

ADT112K Thermocouple Dual Trip Amplifier

- Suitable for SIL 1 & SIL 2 rated (EN 61508) safety instrumented system (SIS) loop applications, as 1oo1 architecture (HFT:0)
- Supply voltage options:
 - 115Vac $\pm 20\%$
 - 230Vac $\pm 20\%$
 - 24Vdc $\pm 10\%$
 - 48Vdc $\pm 10\%$
- Non-Smart/Non-uProcessor based, Type A instrument
- RFI Protection to EN 61000-4-3:2006/A2:2010
- AMELEC Standard 10 year warranty

Technical Specifications

Input

mV signal developed from any thermocouple type; J, K, N, R, S or T, with minimum 4mV span.

Outputs

Each Trip output may be specified as either High or Low alarm, and has a set of changeover contacts rated at 250VAC, 2A, 100VA resistive. (Latching relay options also available, 'L' option)

Red LED indication of each Relay status, **ON** Energised (Red/Green 'BI'-colour LED status indicators optional)

Digital Display ('DI' option) of the Input range on 3½ digit Front LCD or up to 4½ Digit Red LED Display also available on request, with front fascia Toggle switch or Read buttons show the trip set points within the scale.

Performance

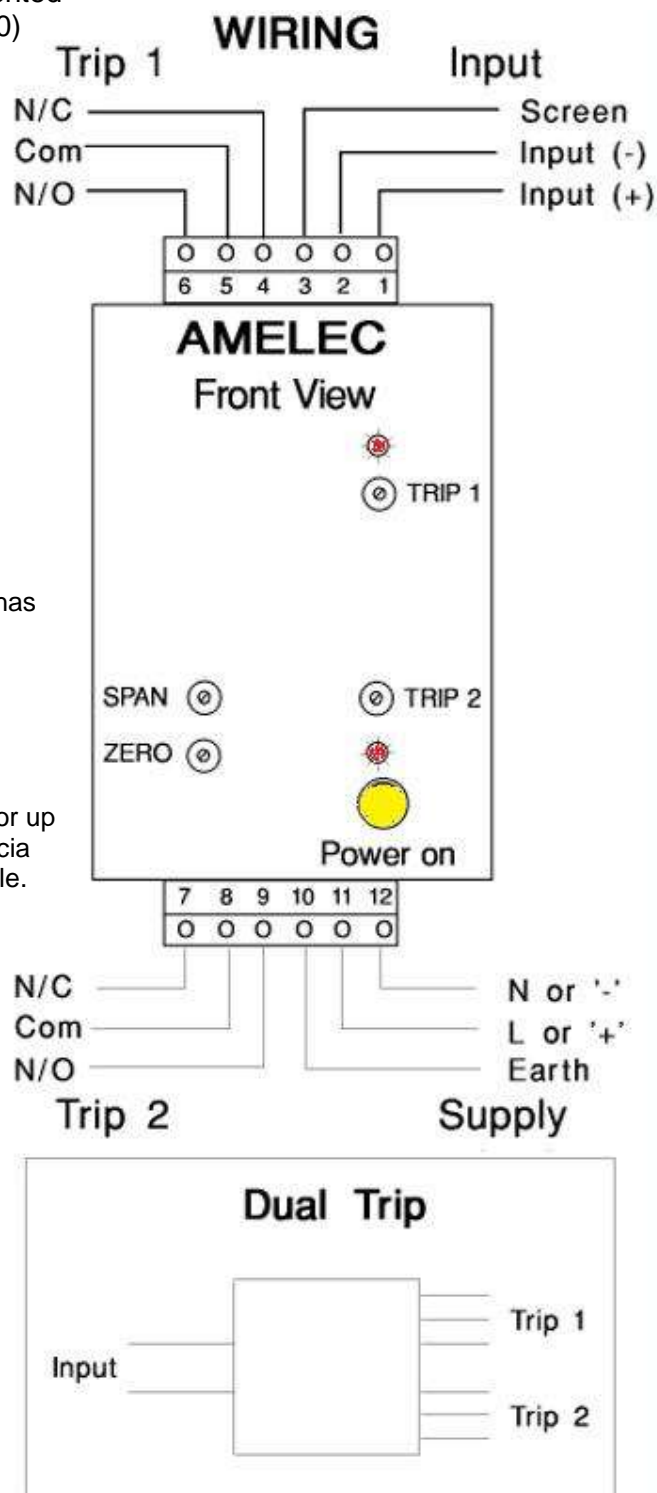
Trip settability: $\pm 1\%$ span
 Trip repeatability: $\pm 0.1\%$ span
 Deadband: nom 1% span std (Variable 0.5-20% option 'V' available)
 Response time: <400ms
 Isolation: 500Vdc Input/Contacts/Contacts/Supply/Earth
 Input O/C response: Up or Downscale drive may be specified
 Fail Safe Relays: De-energise on Trip & Loss of Power supply as std

Environmental Conditions

Storage Temperature: -40 to +70°C
 Operating Ambient: -15 to +55°C
 Relative Humidity: 5 – 95% RH (Non-condensing)
 EMC: 2014/30/EU, EN 61326-1:2013 (Generic Industrial)
 RF Immunity: 20MHz-3GHz/5.25GHz ≤ 10 V/m,
 80MHz-1GHz/5.6GHz ≤ 30 V/m, 889MHz/1.75GHz ≤ 40 V/m.

Mounting/Dimensions

Enclosure: 50w x 75h x 182d mm
 DIN Rail (TS35) or Surface by seismic Keyhole plate (50w x 130h mm) and Front of Panel mounting options all available as standard.
 (Front of Panel Bezel Dims: 57w x 96h, Cut out Dims: 51w x 76h mm)



Customer Termination

Fixed screw terminals as standard
 (Plug-in terminals optional)