RedLion®
BY HMS NETWORKS

IRMA RTD Temperature Input Module

Item number: IRMA0001

The IRMA RTD Temperature Input Module is high-performing and highly accurate signal conditioner that offers remote RTD monitoring. Output is ideal for interfacing to indicators, chart recorders, controllers or other instrumentation equipment.

Convert RTD or resistance inputs into a voltage or current output with this easy-to-use signal conditioner

Features and benefits

✓ Accepts RTD or resistance inputs

Measures standard 2, 3 and 4 wire Pt100 and converts the signal to an analog voltage or current output.

✓ Loop powered

High 2-port galvanic separation to eliminate ground loops. Flexibly loop powered by 3.3 to 35 VDC via connectors

✓ Analog output

May be configured for one of the following: 0 to 20 mA, 4 to 20 mA, or 0 to 10 VDC

✓ Easy installation

Equipped with a universal mounting foot for easy installation to either a top hat or G profile DIN-rail.

✓ Industry certified

UL-listed and ATEX/IECEx approvals. Class 1, Division 2 or Zone 2 hazardous locations.

✓ 3-port isolation

High galvanic isolation of 2.5 kVAC. Full isolation from signal input and analog output. Provides surge suppression and protects the control system from transients and noise. Signal/noise ratio of >60 dB.

✓ High accuracy and speed

High conversion accuracy, better than 0.05% of span. < 30 ms fast response time with simultaneous sensor error detection when selected. Selectable 300 ms response time when signal dampening is needed.

✓ Simple configuration

Easily configured using an 8 position DIP switch. Range setting technique (field calibration) is used so the actual input signal adjusts the output for scaling. More than 1000 factory calibrated measurement ranges.

✓ Designed for harsh environments

Engineered to deliver uncompromising performance in demanding environments. Meet NAMUR NE21 recommendations and NAMUR NE43 standards. Wide temperature range of -25 to 70 °C.

IRMA RTD Temperature Input Module

General

Net Weight (g)	70.023265
Packed Weight (g)	70.023265
Operating Temperature °C Min	-25
Operating Temperature °C Max	70
Storage Temperature °C Min	-40
Storage Temperature °C Max	85
Relative Humidity	< 95% RH (non-cond.)
Power Consumption (W)	0
Input Voltage (V)	3.3 to 35 VDC
Mounting	DIN rail mount (bracket included)
Packaging Material	Cardboard
Warranty (years)	2

Identification and Status

Product ID	IRMA0001
Country of Origin	United States of America (the)
HS Code	8538909999
Dual Usage	No

Physical Features

SD Card Slot	No
Flash Drive	No
Contains Battery	No

IRMA RTD Temperature Input Module

Certifications and Standards

Protection Class IP	IP20
RoHS Compliant	Yes
CE	No
FCC	No
UKCA	No
UL	Yes
ATEX	Yes
DNV	No
KC	No
Vibration and Shock	Vibration: 2...25 Hz: ±1,6 mm, 25...100 Hz: ±4 g