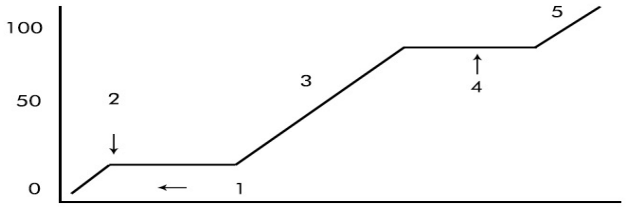
Name: _____ Date: _____

Phase Change Key



1) When a given quantity of water is heated at a constant rate, the phase change from liquid to gas takes longer than the phase change from solid to liquid because
   a. The heat of vaporization is greater than the heat of fusion
2) What is the melting point of this substance? 0 °C
3) What is happening to the average kinetic energy of the molecules in the sample during section 2? remains constant
4) At what temperature would this sample finish boiling? 100 °C
5) When this substance is melting, the temperature of the ice-water mixture remains constant because:
   d. Heat energy is being converted to kinetic energy
6) The temperature at which a substance in the liquid state freezes is the same as the temperature at which the substance
   a. Melts
7) As a substance goes through section (2), what happens to the distance between the particles? increases
8) What is the name of the process happening during section (4)? boiling (vaporization)
9) Is this curve showing an endothermic or an exothermic process?
10) 34°C is equal to 307 K.