



COMARK

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FIELD CALIBRATION PROCEDURES PDT300

Introductions

It is now possible to calibrate the PDT300 thermistor thermometer in the field using 32°F slush ice. Note, because of the linear characteristics of the PDT300, if it is calibrated to 32°F, it will be within 2°F of all temperatures from -58° to +300°F.

Procedure

1. Make slush ice. Get at least an 8-oz. container.
2. Crush / grind enough ice to fill the container. Do not use uncrushed ice such as ice cubes.
3. Add tap water to about 1 inch of the top. Do not have water above the level of the ice.
4. Immerse the tip of the thermometer at least 1 inch below the level of the water in the slush ice.
5. Wait for the reading to become stable, normally $\pm 2^\circ\text{F}$ of 32°F.
6. Press and hold the D-H key for 8 seconds to begin calibration.
7. CAL will be displayed for 2 seconds, and calibration at 32°F is completed.
8. Remove the thermometer from the ice water and continue to take measurements.

NOTE: CAL will be displayed any time the D-H key is pressed for 8 seconds. The thermometer will not be recalibrated to the slush ice value of 32°F unless the tip is inserted in the ice slush, the D-H key is pressed, and the CAL is displayed. If the CAL is not carried out correctly, the thermometer simply assumes the factory calibration of 32°F, $\pm 2^\circ\text{F}$.