

**“Generalized Bedrock Geology of New York State” pg. 3**

- What are the coordinates of the following locations in New York State?
  - ▶ Binghamton: \_\_\_\_\_
  - ▶ Syracuse: \_\_\_\_\_
  - ▶ Slide Mountain: \_\_\_\_\_
  - ▶ Albany: \_\_\_\_\_
  - ▶ Plattsburgh: \_\_\_\_\_
  - ▶ Massena: \_\_\_\_\_
- When viewed from Oswego, how high will Polaris appear in the sky? \_\_\_\_\_
- Will the North Star be higher in the sky when viewed from Riverhead or Old Forge? Explain.  
\_\_\_\_\_
- In which location would Polaris appear at an approximate altitude of 42 degrees?  
\_\_\_\_\_
- At approximately what latitude do New York, Massachusetts, and Connecticut meet? \_\_\_\_\_

**“Surface Ocean Currents” pg. 4**

- What are the coordinates of the **capital “A’s”** of the following continents as shown on the map?
  - ▶ Arctic Ocean: \_\_\_\_\_
  - ▶ South America: \_\_\_\_\_
  - ▶ Australia: \_\_\_\_\_
  - ▶ North America: \_\_\_\_\_
  - ▶ Africa: \_\_\_\_\_
  - ▶ Asia: \_\_\_\_\_
- If your ship is caught in the Antarctic Circumpolar current ocean current, and you observe the sun to be at it's highest point in the sky at the same moment as you chronometer reads 4:00am, the time at the Prime Meridian, what is your longitude?  
\_\_\_\_\_
- Approximately how many degrees of longitude wide is Africa? \_\_\_\_\_
- Between what latitudes is the Antarctic Circumpolar Current found? \_\_\_\_\_
- Between what latitudes is the Gulf Stream found? \_\_\_\_\_
- How will the altitude of the North Star change as you travel north from the “A” in Africa (on the right side of the page) to the “E” in Europe?  
\_\_\_\_\_

**“Tectonic Plates” pg. 5**

- What are the coordinates of the following features shown on the map above?
  - ▶ Hawaii Hot Spot: \_\_\_\_\_
  - ▶ Galapagos Hot Spot: \_\_\_\_\_
  - ▶ Sandwich Plate: \_\_\_\_\_
  - ▶ Mariana Trench: \_\_\_\_\_
  - ▶ Canary Islands Hot Spot: \_\_\_\_\_
  - ▶ San Andreas Fault: \_\_\_\_\_
- What would the altitude of Polaris be as viewed from the Iceland Hot Spot? \_\_\_\_\_
- What feature will you pass over as you travel south from 60°N 180°W to 40°N 160°W? \_\_\_\_\_
- The East African Rift extends north and south between what latitudes? \_\_\_\_\_
- From which hot spot would you view Polaris at an altitude of 45 degrees? \_\_\_\_\_
- Which three tectonic plates are found along the Prime Meridian? \_\_\_\_\_