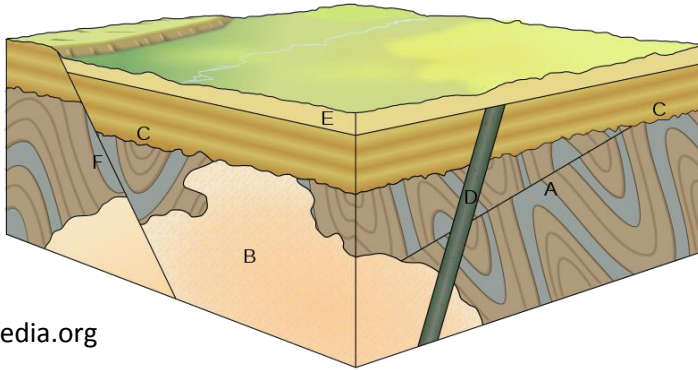


## Chapter 18 Section 2 Guided Reading

1. Geology is
  - a. the study of living organisms
  - b. the study of the solid matter that constitutes Earth
  - c. the study of the composition, structure, and properties of matter
  
2. Put the following events in order to show how a fossil might be formed:
  - a) Organism covered with sediment, soft body parts start to decay
  - b) Sediment wears away, exposing hard parts of the organism
  - c) Sediment is deposited and covers the organism
  - d) The environment changes, sediment around the organism becomes hardened
  
3. \_\_\_\_\_ is the process of putting events in the order in which they happened.
  
4. Describe a situation that resembles relative dating.
  
5. How would you know the *relative* age of a fossil?
  
6. A paleontologist is
  - a. A scientist who studies cells.
  - b. A scientist who studies minerals.
  - c. A scientist who studies fossils.
  
7. Scientist \_\_\_\_\_ stated that, "The present is the key to the past." In other words, geologic processes we see happening today probably occurred throughout geologic time.
  
8. Scientist \_\_\_\_\_ identified the "law of superposition," which is the idea that the bottom layer of a rock formation is the oldest layer.
  
9. What second law did Steno identify? Define this law.
  
10. This law states that layers of sediment extend in all directions horizontally and might be eroded or split in some manner as time progresses.
  - a. The law of lateral continuity
  - b. The law of original horizontality
  - c. The law of superposition

11. In the picture below, put these features in order: A, C, and D.



12. Question 11 refers to the principle of \_\_\_\_\_.

13. What is the principle of fossil succession?

14. How did fossils help scientists understand how Earth's surface changed over time?

15. Name and describe the four fossils that provided evidence of the changing Earth.