

Science 8 Research Questions
Unit 1 Topic 5 Page 50 –58

Name:

Date:

1.) Define the following terms:

a.) density:

b.) mass:

c.) Volume:

d.) weight:

e.) Force:

f.) gravity:

2.) What factor determines how many particles can fit into a given space? 1 mark

3.) Both water vapour and liquid water have the same sized particles. Why then is water vapour said to be less dense than liquid water? 1 mark

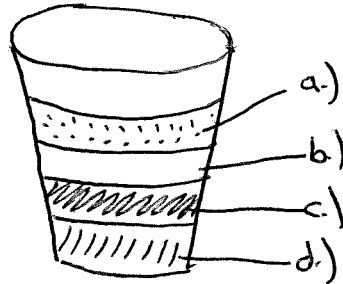
4.) Why is running through air easier than running through water? 1 mark (use the particle theory to explain your answer)

5.) What happens to a substance's density as it is heated? Use the particle model to explain why this happens. 2 marks page 52

6.) How is the density of ice different from liquid water when compared to most pure substances? Pg. 52 1 mark

7.) Look at the chart on page 52 table 1.5. Which metal or metals will sink in mercury? 1 mark

8.) Four substances were added to a glass: water, glycerol, ethyl alcohol and machine oil. They all separated by density. Label the liquids in the diagram.



9.) How is mass and weight different? 2 marks

10.) How much does a 1 kg. object weigh? How much does a 5 kg. object weigh? (Show work) 2 mark

11.) What is the formula to solve for an object's density? 1 mark page 57

12.) Density of solids is measured in what units? 1 mark

13.) Density of liquid is solved in what unit? 1 mark

14.) Show all work. What shiny solid has a mass of 356g and a volume of 40ml Refer to page 52 table 1.5?