

Epic of Evolution: Bio/EPSc/Phys 210A
Questions, Week 8 (Mar 20 - Mar 24)
"Earth Materials"
Prof. Michael Wysession

1. What determines if the atomic bonds within minerals are stable?
2. What happens to a mineral as it is subjected to changes in temperature and pressure?
3. Why does the lower mantle present resistance to the subduction of oceanic lithosphere?
4. How do igneous, sedimentary and metamorphic rocks participate in the rock cycle?
5. Why are the cores of many mountains made of granite?
6. How did a light element like sulfur or oxygen end up in the core with iron?
7. How are mantle plumes involved with geomagnetic reversals?
8. Why can the surface plates move easily over the asthenosphere?
9. How are rare metals and ores concentrated at subduction zones?
10. Why are oil and natural gas primarily found in a limited number of regions of the world?