Sci 8 Density Mystery Lab Activity 7-7 Name:

Partner:

Period:

Purpose: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Materials:

Procedure: Refer to page 267 in your text book

Observations:

Part A: Data Table

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Material | Mass of empty Beaker (g) | Mass of Beaker + Material | Mass of Material (g) | Volume  (ml or g) | Density = Mass/volume  (g/ml or g/cm3) |
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Part B: Draw

Examine the densities of the liquid materials in your data table. Predict how the liquid would layer based on your density calculations. Draw a labelled diagram of your prediction. Then pour a small amount of each liquid into a 50 ml beaker. Carefully tilt the beaker and pour slowly down the side. Are any layers mixing? Draw a labeled diagram of the actual layers in the space below.

Predicted layers Actual Layers

1. Did your predicted layers match the actual layers? Even if they did, suggest a reason why they might not.
2. How would the layers be affected if you poured double the amount of .....

Part C: Bar Graph

Using the graph paper provided, draw a bar graph comparing the densities of ALL substances measured. Refer to pages 486-487 for instructions on how to construct a bar graph. Your graph must:

* take up at least half the page,
* have a title,
* have x and y axis labelled (including units).