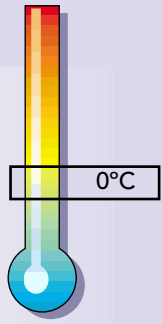


# Frosty

## Model 887



The Frosty is an accurate and low-cost device in which compensates a single thermocouple for the output EMF variations caused by the fluctuations in reference junction temperature.

Thermocouple tables give the voltage versus temperature variation with the cold junction at 0°C. This unit senses the temperature difference between ambient and 0°C and generates an electrical voltage to cancel out the resultant error, thus providing the equivalent of a 0°C reference bath.

The cased, battery-powered unit is portable and self-contained: modules can also be supplied for building into other equipment.

The unit is powered by a small Alkaline battery. A unique feature is an inbuilt miniature voltage stabiliser to eliminate the voltage variations which are one of the commonest causes of error in electronic thermocouple compensators, (the output of a dry cell varies with age, the amount of current which has been drawn from it and ambient temperature). This stabiliser, coupled with the thermal integration of the temperature sensitive element, makes the unit an outstandingly accurate device.

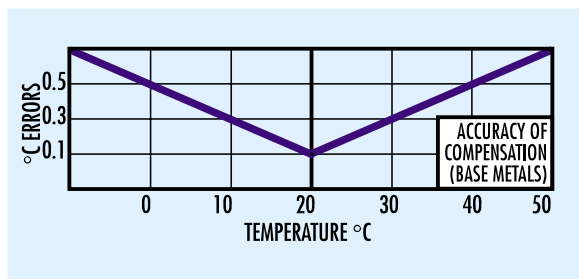
The unit is manufactured to the highest standards and after assembly each unit is calibrated to ensure conformance with the relevant thermocouple table.

A wide range of thermocouple types are available.

Recalibration procedure when required.

1. Place thermocouple probe in stirred ice bath, connect to the input and switch on.
2. Connect an accurate measuring instrument to the unit and adjust the potentiometer for zero output.

British Aerospace approved versions of the unit's module are available.



Single Channel Thermocouple Automatic Compensator  
Single Channel Automatic Reference Junction  
Accurate, Light and Portable



Model No.	887
Referencing Temp	0°C (others by arrangement)
Operating Temp	0 to 40°C
Accuracy	±0.1°C at 20°C plus ±0.02°C per degree above or below 20°C (see graph)
Output Impedance	Less than 200 ohms
Battery	AAA 1.5V
Supply Current	Less than 0.5mA
Variations	Periodic checking of the battery and replacing when its voltage is 1.36 Volts or less, will ensure negligible error
Compensation	K, T, J, E, U, N
Used for type	U Wire used for R & S types unless otherwise specified
Stability	Typically 0.2% p.a.
Dimensions	Height 25mm Width 50mm Depth 100mm
Weight	107g

### How to order

**Frosty Model 887** (small plugs)  
Specify thermocouple type e.g. Frosty K