

## Slime Scientific Method Lab!

Have you ever seen slime at a toy store? Slime is usually green and gross looking, but it is actually made by linking monomers together to form a polymer (so slime is a polymer!) Today we are going to see who can make slime that stretches the longest. We will see how adding different amounts of a soap called “Borax” will change how long the slime can stretch. How long do you think you can make the slime stretch?

Below you will find a list of materials that will be provided to you. You are to use the scientific method to conduct the above experiment and to fill out each section below.

When writing out the procedure you are to write a detailed step-by-step process. (Keep in mind you will only be carrying out the steps you write). Upon completion of writing out your procedure, you must receive a stamp of approval from your teacher before conducting your experiment.

### PRE LAB QUESTIONS

- 1) Identify the independent variable.
  
  
  
  
  
  
  
  
  
  
- 2) Identify the dependent variable.
  
  
  
  
  
  
  
  
  
  
- 3) Identify at least 3 variables you think will be important to keep constant (**constant means “the same”**)

### MATERIALS

- Borax Soap
- Water
- Glue
- Food coloring
- Cups
- Spoons
- Stirring rods

**PROCEDURE: PUT THE FOLLOWING STEPS IN THE RIGHT ORDER**

- · Take the slime out and pull it next to a ruler until it breaks
- · Record how long slime from cup #1 stretches.
- · Add 1 spoon of glue to cups 1, 2 & 3
- · Label 3 cups "cup #1", "cup #2", "cup #3"
- · Add 25 drops of borax solution to cup #1 and stir the solution while you add the drops
- · Add 1 drop of food coloring to the glue/water
- · Repeat steps 5-7 with cup #2 (35 drops of borax) and cup #3 (45 drops of borax)
- · Stir the glue and water together with a wooden stirrer
- · Add 1 spoon of water to cups 1, 2 & 3

1) \_\_\_\_\_

2) \_\_\_\_\_

3) \_\_\_\_\_

4) \_\_\_\_\_

5) \_\_\_\_\_

6) \_\_\_\_\_

7) \_\_\_\_\_

8) \_\_\_\_\_

9) \_\_\_\_\_

**DATA** Properly label the data table and chart below and display the data.

	Trial 1 How long? (cm)		Trial 2 How long? (cm)		Average
25 drops of borax					
35 drops of borax					
45 drops of borax					

**GRAPH** ( the independent variable goes on the “x axis”. The dependent variable goes on the “y-axis”)

**CONCLUSION** You must include RERUN: \* **R**epet the purpose briefly \* **E**xplain what you did \* **R**esults (what did your data say) \* **U**ncertainties (state anything that went wrong in your lab) \* **N**ew (state 2 new things you learned). ***This section should be a paragraph at least 4 sentences long.***

---



---



---



---



---



---



---