**Plate Tectonics**

1. What is “Pangea”?

* *Means “all lands”, when the world was 1 super-continent*

1. What are the 4 pieces of evidence Alfred Wegner found for Continental drift?

* *Continents share common coastlines*
* *Fossil remains that exist in 2 continents, and are not able to swim across oceans.*
* *Mountain ranges that match.*
* *Glacier Deposits of ice and coal match.*

1. What is a “Magnetic Reversal”? What does this mean for the theory of Plate tectonics?
   1. Magnetic field reverses (north and south reverse)
   2. Proves Sea floor spreading – magma is rising to create new sea floor and is moving (spreading apart)

**PANGEA TO PRESENT**

1. The Lithosphere “floats and slides” on the Asthenosphere. The Lithosphere is also called the Earth’s \_\_\_\_\_\_\_\_\_\_\_\_. (CRUST) The Lithosphere is broken up into the earth’s plates, and they move.
2. Some of the Major plates are
   1. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ (Eurasian plate)
   2. African Plate
   3. Indian-Australian plate
   4. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_( North American Plate)
   5. South American Plate
   6. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_(Antarctic Plate)
   7. Pacific Plate
3. The Atlantic Ocean is getting bigger and the Pacific getting smaller. By how much per year? \_\_\_\_\_\_\_\_\_\_\_ (approx.. 1 cm) (as fast as your fingernails grow)

**FORCES WITHIN**

1. 3 major types of Plate Boundaries:
2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_(Divergent): When plates divide and pull apart, forming new crust
3. Convergent: crust is destroyed and one dives under the other to become magma. (called subduction)
4. Transform: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ (plates slide past each other)
5. Earthquakes are localized along the plate \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ (boundaries). Fault lines are crakes in the crust from the tension of the plate boundary, and earthquakes are when the fault slips.
6. When does a Tsunami occur? (when the epicentre of the earthquake is underwater, creates a giant wave)
7. What is the ring of fire? (the volcanoes around the pacific ocean plate, convergent plate boundary and form violent volcanoes)

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What does this have to do with the Geography of Canada? How can you use this information to explain the rocky mountains or the Canadian Shield? What does this mean for where we live?

Extra Info:

In the last ice age, 10 000 years ago, glaciers covered North America. When the glaciers retreated (melting in warmer weather), they smoothed solid rock, left jagged peaks, left morrains (rocky rumble), and left fresh water lakes all over Canada.