

Forces of Nature: Earthquake Webquest

Answer the following questions using the website:

<http://http://environment.nationalgeographic.com/environment/natural-disasters/forces-of-nature/>

Choose the Earthquake section: Be sure to answer the questions in your own words. Work through the interactive site by click on the tabs (1-7) at the top. Be sure to use the scroll button to see all text.

What's An Earthquake:

1. What happens within the Earth to cause an earthquake?
2. How many earthquakes occur each day around the globe?
3. Approximately, how many earthquakes occur each year?
4. When and where did the world's most deadly earthquake occur? How many people perished?

Where do Earthquakes Occur?

5. Where are most faults located? What happens at faults?
6. What is an intraplate quake? Give an example.
7. Where do 80% of most earthquakes occur?
8. What parts of the United States are located within the quake belt?

What causes Earthquakes?

9. Explain what causes an earthquake.

10. Where is the San Andreas fault located? Explain what happens here.

Types of Faults

11. List and describe four faults that occur.

Measurement and Recording

12. What is the hypocenter of an earthquake? How does this compare the epicenter of an earthquake?

13. Describe a “P” wave.

14. Explain why a seismograph would be used by a scientist.

15. What is the Richter Scale?

Locate an Earthquake

16. Follow the instructions to trigger an earthquake. Where is the epicenter of your earthquake?

Lab: Trigger an Earthquake

Follow the instructions to trigger an earthquake. Set the perimeters first to bedrock groundtype with a low magnitude, then high magnitude. Next set the perimeters to a fault zone groundtype with a low magnitude, then high magnitude. Lastly set the perimeters to a landfill groundtype with a low magnitude, then high magnitude. Compare the six earthquakes, explain what you viewed and why one groundtype was worse or better than another type.