### **SGD ADPT-TC**

# **PanelPilot**

# Thermocouple conditioning module for PanelPilot-compatible displays

#### **Features**

- -200 to +1350°C (-328 to +2462°F)
  K-type measurement range
- -200 to +1190°C (-328 to +2174°F)
  J-type measurement range
- -200 to +390°C (-328 to +734°F) T-type measurement range
- · Powered from SGD meter
- · Application download from PanelPilot website
- · User selection of thermocouple type from PC software
- Pre-settable high and low alarms
- Display in either °C or °F
- · Thermocouple not supplied



SGD 24-M not included

This add-on module interfaces directly with any PanelPilot display from the list below. It has built-in cold-junction compensation (CJC) and takes its power directly from the SGD meter.

#### Ordering Information

SGD ADPT-TC add-on board	SGD ADPT-TC
PanelPilot-compatible	SGD 24-M
displays - see	SGD 28-M
PanelPilot.com	SGD 35-M

### Specifications

	Minimum	Typical	Maximum	Unit
Probe measurement range (K-type)	-200 (-328)		+1350 (+2462)	°C (°F)
Probe measurement range (J-type)	-200 (-328)		+1190 (+2174)	°C (°F)
Probe measurement range (T-type)	-200 (-328)		+390 (+734)	°C (°F)
Operating temperature range *	-10 (+14)		+40 (+104)	°C (°F)
Resolution (internal and displayed)		0.1 (0.1)		°C (°F)
Accuracy		±1 (±2)**		°C (°F)

<sup>\*</sup> Operating temperature applies to the module only. Please consult the probe manufacturer for operating temperature of thermocouple.

#### Hardware

The SGD ADPT-TC board takes its power from the host SGD. Connect the 14-way socket to the SGD, as shown.

The thermocouple is wired to the TC+ (green) and TC- (white) via the screw terminal block.

The system can be powered via the USB port at the SGD or from a seperate supply - see the SGD data sheet for voltage limits.







<sup>\*\*</sup> Quoted accuracy is for the module only and excludes the thermocouple probe. Thermocouple error should also be taken into consideration.

## **SGD ADPT-TC**



# Thermocouple conditioning module for PanelPilot-compatible displays

#### **Terminal Connections**

Terminal connection	Description	
V+	Alternative power supply input for the SGD. This passes straight to the SGD via the connector. Do not use if the power is applied directly to the V+ terminal of the SGD.	
0V	Ground connection for the SGD and TC board.	
ALM1	Open-collector alarm outputs of the SGD. See the SGD data sheet for full details.	
ALM2		
TC+	Positive connection for the thermocouple (Green)	
TC-	Negative connection for the thermocouple (White)	

## Mounting the SGD-TC

The SGD ADPT-TC should be mounted on the SGD display module. Take care to observe correct polarity when connecting the power supply and the thermocouple.

Please refer to the SGD data sheet for instructions on mounting the SGD to a panel.

#### **Dimensions**

All dimensions in mm (inches)







