Plate Tectonics and Earth’s Surface Study Guide

| 1- What is a divergent boundary? | A divergent boundary is where plates move apart or away from each other. |
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| 2- What are two features of divergent boundaries? | Mid ocean ridges and rift valleys. |
| 3- What is a convergent boundary? | A convergent boundary is when two plates collide and create something new. |
| 4- What is formed at a convergent boundary when two continents collide? | A mountain forms when the two plates collide causing the range to move up and create the mountain. |
| 5- Describe how a volcano can be formed at a convergent boundary. | When two plates collide underwater it turns the hot spot into magma causing the production of volcanoes. |
| 6- What is a transform boundary? | A transform boundary is when two things slide past each other. |
| 7- What happens at a transform boundary? | Earthquakes appear because of the faults. |
| 8- What type of boundary would you find in a rift valley that is growing wider? | A divergent boundary. |
| 9- What does the theory of plate tectonics have that Wegener’s hypothesis of continental drift did not have? | Wegener’s theory was mostly about fossils, underwater, sea floor spreading, and a continental drift. It is just what he didn’t have was talking about land, not that much as subduction as the plate tectonics, different kinds of boundaries, and plate motions over time. It also had more evidence than Wegener’s hypothesis. |
| 10- Why does one plate get subducted? | It is because when they do get subducted they go at different speeds then the rest of the plates. |
| 11- Why do so many volcanoes seem to occur on the coastlines of the Pacific Ocean? | It is because a hot spot or volcanoes could be there which creates land, so the volcanoes could be there to just create land and maybe the plates have come together to create volcanoes. |
| 12- Fill in the blanks: “The theory of plate tectonics predicts that earthquakes and volcanoes should occur at plate boundaries, and that some landforms, such as mountain ranges, should mark the plate boundaries.” | |
| 13- Using google draw, sketch a diagram of a divergent, convergent and transform boundary. (Someone should be able to recognize each boundary based on the picture). | |

