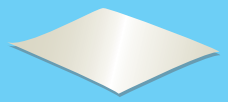
How to make bubble gum

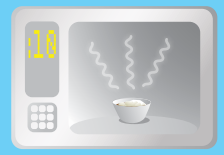


1. Unfold the wax paper. Place it on a smooth clean surface.

2. Pour 1/2 of the powdered sugar on top of the wax paper and make a well in the top of the pile.

3. Empty the gum pellet packet into the mixing container.

4. Add the gum flavor and the corn syrup onto the gum pellets.

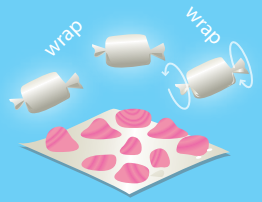


5. Microwave mixture on **HI** for 5-10 sec. intervals until melted. Stir between each interval. **Careful it's HOT!**

6. **Careful it's HOT!** Pour the hot melted mixture into the well of the powdered sugar mound.

7. Mix with the included tool until it is cool enough to knead by hand. **NOTE* You may want to add food coloring.**

8. Add remaining powdered sugar as needed. Knead until the mixture is smooth and will not absorb more sugar.



9. Enjoy your gum any time, any way you like! Wrap extra pieces in wax paper for later!

Kit Contains

Bubble Gum Base (packet containing pellets)
Corn Syrup (packet containingclear syrup)
Powdered Sugar (packet containing white powder)
Waxed Paper
Mixing Tool
Bubble Gum Flavor (the smallest packet)
Mixing Container

Extras

Microwave
Food Coloring (optional)

Total Time: 30 minutes
Wash your hands before you begin.
Keep your work area clean.

Do it yourself
BUBBLE GUM
WORKSHOP

* If you want, experiment to make your own cool bubble gum flavors.
Here's how: at Step 4 don't use the gum flavor packet. Substitute 1-2 teaspoons of any liquid extract you choose.
Or, use a spice, such as cinnamon or cloves for your gum.

Gum History

9,000 BC
Neolithic people in Finland chewed birch bark tar that had antiseptic properties.

29 AD
Ancient Greeks chewed Mastiche, the resin of the Mastic Tree.

1200
Aztecs chewed Chicle, sap of the Sapodilla tree.

1400
Native American Indians chewed sap of spruce tree.

1848
State of Maine Pure Spruce Gum was developed and sold by John B. Curtis.

1869
First patent on chewing gum.

1888
Chewing gum sells in NYC subway vending machines.

1898
American Chicle Company founded.

1948
Sugarless Gum invented.

2007
600,000 metric tons of bubble are produced every year.

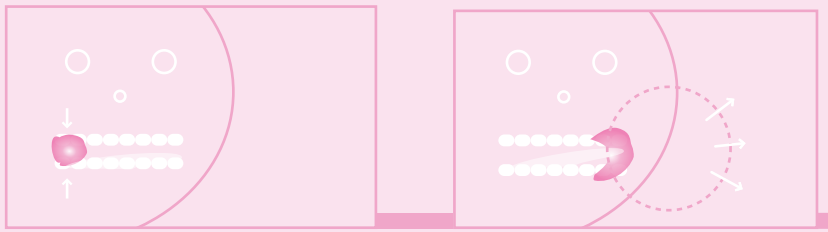
Today
Nutraceutical and biodegradable gums are in development.

Bubble Physics

Bubbles are governed by the function of tension and pressure. In other words, the tensile strength and the elasticity of the gum's surface must be strong enough to withstand the growing internal pressure. If it cannot, the bubble POPS!

A bubble's wall thickness determines the shape of the bubble. The bubble will expand in the direction of the thinnest part of the wall. This will result in irregular shapes and double bubbles.

How to blow a bubble



1. Chew gum until soft.
2. With your tonge, press and flatten gum into a circle behind your teeth.
3. Gently push tongue into the gum creating a small pocket.
4. Move tongue out of gum. Gently place between your lips and blow it up.

WHY IS BUBBLE GUM SO STRETCHY?

Visco- elasticity, that's why! The molecular structure of gum is made up of big and long molecules that get all tangled up together. As you chew the gum, your saliva gets in between the molecules, so they slip by each other easily. That's how the visco-elasticity of the gum increases, making your bubble gum stretchy like a spring and also able to flow like a liquid.