

#16: Plate Tectonics III (455-464)

name: _____

1. What does the theory of plate tectonics state?
2. Look at the map on page 455. What is the name for the crustal plate (lithospheric plate) that you are on?
3. The arrows tell which way each plate is moving. What's happening along the boundary between the N. American Plate and the African Plate? Circle one:

Plates are moving apart. Plates are moving together. Plates are sliding past each other.
4. What is happening where the Nazca Plate meets the South American Plate?
5. According to the map how much farther does the USA get from Africa each year?
6. Which crustal plate is the biggest?
7. What is the name for the small crustal plate just off the coast of the Washington?
8. Find two places on the map where the seafloor spreading is taking place, and list the plates that are moving apart at these two places.
9. According to page 456, what is happening to the plates at a divergent boundary?
10. Where are most diverging boundaries found?
11. What is happening to a continent where there is a rift valley?

12. According to page 457, what is happening to the plates at a convergent boundary?
13. Which two of the diagrams on page 457 show “zones of subduction”?
14. What happens to one of the plates at a zone of subduction?
15. Go back to the map on page 455. What does the red spiked line symbolize, and which ocean is most surrounded by this type of zone?
16. List two states in the USA that are near a zone of subduction?
17. What do scientists call the boundary between two plates that are sliding past each other? (p. 459)
18. Go back to the map on page 443. What type of plate boundary is the San Andreas Fault?
19. Read pages 460-463. What is the unanswered question about plate tectonics?
20. Explain what the photos on bottom of page 460 have to do with one theory about the cause of crustal plate movement.
21. Explain the process of “ridge push”.
22. Explain how “slab pull” may contribute to the movement of the plates.