

TRIPLE LOOP ISOLATOR

Type: AITA

FEATURES

- * **3 Loop isolators 4 - 20 mA in one unit**
- * **Prevent lightning from spreading over the system**
- * **Working voltage max.: 1000 V_{RMS}**
- * **Transient overvoltage max.: 8000 V_{peak}**
- * **Excellent linearity**
- * **Small outlines, 35 mm. wide**

Description:

The loop isolator is designed to separate a 4 - 20 mA loop into two galvanically separated 4-20 mA loops in order to prevent signal distortion and instrumentation damages due to electrical noise or voltage spikes and ground loop currents.

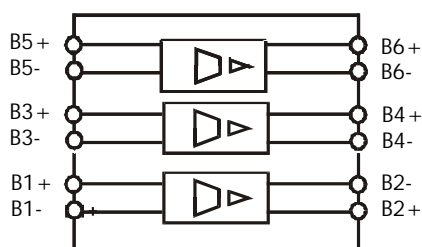
The insulation is based on a high performance linear optocoupler with an excellent linearity and a low coupling capacitance.

Application:

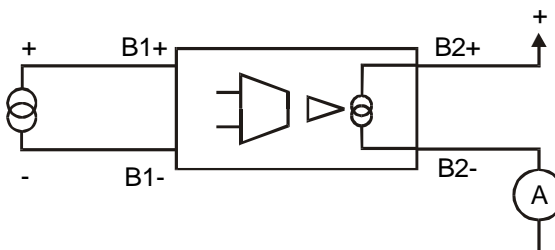
For use in instrumentation with current loop I/O as used by PLCs, sensors, recorders, indicators, alarm units etc.

CONNECTION DIAGRAM

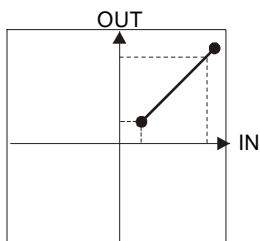
Rail mounting



FUNCTION DIAGRAM



INPUT/OUTPUT CHARACTERISTICS



Input: 4 - 20 mA

Output: 4 - 20 mA

SPECIFICATIONS

INPUT

4 - 20 mA Loop supplied	Max. input 100 mA Voltage drop, Max. 7 V
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PERFORMANCE PARAMETERS

TIMING	
Response time	< 10 msec.
ELECTRICAL	
Precision	Class 0.5 according to DIN / EN60688
Linearity	< 0.02 %
Temp. dependence	± 0.02 % / °C
Supply dependence	± 0.01 % / % ΔU

OUTPUT

Loop supplied 4 - 20 mA	Loop voltage, 8 - 32 V Max. voltage, 36 V
Max. load	600 Ω. @ 20 V Loop voltage

ISOLATION CHARACTERISTICS

Capacitance	< 1 pF, input/output
Safety approval	According to: UL1577 (5 kV _{RMS} /1 min. rating) VDE 0884/06.92 (V _{IORM} = 1 kV _{RMS}) BSI: BS415; 1990 BS7002; 1992 BS EN60950; 1992 EN41003; 1991

GENERAL

Temperature range	- 25 °C to + 55 °C
Humidity	Up to 90 % RH non-condensing
Weight	0.12 kg



EMC directive 89/336:	International Standards EN50081 - Emission EN50082 - Immunity
Low voltage directive 73/23:	EN60255 - Electrical Relays EN60688 - Measuring transducers

ORDERING INFORMATION

TYPE
Triple loop isolator

HOUSING
Rail mounting

SIZE
35 mm.

CODE END

