

## AHT646 Slidewire Differential Trip Amplifier

- Suitable for wire wound slidewires
- Supply voltage 21 to 30Vdc
- Amelec standard 10 year guarantee
- Suitable for SIL Level 1, 2, & 3 (IEC 61508-2)

### TECHNICAL SPECIFICATION

#### FUNCTION

High Trip: Relay de-energise on rising input.  
Low Trip: Relay de-energise on falling input.

#### INPUT

Any 2, 3 wire thermistor, slidewire or potentiometer.

#### OUTPUT

The Trip output is a pair of changeover contacts SPCO per set point, rated at 250VAC, 2A, 100VA (resistive).

#### CONTROLS

Zero / Span: 15 turn potentiometers, only fitted when used with common display.

Set point: 15 turn potentiometer to set Trip point within set input range.

#### INDICATOR

Amber Led: power ON indicator  
Red Leds: Relay status indicators

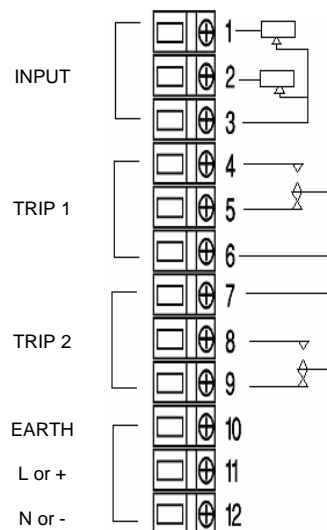
#### PERFORMANCE

Trip repeatability:  $< \pm 0.1\%$   
Response time: Typically  $< 400\text{ms}$   
Trip settability:  $< \pm 0.1\%$

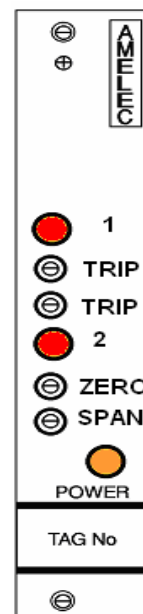
#### PROTECTION

Isolation 1000V RMS\*. Input/Contacts/Supply/Earth  
\*500VDC if RFI option (K) is specified.  
Internal Fuse.  
Fail safe on loss of power  
Input over range typically at 300%.

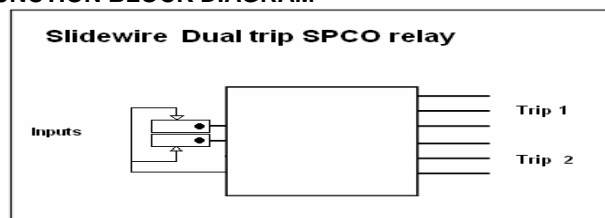
#### TERMINATION



#### FRONT VIEW



#### FUNCTION BLOCK DIAGRAM



#### ENVIRONMENTAL CONDITION

Storage temperature: - 40 to +70 °C  
Operating Ambient: -15 to +55 °C  
Relative Humidity: 5 to 95% RH

#### MOUNTING / DIMENSION

Card 3U high 4E wide  
Mounting 19" rack / 84E wide (See rack GA for details)  
Card weight  $< 200\text{g}$

#### ADD ON / OPTIONS

DI: Common LCD display for local monitoring  
J : Input injection jack socket  
P: Test point (Trip set point monitoring)  
K: RFI protection to IEC801-3  
Non standard Power supply ranges available