

ACTION PAK® AP4502 MODEL



Benefits

- Cost-Effective Multiple Input Processing
- "Bumpless" Transfer Prevents Equipment Damage
- Relay Contacts for Channel Status
- Easy Plug-in Installation/ Low Mean-Time-to-Repair
- AC Line Powered
- Three Year Warranty



High Input Select, Process Function

Provides a DC Output in Proportion to the Highest of 2 Inputs

DESCRIPTION

Action Pak model AP4502 high input select transmitter provides a DC output in proportion to the highest of 2 channel inputs. When one input level exceeds the other, the output smoothly transfers to reflect the new higher input. This action is commonly called "bumpless" transfer. A set of SPST reed relay contacts is provided for each input, which identify the highest channel.

APPLICATION

The AP4502 is useful in applications that require process decision-making. Typical applications include multipoint temperature, flow and level monitoring. The output of the AP4502 can drive a digital meter for direct display, a limit alarm for multipoint monitoring or interface with a computer for monitoring & control applications.

OPTION

U Urethane coating of internal circuitry for protection from corrosive atmospheres.

CALIBRATION

Top-accessed screwdriver adjustments provide typical $\pm 10\%$ zero and span adjustability. Calibration is referred to the input in that adjustments are to correct for input/sensor variations. Set channel B at or below the units listed input range. (e.g. 0mA) Zero is adjusted for the specified minimum output (e.g., 4mA) with channel A at the desired minimum. Span is adjusted for the specified maximum output (e.g., 20mA) with channel A at the desired maximum. Repeat adjustments for best accuracy.

PRODUCT ASSISTANCE

For additional information on calibration, operation and installation please contact our Technical Services Group. Call toll-free:

800-783-6664



*Protecting the
Integrity of
Industrial
Process Signals*



SPECIFICATIONS

Input Impedance	Voltage Input: >200K Ω Current Input: 20 Ω
Output Impedance	Voltage Output: <10 Ω Current Output: >100K Ω
Output Drive	Voltage Output: 10mA, max (1K Ω , min. @ 10V) Current Output: 15V compliance @ 20mA (750 Ω , max)
Response Time	100msec., typical
Linearity	\pm 0.05% of span, typical
Stability (15-minute warm-up)	\pm 0.02%/°C, typical
Output Ripple	0.25% of max. span, rms or 5mV whichever is greater

Common Mode Rejection	60 Hz: >80dB DC: >100dB
Common Mode Voltage	600V DC or peak AC, max
Temperature Range	Operating: 0 to 60°C (32 to 140°F) Storage: -20 to 85°C (-4 to 185°F)
Power	Consumption: 3W typical, 5W max Standard: 120VAC (\pm 10%, 50-400Hz) Available: 240VAC (\pm 10%, 50-400Hz)
Relay Contacts	Type: SPST Rating: 100VDC @ 250mA
Weight	0.58lbs

Table 1: AP4502 Standard Input/Output

0-1V	1-5V	10-50mA
0-5V	0-10V	4-20mA

Table 2: AP4502 Input Limits

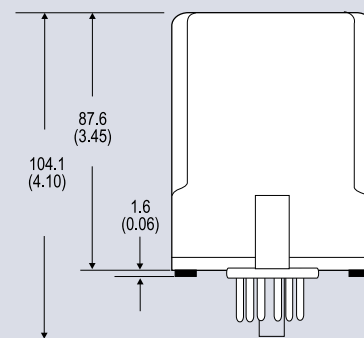
Minimum Span		Maximum Input	
Voltage	Current	Voltage	Current
100mV	1mA	200V	1A

Table 3: AP4502 Output Limits

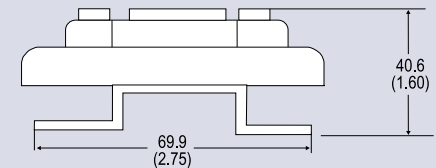
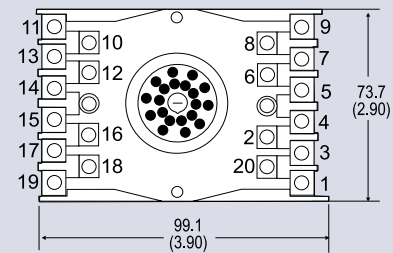
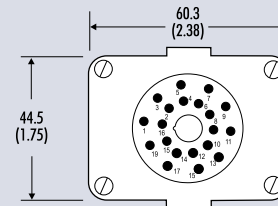
Minimum Span		Maximum Output	
Voltage	Current	Voltage	Current
100mV	1mA	10V	50mA

DIMENSIONS

Dimensions are in mm (inches)



Retaining Spring
Available: Model M801



M020

MODELS & ACCESSORIES

Mounting

All Action Paks feature plug-in installation. Model AP4502 uses a 20-pin base track mount molded socket (M020). For an 11-pin model (no relays) contact factory.

Ordering Information

Specify:

- Model: **AP4502**
- Input Range (see Tables 1, 2)
- Output Range (see Tables 1, 3)
- Options: U (see text)
- Line Power (see specs)

(All power supplies are transformer-isolated from the internal circuitry.)

Pin Connections

1 AC Power (Line)	15 No Connection
2 Shield (Gnd)	16 No Connection
3 AC Power (Neu)	17 Output (+)
4 Input A (+)	19 Output (-)
5 Input B (+)	18 No Connection
6 No Connection	20 No Connection
7 No Connection	
8 Input (-)	

9 C _____ A Relay

10 N.O. _____

11 C _____ B Relay

12 N.O. _____

13 No Connection

14 No Connection