In this activity, you will use pH paper or universal indicator to determine whether common liquids are acidic, basic, or neutral.

Safety







- Follow your teacher's recommendations for which fluids to bring to class and how to transport them safely.
- Never taste or eat anything in the science room.
- Wash your hands and equipment thoroughly after completing this activity.

Materials

- a variety of common liquids that you bring in from home or that are provided by your teacher, such as shampoo, detergent, juice, tonic water, bottled water
- spot plate
- pH paper or universal indicator
- indicator colour chart provided by your teacher

What to Do

- Read this entire activity. Then, create a data table with several columns to record your results. Give your table a title.
- Predict whether each of the test liquids is acidic, basic, or neutral.

- **3.** Place a small amount of each liquid in a well of the spot plate, keeping track of where each is placed. Take care not to mix any of the substances.
- Place a few drops of acid-base indicator or a piece of pH paper in each spot plate well that contains a test liquid
- **5.** Use the indicator colour chart to determine the pH of each liquid.
- 6. Create a pH number scale to display your results. Draw a horizontal line across a piece of paper. On the middle of the line, write 7 (neutral). On the left end, write a 0. On the right end, write a 14. Enter the name and pH of each liquid in the appropriate position on your number scale.
- Clean up and put away the equipment you have used. Follow your teacher's instructions for disposal of wastes.

What Did You Find Out?

- 1. (a) Which liquids were acidic?
 - (b) How do you know?
- 2. (a) Which liquids were basic?
 - (b) How do you know?
- 3. (a) Which liquids were neutral?
 - (b) How do you know?

1. Predictions of pH for various Chemicals:

Chemical (Product) Name	Your Prediction of pH	Color of pH paper	Actual pH

Chemical (Product) Name	Your Prediction of pH	Color of pH paper	Actual pH

2. Answer to #6: