Lesson 4: Do Gases Have Density?

Science Focus Question

How does the density of a gas compare to the density of liquids and solids?

Class Demonstrations

Record your predictions and observations from the class demonstrations in the tables below.

Funnels

	Funnel 1	**Funnel 2 (with stopper)**
Prediction		
Observations		
Drawing		

Syringe

Observations	**Explanation**

What do these 2 demonstrations tell you about air? _____

_____

_____

_____

_____

Inquiry 4.1: Finding the Density of Air

Procedure

Create a procedure your group will use to find the density of air.

Results

Design a table to record all the **measurements** and **calculations** you make during this investigation.

Table 1: Calculating the Density of Air

Table 2: Class Results for the Density of Air

Class Period	1	2	3	4	5	6	7	8	Average
3									
4/6									
						All Class Average			

Laboratory Questions

1. Why do you think the class results vary? _____

   _____

   _____

   _____

   _____

2. Why do some things float in air? _____

   _____

   _____

   _____

Reading: Deadly Density

1) Why was chlorine gas an effective tool to harm soldiers in trenches? _____

_____

_____

_____

2) Would helium be an effective gas to use to harm soldiers in trenches? Explain why or why not. _____

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_____

Reading: Air Heads

1) Air is a mixture of gases. What gas is important for us to breath? About what portion of air does this gas make up? _____

_____

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_____

2) What gas makes up most of the mixture of gases in our air? _____

_____

_____

_____

3) Why do plants need carbon dioxide? _____

_____

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