**Week 24: How do you make the perfect cookie?**

**Control** – increases the reliability of the results, often through a comparison between control measurements and the other measurements.

**Independent Variable** – controlled alteration in an experiment which changes the possible results of the expectation from the control.

This is our **control** recipe which makes 4-5 cookies:

<table>
<thead>
<tr>
<th>2 Tbs</th>
<th>Butter (or margarine)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1.5 Tbs</td>
<td>Sugar</td>
</tr>
<tr>
<td>1.5 Tbs</td>
<td>Brown Sugar</td>
</tr>
<tr>
<td>½ tsp</td>
<td>Vanilla</td>
</tr>
<tr>
<td>1 Tbs</td>
<td>Egg whisked (or egg substitute)</td>
</tr>
<tr>
<td>1/8 tsp</td>
<td>Baking Soda</td>
</tr>
<tr>
<td>1/8 tsp</td>
<td>Salt</td>
</tr>
<tr>
<td>¼ cup +2 Tbs</td>
<td>Flour (All-Purpose)</td>
</tr>
<tr>
<td>¼ cup</td>
<td>Chocolate Chips</td>
</tr>
</tbody>
</table>

**Control Cookie:**
50/50 Sugar with baking soda
This cookie is our control and follows the recipe without any adjustments.

**Independent Variable Cookies:**
50/50 Sugar without baking soda
This cookie has one variable of NO baking soda.

White Sugar with baking soda
This cookie has one variable of 3Tbs white sugar with no brown sugar.

Brown Sugar with baking soda
This cookie has one variable of 3Tbs brown sugar with no white sugar.

**Instructions**
- Melt butter in microwave for about 10-15 seconds.
- Stir sugar into melted butter.
- Stir vanilla and egg into sugar/butter mixture and set aside as your wet mixture.
- Mix flour, baking soda, and salt together to make a dry mixture.
- Combine the dry mixture and the wet mixture together with a fork until just combined.
- Mix in chocolate chips after everything else is combined.
- Bake at 350 for 10-12 minutes.
  
  *NOTE: Cookies should look a little underdone when they come out of the oven. They will finish baking with residual heat as they cool.*
- Once they come out of the oven slide them gently onto a cooling rack or cutting board.
- Most important instruction is to have fun and enjoy experimenting with family and friends.