



Features

- ★ High resolution by 5 1/2-digit(199999)LED display
- ★ High-speed sampling rate (50 times per second)
- ★ Able to change measurement range by input range selection

Ordering code

AM - 756 - - -

Code	Input range
DV	DC voltage (±199.999mV~±199.999V)
23	±19.9999mA
24	±199.999mA
DB	Process signal (1~5V, 4~20mA, ±199.999mV)

Code	Power supply
1	100 to 240Vac ±10%
2	12 to 48Vdc ±10%

Code	Output
0	None
1	External control
2	BCD output (TTL) + external control
3	BCD output (Open collector) + external control
4	Analog output + external control

Code	Comparative output
0	None
1	Relay
2	Photo coupler

Input Specifications

◆ DC voltage **DV**

Code	Range	Measurement range	Resolution	Display Range	Impedance	Max. allowable input	Accuracy (23±5°C 45 to 75%RH)
DV	11	±199.999mV	1μV	Offset: ±199999 Full scale : ±199999	10MΩ or more	±50V	±(0.03% reading +15 digit)
	12	±1999.99mV	10μV				
	13	±19.9999V	100μV		Approx. 1MΩ	±250V	±(0.02% reading +10 digit)
	14	±199.999V	1mV				

◆ DC current **23 24**

Code	Range	Measurement range	Resolution	Display Range	Impedance	Max. allowable input	Accuracy (23±5°C 45 to 75%RH)
23	23	±19.9999mA	0.1μA	Offset: ±199999 Full scale : ±199999	0.1μΩ	±50mA	±(0.04% reading +10 digit)
24	24	±199.999mA	1μA		1μΩ	±500mA	±(0.06% reading +10 digit)

◆ Process signal **DB**

Code	Range	Measurement range	Resolution	Display Range	Impedance	Max. allowable input	Accuracy (23±5°C 45 to 75%RH)
DB	1V	1~5V (±5V)	-	Offset: ±199999 Full scale : ±199999	Approx. 1MΩ	±250V	±(0.04% reading +5 digit)
	2A	4~20mA (±20mA)	-		Approx. 10Ω	±50mA	
	11	±199.999V	1μA		10MΩ or more	±50V	±(0.03% reading +5 digit)

Specifications

◆ Common specifications

Display	Red or green 7 segment LED (height 20mm)
Polarity	'-' is displayed automatically at negative polarity
Display range	-199999 to 199999 (5 1/2 digits)
Scaling	Offset: ±199999, Full scale : ±199999
Over range display	When input exceeds the maximum display, 'ovEr' or '-ovEr'
Decimal point	Able to set to any digit
Zero display	Leading zero suppression
Operating temperature	-5 to 50°C
Operating relative	35 to 85% (non-condensing)
Power supply	100 to 240Vac ±10% 50/60Hz, 12 to 48Vac ±10%
Power consumption	AC power supply : Approx. 12VA max. DC power supply : Approx. 6W max.
Dimensions	96mm(W) x 48mm(H) x 97.5mm(D) DIN size
Weight	Approx. 200~300g
External control	Select 4 external control and set parameter Start hold, Digital zero, Peak hold, Pattern select, Relay reset

Dielectric strength	Power supply - input / output / external control / sensor power AC power supply : 1500VAC per 1 min. DC power supply : 500VDC per 1 min. Common : 500VDC per 1 min.
Insulation resistance	500Vdc, 100MΩ or more on the above terminals
Sampling rate	Approx. 20ms (50 times per second) ~ Approx. 2s (0.5 times per second)
Moving average	None / 2 / 4 / 8 / 16 / 32 / 64 selectable
Display update cycle	Max. 50msec (20 times per sec) to Min. 1s (1 time per sec)
Built in excitation (Sensor power supply)	12Vdc±10% 50mA, 24Vdc±10% 25mA selectable, 10Vdc±10% 60mA selectable
Standard accessory	1 unit sticker, 2 terminal covers, 2 bands, connector for BCD output when BCD option
Optional accessory	Front panel cover (WP-3)

◆Comparative output specifications

Comparison result	5 setpoints (HH/HI/GO/LO/LL)					
Output method	Relay output or photocoupler output					
Output rating	Relay output : Output rating AC250V 1A (resistance load), DC30V 1A (resistance load) The electrical life 50 thousand times (The rated load) Photocoupler output: Output rating DC30V 20mA Output saturation 1.2V or less (When 20mA)					
Setting range	-199999 to 199999					
Hysteresis	Able to set 1 to 9999 digit for each setpoints					
Operation speed	Relay : Max. 7ms, Photocoupler : Max. 1ms					
Comparative condition	Result	Comoarator ouput				
		HH	HI	GO	LO	LL
Display value > HH > HI	HH/HI	ON	ON	OFF	OFF	OFF
HH ≥ Display value > HI	HI	OFF	ON	OFF	OFF	OFF
HH, HI ≥ Display value ≥ LL, LO	GO	OFF	OFF	ON	OFF	OFF
LO ≥ Display value ≥ LL	LO	OFF	OFF	OFF	ON	OFF
L > LL > Display value	LO/LL	OFF	OFF	OFF	ON	ON

◆Analog output specifications

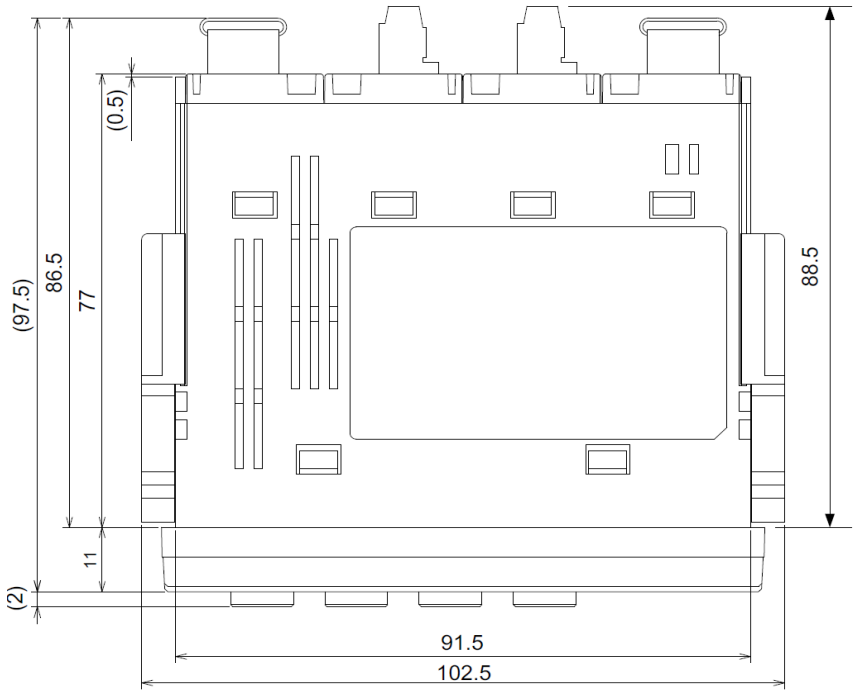
Analog output	Load resistance	Accuracy	Ripple
0 to 1V	10kΩ or more	±0.1% of FS	±50mVp-p
0 to 10V			
1 to 5V			
4 to 20mA	550Ω or less		±20mVp-p
Conversion	D/A		
Resolution	15 bit		
Response time	Approx. 80ms		

◆BCD output specifications

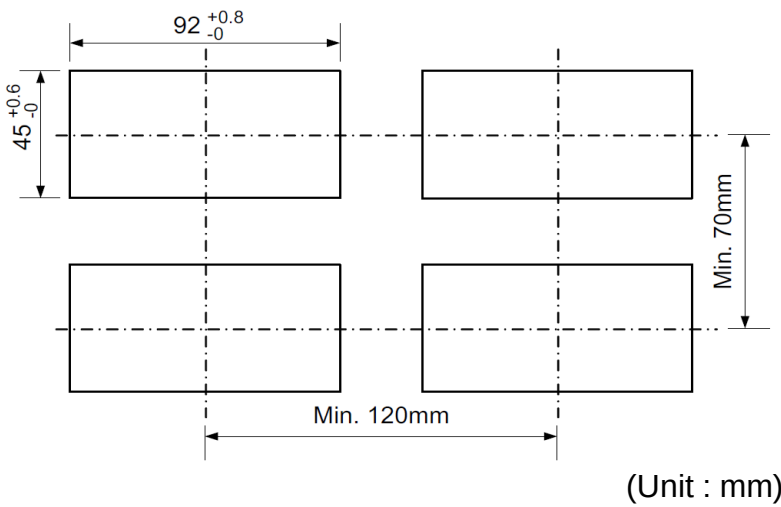
	BCD output
Output method	TTL or NPN open collector
TTL specifications	Output logic : Selectable TTL level Fan-out 2 (CMOS compatible)
NPN Open collector specifications	Output logic : Selectable DC30V 10mA (MAX) Output saturation voltage: No more than 1.2V or less
ENABLE input specifications	When Enable and COM short, each output will be "OFF". (Open collector: transistor OFF, TTL: High impedance) ON electric voltage: 0 to 0.8V OFF electric voltage: 4.2 to 5V Input current: No more than -0.5mA

Dimensions

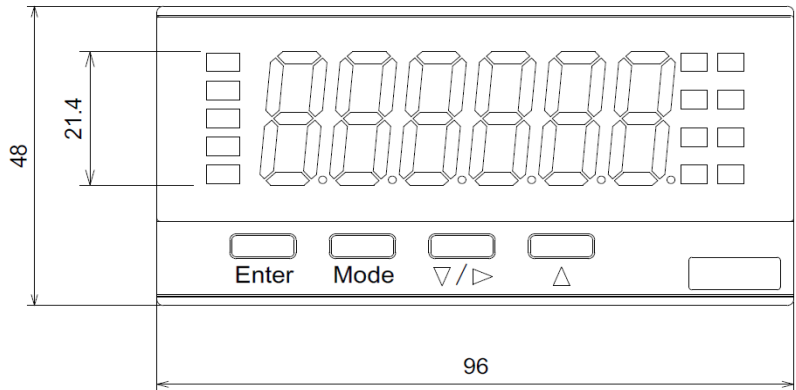
◆Front view



◆Panel cutout

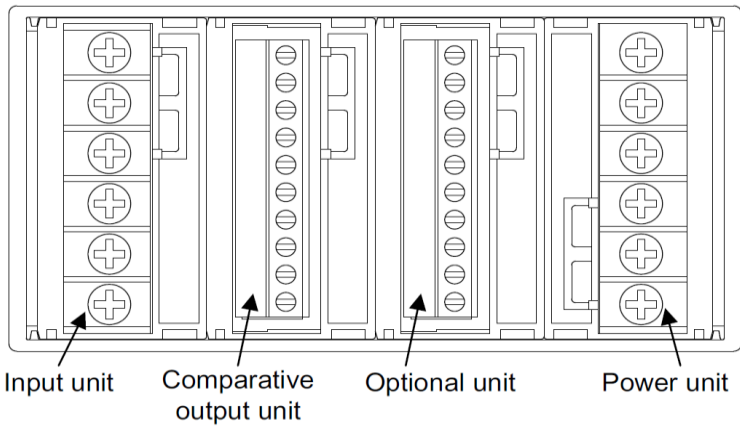


◆Side view

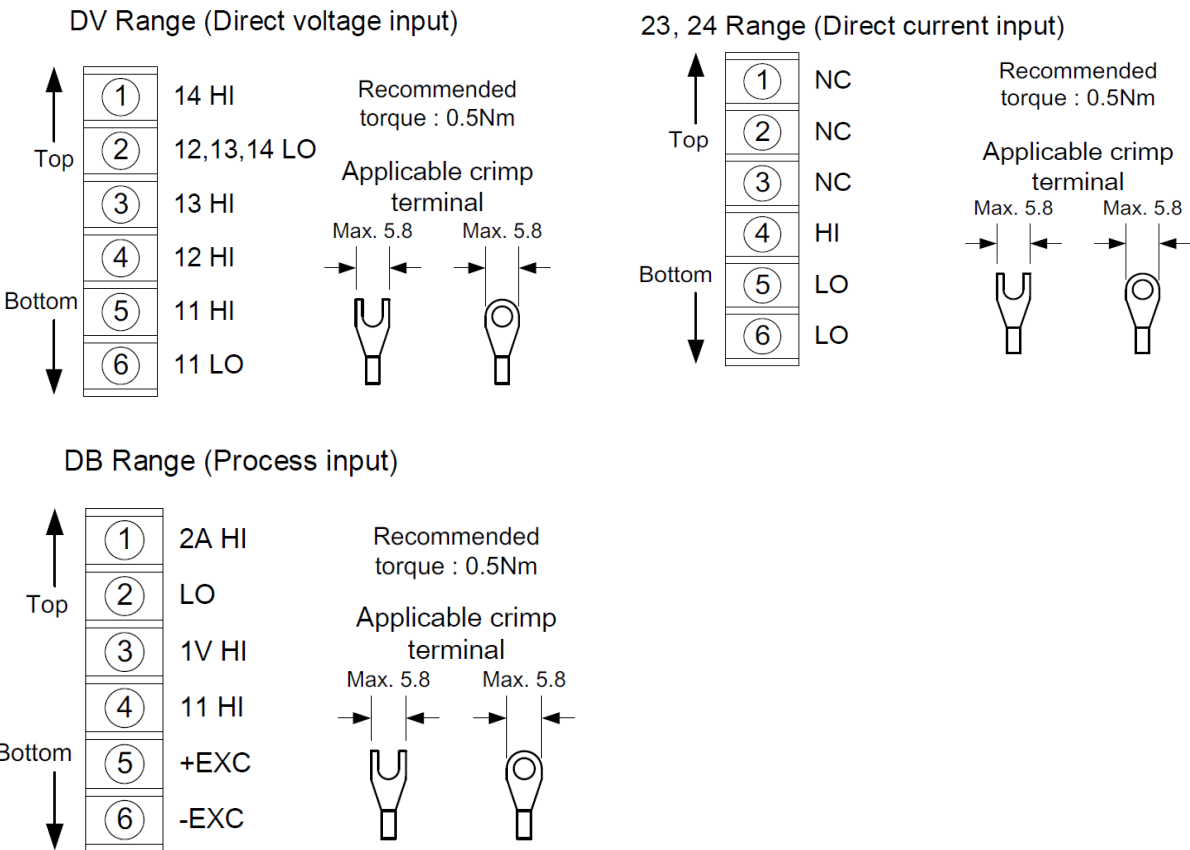


Terminal Connections

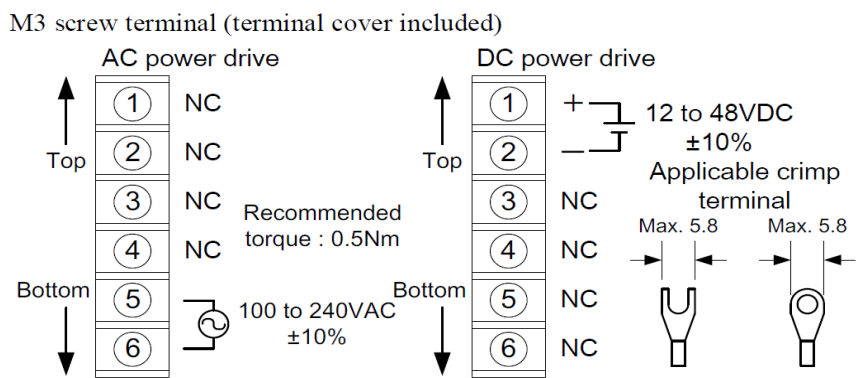
◆Rear view



◆Input connection



◆Power connection



*NC Terminal: unconnected

* Specification is subject to change without notice