M905—PANEL CONDITION DEVICE WITH DISPLAY

Programmable Digital Display Meter

Multiple output options available

Casing mounted ABS in option

The M905 is an all-in-one digital meter, supplying the sensor with power and providing general purpose 4½ digit readout for sensors and transducers.

Standard features include a tare function, MAX/MIN value detection and storage, and a hold function. Optional relays and digital or analogue outputs can be added to provide control outputs.

The M905, is a programmable device which offers as standard many conditioning technologies:

- Strain gages sensor in Wheatstone bridge
- Potentiometers
- Process transducers ±10V and 4-20mA
- Temperature probes PT100
- Thermocouples J, K, T

Through easy front panel or remote programming, the M905 adapts to a wide range of applications and works with most of TE Connectivity sensors. Additionally, it can be mounted in an ABS case.

FEATURES

- Suited for Process, strain gages, potentiometers and thermocouple sensors
- Display: -19999 to 19999
- Compact 96x48x60 mm Housing
- Front Panel Programming
- 11-point scaling
- Plug-in Option Boards

APPLICATIONS

- Instrumentation Laboratory
- Test stand
- Process monitoring
- Rack Mounts

PERFORMANCE SPECIFICATIONS (Typical values at 23±3°C)

CHARACTERISTICS

GENERAL	
Dimensions (L x W x H)	96 x 48 x 60 mm [3.9 x 1.9 x 2.4 in]
Panel Cut out	92 x 45 mm [3.6 x 1.8 in]
Operating Temperature Range	-10° C to 60° C [14 to 140° F]
Storage Temperature	-25° C to 85° C [-13 to 185° F]
Relative Humidity	<95% at 40° C [104° F]
Weight	160 g [0.35 lb]
Mounting clips supplied	
Case Material	UL94 V-0 Polycarbonate
Front Panel Protection	IP65

ELECTRICAL	
Operating power M905	85-265 Vac, 11-300 Vdc
Optional M905-M6	10.5-70 Vdc, 22-53 Vac
Consumption	5W w/o options, 8W max

DISPLAY	
Main Display	5 Digits, programmable colors (red, green, amber), 14mm high digits
Front Panel LEDs	4 threshold indicators, 4 function indicators [Tare, Peak, Valley, Hold]
Update Rate	20/s

A/D CONVERSION	
Resolution	±15bits
Read Rate	20/s

PROCESS/POTENTIOMETRIC SIGNAL CONDITIONING	
Input	±10Vdc or ±20mA
Resolution	1µV
Input Impedance	1MΩ or 12.1Ω
Sensor Excitation	5, 10 Vdc or 24 Vdc

STRAIN GAUGE SIGNAL CONDITIONING	
Input	±15mV, ±30mV, ±150mV
Resolution	1µV
Input Impedance	100MΩ
Sensor Excitation	10Vdc

| ACCURACY	
Temperature Coefficient	100ppm/° C
Warm Up Time	10 minuets

STANDARD FEATURES

Tare	Accomplished by operating front panel key or remote programming
Peak Max/Min	Detection and storage since last reset
Hold	Hold the current display value
Reset	Back to default TARE and PEAK values
PC-Configurable	Software supplied on request with options RS2 or RS4

DIMENSIONS & WIRING SCHMATICS

Panel
Cutout 92x45 mm

Mounting Clips

Sealing Ring
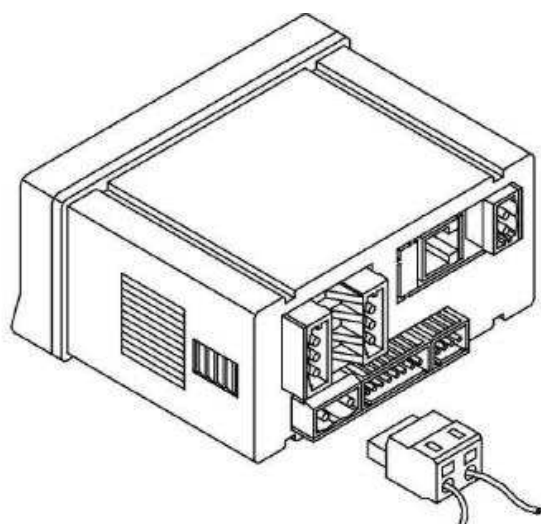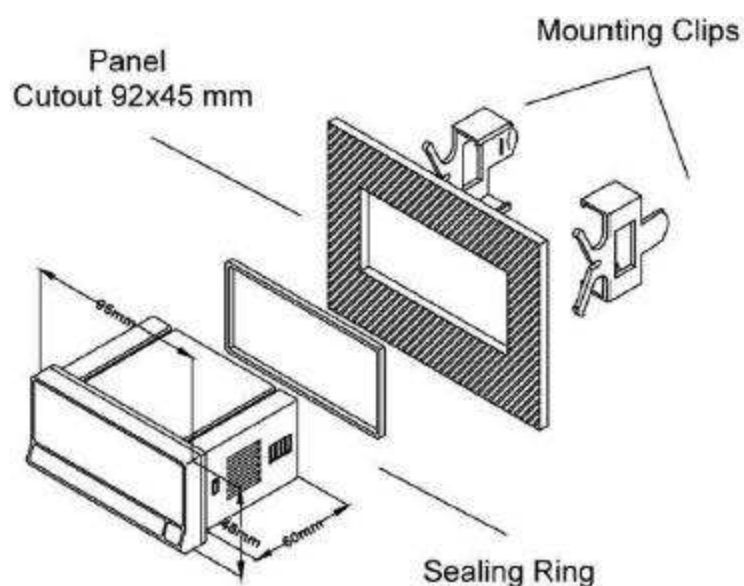
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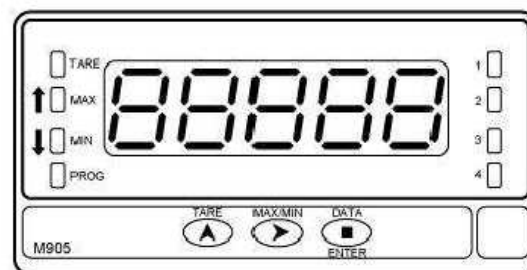
OPTIONS

M6	**:** Low Voltage
NMV	**:** Voltage output 0-10Vdc
NMA	**:** Current output 4/20mA
2RE	**:** 2 Threshold relays SPDT
4RE	**:** 4 Threshold relays SPST
4OP	**:** 4 NPN setpoint outputs
4OPP	**:** 4 PNP setpoint outputs
RS2	**:** RS232 interface
RS4	**:** RS485 interface
ABS	**:** Casing including front panel with on/off switch
LN	**:** Low pass filter 30Hz-3db (Only with ABS option)

ORDERING INFORMATION

```
M905—M6—/ABS
   |     |     |_____   Other Options (RS2, RS4, ABS, ..)
   |     |_____       Power Supply (None or M6)
   |_____       Model
```

ACCESSORIES SUPPLIED WITH DEVICE

EU Power Cord	ZELEACC001

OPTIONAL ACCESSORIES

Cordon secteur UK	ZELEACC002
Cordon secteur US/CANADA	ZELEACC003

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