

Homemade Ice Cream

*What Makes Ice Melt
Faster?*

Do you think we can make some ice cream in five minutes? Let's see what happens when we add salt to ice.

Things You Need

1 cup of milk, salt, a quart-sized plastic bag, and a gallon-sized plastic bag (Optional for flavoring: sugar, chocolate syrup, maple syrup, vanilla extract, etc)



Steps

1. Fill your gallon-sized bag about 1/4 full with ice.
2. Pour salt on the ice to completely cover the top of the ice.
3. Pour milk and any flavoring in the quart-sized bag and close the bag tightly.
4. Place the quart-sized bag into the gallon-sized bag on top of the salted ice.
5. Fill the gallon bag with ice to the top, salting evenly as you go.
6. Close your gallon-sized bag.
7. For about 5 minutes, shake the gallon bag back and forth, right and left.
8. When the ice cream looks firm, take out the quart-sized bag.
9. Add any toppings and enjoy!

Takeaway

Ice melts faster when salt is added as the salt lowers the freezing point of the water. Pure water freezes at 0 degrees Celsius. The addition of salt lowers the freezing point. When salt is added to the ice in the bag, the ice is above its freezing point, so it starts to melt. Melting needs energy which in this experiment comes from the milk in the inner bag. Heat energy is absorbed from the milk and it enables us to make the ice cream so much faster than a freezer!

