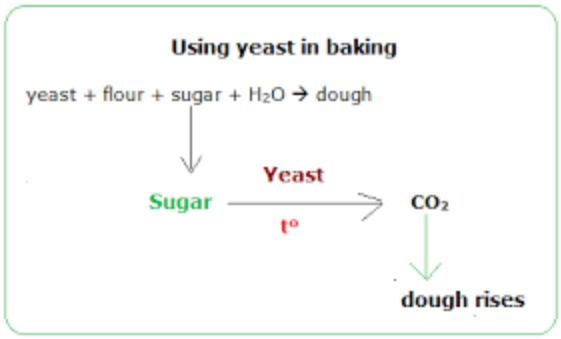
- **Topic:** Chemical Changes during bread making.

- **Bread Making:** The bread making process is the result of chemical bonding and structure formation through the basic ingredients. The process of bread making involves mixing, kneading, fermentation, prepping and baking. These are the three main steps. The essential ingredients for bread are: ***flour, water and yeast.*** The non-essential ingredients added for enhanced flavor, aroma, strength and added flavor. It includes; ***fat, eggs, fruit, salt, sugar, nuts etc.***

- **Steps involved:**

1. **Mixing:**
   The raw ingredients such as flour, water, sugar, yeast and egg is being added up. The ***yeast*** is first activated by adding it up in luke warm water. The flour, sugar and salt are sifted, water and yeast mixture is added. The egg is added for the enhanced binding affect. *The* ***gluten*** is the main constituent of bread, a protein comprising 10-15 minutes. The gluten protein provides proofing affect, sponginess and structure. It is formed as water is added the large amino acid molecules ***glutenins and gliadins,*** forming gluten.

2. **Kneading:**
   All of the ingredients are kneaded together to form a dough. The dough goes through 3 stages. The ***Pick-up Stage:*** The dough is getting mixed up, requiring force. ***Drying up stage:*** The mixture becomes homogenous as the dough continues to be kneaded. At first, the dough seems to be over hydrated but as the gluten network is formed, it starts to dry up. ***Clean up Stage:*** At this stage the dough seems to be sticky at first but then it starts to pull away from the bowl.
   The dough is ready then.



   Yeast Activity: As the yeast is added in flour, it starts acting upon flours sugar. It breaks down starch into maltose by amylase and maltose into glucose with the help of maltase. The glucose produced is used as source of food by yeasts, producing