



Hot Ice

Grade Levels: 1-4

Background

Heat energy is in everything. Some items have more heat energy, some have less. In order to freeze something, heat energy must be taken away.

Question

Which will become ice faster, hot or cold water?

Possible Hypothesis

Cold water will freeze faster/slower than hot water.

Materials

- 2 Styrofoam cups
- Hot tap water
- Cold tap water

Procedure

1. With the help of an adult, fill one cup with very cold water. Fill the other with the same amount of very hot water. Label one cup hot and the other cup cold.
2. Put both cups in the freezer and check every 10-15 minutes. Record which one begins to freeze first.
3. Leave them in the freezer until the following day. Take them out and see if there is any difference in the ice cubes.

Analysis and Conclusion

Which one froze first? Did both cubes end up being the same size?

