



Name: _____

Date: _____

Calibrating a Temperature Sensor

Your group will need:

- 1 alcohol thermometer
- 2 plastic cups (one empty, one full of water)
- 1 spoon
- Ice cubes (enough to fill up empty cup)
- Temperature sensor

Have each group member choose a task.

Material manager - collects and returns materials, reads out the steps

Tester – carries out the tasks in the numbered list below

Observer – carefully watches the thermometer and gives readings to the Recorder

Recorder - confirms measurements taken and records on lines below

1. Fill the empty cup with ice cubes.
2. Add some water to the cup with the ice cubes until it is nearly full of water.
3. Stir with the spoon for 3 minutes.
4. Put the thermometer into the cold water and wait for 30 seconds.
5. Take the thermometer out of the water. It should read 0°C.
6. Allow the thermometer to come back to room temperature (stops going up).
7. Record and compare the temperature of the thermometer to that of the temperature sensor at room temperature.

Temperature from thermometer _____

Temperature from temperature sensor _____

Difference in temperature (if any) _____

