanic plates and exist as mid-oceanic ridges

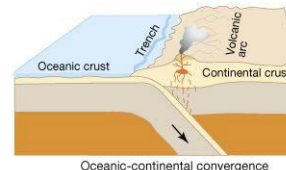
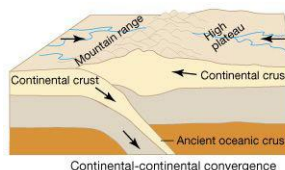
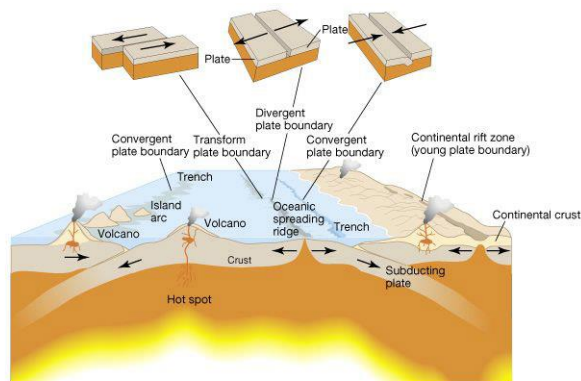
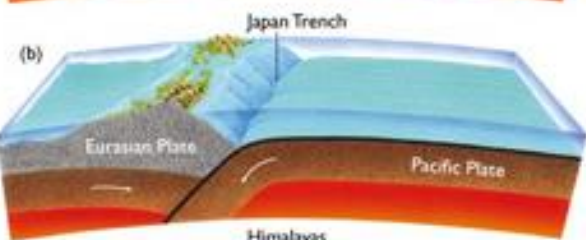
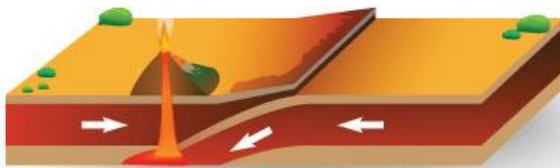
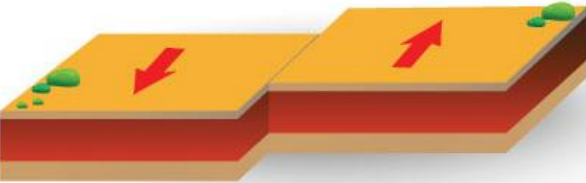
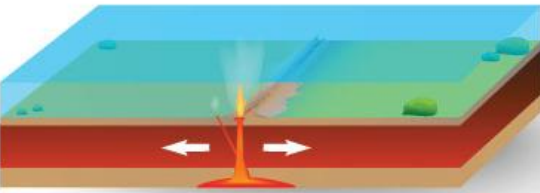
Transform Plate Boundary: _____

a fault along a plate boundary where the motion is predominantly horizontal. It ends abruptly where it connects to another plate boundary

Convergent Plate Boundary: _____

two or more lithospheric plates collide. One plate eventually slides beneath the other, a process known as subduction. The subduction zone can be defined by a plane where many earthquakes occur

lead to volcanism, earthquakes, orogenesis (mountain building)



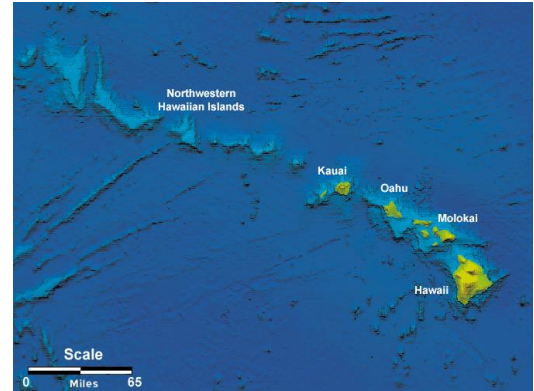
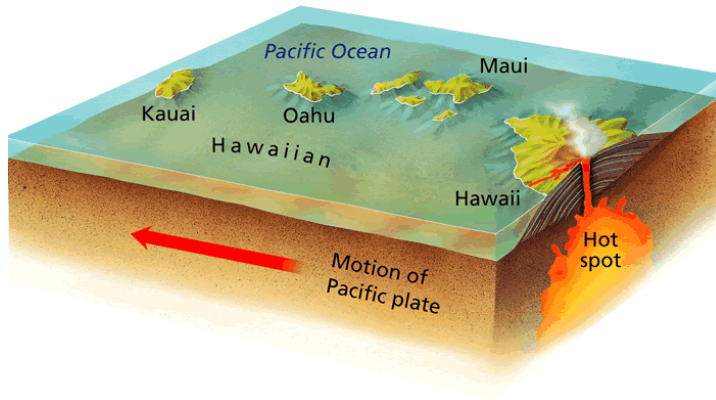
Hot Spot: an area in the mantle from which heat rises as a thermal plume from deep in the Earth

Molten material rises in the center of a plate

Example is Hawaii

Hotspot does not move

Plate moves



The theory of plate tectonics: describes continental movement and gives a possible explanation of why and how continents move

Tectonics is the study of the formation of features in the earth's crust

