

# Yeast Beast



15 minutes

## What You Will Do

Display how the presence of sugar affects the activity of yeast.

## Get it Together

- ◆ 3 balloons
- ◆ 3 small, narrow-necked bottles
- ◆ Sugar
- ◆ Package of dry yeast
- ◆ Measuring cup
- ◆ Pen
- ◆ Spoon
- ◆ Water

## Procedure

1. Gently stretch each balloon so it will inflate easily.
2. Label the bottles A, B, and C.
3. Place a  $\frac{1}{2}$  cup of water in each bottle.
4. Put a spoonful of dry yeast in bottle A; a spoonful of sugar in Bottle B; and a spoonful of sugar and yeast in Bottle C.
5. Immediately place a balloon over the openings of the bottles. Make sure the balloons fit tightly around the necks of the bottles.
6. Gently shake the bottles for a few moments.

## A Closer Look

The balloon started to inflate in Bottle C because the yeast reacted with the sugar to produce carbon dioxide gas. Nothing happened to the balloons in Bottle A or B because the sugar was separate from the yeast. Yeast cells need the sugar as a food supply. Yeast is used as an important ingredient in the baking of bread, cookies, and cakes because it makes them rise.



## Clean Up

Rinse the bottles in running tap water. Catch the yeast particles in the drain trap and dump them in the trash.