**Grow Your Own Yeast:**

**Materials:**

4 plastic Sandwich Baggies

Yeast

Measuring Spoons

Salt

Sugar

Water

Sharpie

**Directions:**

1. Label the 4 baggies as follows:

Sugar + warm water

Sugar + cold water

Sugar + salt + warm water

No sugar + warm water

2. Add 2 tsp. of yeast to each plastic bag. Add 2 tsp. of sugar to each of the bags that say sugar and 1 tsp. of salt to the bag that says salt.

3. Carefully, add ½ cup water to each baggie. The warm water should be warm, but not too hot, or it will kill the yeast. The cold water can be room temperature.

4. Seal the bags, squeezing out as much of the extra air as possible and let them sit. (The yeast will grow faster in a warm room than a cold one.)

5. Watch the bags to see what happens. You will know your yeast cells are growing if the baggie containing them puffs up!

 **\**Keep an eye on your experiment*. *If a bag gets so puffy that it looks like it might explode, be sure to open it to let the pressure out!***

6.Analyze your results! Take pictures and write down your results in your journal.

Which ingredients help yeast grow best? Did you find an ingredient that kept the yeast cells from growing well? Do yeast cells grow better in warm or cold water? What is making the bags puff up and how does this tell you that the yeast is growing? (Hint: The answer is a gas given off when yeast converts sugar and starch. What is this gas?)

***Louis Pasteur/grow your own yeast***

<https://kitchenpantryscientist.com/pyramids-pasteur-and-plastic-baggies-what-makes-yeast-grow/>