

Make Your Own Ice Cream

Simple to make – no machine required!

Who doesn't love ice cream? How is it made? In order for cream to freeze, the temperature needs to be way below 32° F. Ever wonder why we put salt out during the winter? Salt lowers the freezing point of water so sidewalks don't get dangerously icy. You also add salt to ice when making ice cream.

This ice/salt mix absorbs the heat from cream when making ice cream. When the cream freezes, it makes ice crystals. The more you move the cream, the smaller the ice crystals.

The smaller the ice crystals, the creamier the ice cream, so keep that ice cream moving!

What you'll need:

- 1 cup half and half
- 2 tablespoons sugar
- 1/2 teaspoon vanilla extract
- Ice cubes
- 1/2 cup salt (preferably rock salt)
- 1 pint-size zipper bag
- 1 gallon-size zipper bag

What to do:

1. Combine the sugar, half and half, and vanilla extract in the pint-size bag and seal it tightly trying to remove as much air as possible.
2. Fill the gallon-size bag with ice and salt, then place the sealed smaller bag inside as well. Seal the larger bag.
3. Shake and gently squeeze the bag. Make sure that the inner bag is constantly surrounded by ice during this step. Shake the bags until the mixture hardens. It will take about 5 minutes.
4. When the ice cream is frozen, remove the ice cream bag from the ice bag, and the ice cream is ready to eat! If you want extra pizzazz, add some peppermint pieces, crumbled up cookies, or chocolate syrup to the vanilla ice cream.

Try this:

If you have a thermometer at home you can use, try this!

Measure the temperature of ice and a small amount of water in the zip lock bag. Record the temperature.

Next, add the salt to the bag to make a **solution**. Mix it up for a minute and then take the temperature again. Record the temperature. What did you notice?

You should notice that the temperature in the second bag with the salt is lower than the temperature with just the ice.

The ingredients in ice cream will not solidify at the freezing point of water (0° C or 32° F); they need to be colder. Adding the salt to your ice water mixture lowers the freezing point of water to below 0° C or 32° F allowing these ingredients to freeze. Now you are ready to make your frozen treat!

