Terms and Essays

Chapters 7-13

Metamorphism Terms
- Regional Metamorphism
- Contact Metamorphism
- Isochemical
- Metasomatism
- Hydrostatic
- Foliation
- Lineation
- Terrane
- Quartzite
- Phyllite
- Slate
- Schist
- Gneiss
- Marble
- Eclogite
- Granulite
- Migmatite

Deformation Terms
- Stress
- Strain
- Compression stress
- Tension stress
- Shear stress
- Elastic strain
- Plastic strain
- Ductile strain
- Brittle strain
- Anticline
- Syncline
- Monocline
- Strike
- Dip
- Joint
- Fault
- Dip-slip fault
- Strike-slip fault
- Oblique-slip fault
- Normal fault
- Reverse fault
- Thrust fault
- Left-lateral
- Right-lateral

Geologic Time Terms
- Hadean
- Archean
- Proterozoic
- Phanerozoic
- Paleozoic
- Mesozoic
- Cenozoic (Tertiary)
- Cambrian
- Unconformity
- Angular unconformity
- Half-life
- Alpha particle
- Beta particle
- Gamma ray
- Neutron

Early Earth Terms
- Chondrule
- Chondrite
- Hadean
- Big Bang
- Nucleosynthesis
- Fusion
- Supernova

Continental Crust Terms
- Orogeny
- Epeirogeny
- Terrane
- Accreted Terrane
- Mantle Plume
- Hot Spot Volcanism
- Wilson Cycle
- Basin
- Dome
- Accretion
- Craton
- Shield
### Biogeochemical Terms
- Stromatolites
- Bacteria
- Archaea
- Eukaryota
- Phosphorus Cycle
- Sulfur Cycle
- Carbon Cycle
- Nitrogen Cycle

### Volcanic Terms
- Ultramafic
- Mafic
- Intermediate
- Silicic
- Basalt
- Andesite
- Magma
- Lava
- Aa
- Pahoehoe
- Pillow Lava
- Shield
- Composite Cone
- Cinder Cone
- Caldera
- Pyroclastic
- Nuée Ardente
- Air Fall
- Ash Flow
- Tuff
- Obsidian
- Vitrophyre
- Pumice
- Resurgent dome
- Hot Spring
- Geyser
- Rhyolite

### Famous Volcanoes
- Basalts
  - Dotsero, CO
  - Kilauea
  - Mauna Loa
  - Haleakala
  - Hekla
- Andesites
  - Fuji
  - St. Helens
  - Ranier
  - Shasta
  - Stromboli
  - Vesuvius
  - Popocatepetl
  - Orizaba
  - Pelée
- Rhyolites
  - Yellowstone
  - Valles/Jemez
  - Long Valley
  - Crater Lake
  - Pinatubo
  - Krakatao
  - Santorini
  - Campi Phlegri
  - (Naples)

### Earthquake Terms
- Earthquake
- Seismic Wave
- Focus
- Epicenter
- Body wave
  - P-wave
  - S-wave
- Surface wave
  - Rayleigh wave
  - Love wave
- Seismometer
- Seismograph
- Richter Magnitude
- Moment magnitude
- Subduction Zone
- Tsunami
- Silent Earthquake

### Sample Essays
- At what depths and geologic settings do most earthquakes occur?
- At what types of plate boundaries do the different types of volcanoes occur?
- What forms the basis for the absolute geologic time scale in years?
- What types of faults form under geologic compression, tension, and shear?