

Field-mounted Two-wire Signal Conditioners 6-UNIT

SIGNAL TRANSMITTER

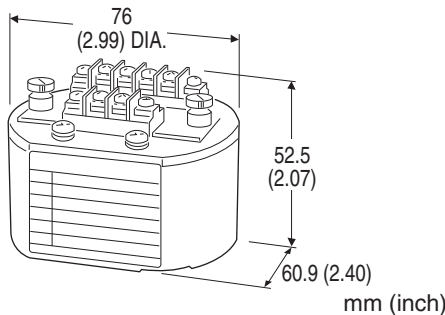
(field-selectable range)

Functions & Features

- Converting a DC input into an isolated 4 - 20 mA DC signal
- Field selectable input range
- Rugged enclosure

Typical Applications

- mV, voltage and current scaling



MODEL: 6VS-[1]

ORDERING INFORMATION

- Code number: 6VS-[1]
- Specify a code from below for [1].
(e.g. 6VS-U3)
- Input range (e.g. 1 - 5 V DC)
 - Mounting adapter (e.g. surface mounting adapter plate, model: A-01)
- Note: When a mounting adapter is required, specify mounting adapter. Not included without specifying.

[1] INPUT

- U1:** Range ± 100 mV; 3 mV - 100 mV span;
input resistance 20 k Ω minimum
- U2:** Range ± 1 V; 100 mV - 1 V span;
input resistance 200 k Ω minimum
- U3:** Range ± 10 V; 1 V - 10 V span;
input resistance 1 M Ω minimum

RELATED PRODUCTS

- Outdoor enclosure (model: 6BX-E)

PACKAGE INCLUDES...

- Mounting adapter
surface mounting adapter plate (model: A-01)

Spring clip (model: A-02)

DIN rail mounting plate (model: A-31)

Note: When a mounting adapter is required, specify mounting adapter. Not included without specifying.
When using in combination with outdoor enclosure (model: 6BX-E), use a spring clip (model: A-02).

GENERAL SPECIFICATIONS

Connection: M3 screw terminals (torque 0.6 N·m)

Screw terminal: Nickel-plated steel

Housing material: Diecast aluminum

Isolation: Input to output

Output limit: Approx. 120 %

Zero adjustment: -3 - +15 % (behind the access cover)

Span adjustment: 90 to 110 % (behind the access cover)

DIP SW Setting: For input calibration

(Refer to the instruction manual)

INPUT SPECIFICATIONS

Input: -10 - +10 V DC

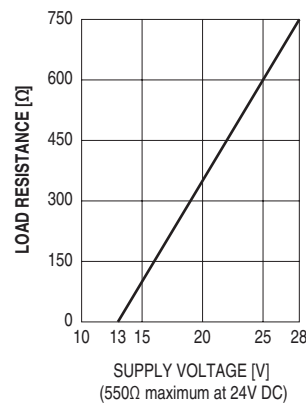
Span: Min. 3 mV, max. 10 V

Offset: Max. 2 times span

OUTPUT SPECIFICATIONS

Output: 4 - 20 mA DC

Load resistance vs. supply voltage: Load Resistance (Ω) =
(Supply Voltage (V) - 13 (V)) \div 0.02 (A)
(including leadwire resistance)



INSTALLATION

Supply voltage: 13 - 28 V DC

Operating temperature: -5 to +70°C (23 to 158°F)

Operating humidity: 30 to 90 %RH (non-condensing)

Mounting: DIN rail with mounting plate A-31; surface mounting with adapter plate A-01; spring clip A-02 for 3-inch hub

Weight: 220 g (0.49 lb)

PERFORMANCE in percentage of span

Accuracy: $\pm 0.1\%$

Temp. coefficient: $\pm 0.015\%/^{\circ}\text{C}$ ($\pm 0.008\%/^{\circ}\text{F}$)

$\pm 0.02\%/^{\circ}\text{C}$ ($\pm 0.01\%/^{\circ}\text{F}$) at spans $\leq 10\text{ mV}$

Response time: $\leq 0.5\text{ sec.}$ (0 - 90 %)

Insulation resistance: $\geq 100\text{ M}\Omega$ with 500 V DC

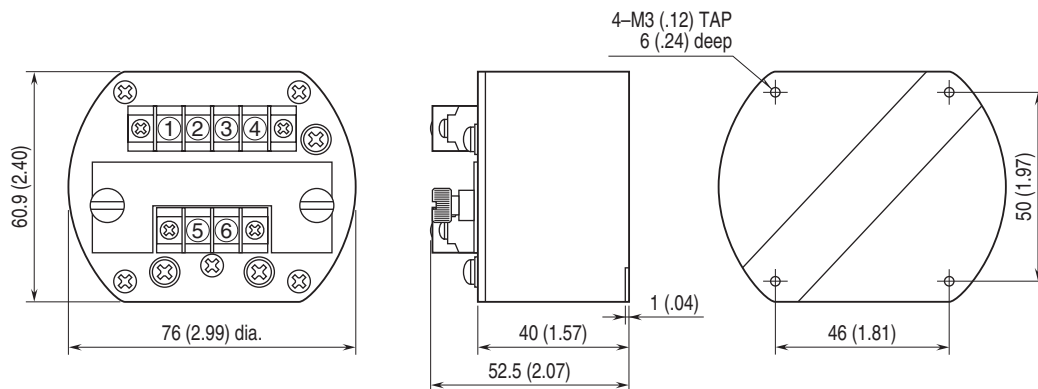
Dielectric strength: 500 V AC @ 1 minute

(input to output)

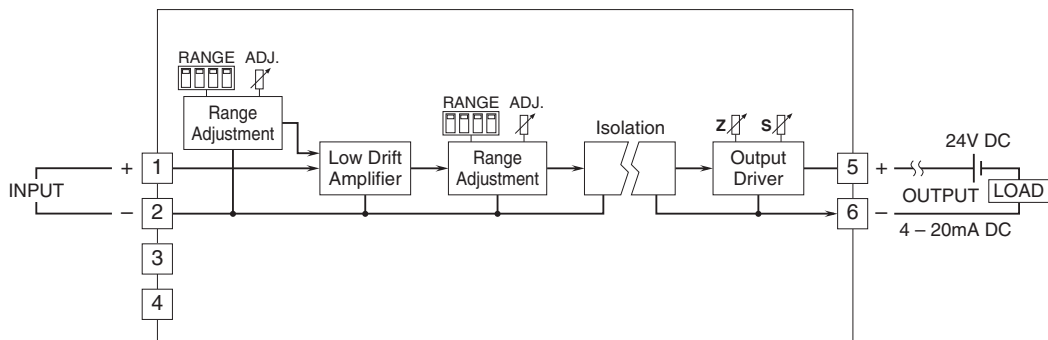
1500 V AC @ 1 minute

(input or output to ground)

EXTERNAL DIMENSIONS & TERMINAL ASSIGNMENTS unit: mm [inch]



SCHEMATIC CIRCUITRY & CONNECTION DIAGRAM



Specifications are subject to change without notice.