



## Model no.: MA10..I

### **Description:**

The compact and robust Weight Indicator offers exceptional reliability, advance filtering, tested to perform under heavy interference and the most severe industrial environment. With large number of indicators being in use having negligible repair rate, it is customized for industrial weighing applications like Batching systems, Hopper/Tank weighing, Level by Weight, Crane weighing, Ladle weighing, Tundish /Turret weighing, Transfer car, Weighbridges, Platform scales etc. with highest demand for response speed and accuracy.

### **Key Features:**

- Powerful 32 bits ARM technology CPU makes it exceptional precise and responsive
- 24 bit Sigma-Delta A/D conversion with 8 million counts internal resolution
- IP 65 front panel protection
- Modular design for ease of maintenance
- Front panel mounting
- Advanced power supply 90-260V AC
- · All output ports optically isolated
- Smart adjustable analogue output
- Watchdog function making it failsafe and always reliable

# Weighing Indicator





We are specialized in all type of Industrial weighing (Like Tank/Hopper, Crane, Ladle, Belt/Screw Weighfeeders, Belt Weighers, Loss in Weighfeeders), Bag/Bin Filling and Batching systems, process equipments (Like Level Switches & Measurements, Vibro-Feeders, Screw Feeders, Mixer, Bucket Elevators, RALV, Vibrating Motors, all type of Valves & Actuators), Process Automation (PLC, DCS & SCADA) and Turnkey Projects.

### **Specification:**

INDICATOR POWER			
Power supply	90 - 260 V AC, 50 HZ (60 Hz) +/- 2%		
Power consumption	10 W		
A/D CONVERTER			
Туре	24-bit Delta-Sigma		
Analogue input range	0mV to 15mV		
Linearity	<0.001%FS		
Gain Drifting	10PPM/°C		
Minimum Sensitivity	0.1 μ V/d		
Conversion Rate	120/s		
Display Accuracy	1 / 30,000		
DISPLAY & KEYBOARD			
Display	6 digits, 7 segments, LED red		
Keyboard	4 membrane switches with beeping feedback		
Status Indicator	(3 LED green) Zero, Stable, Data		
CALIBRATION & WEIGHING FUNCTION	S		
Calibration	By test weight or by software calibration		
Digital Filter	Two Layer FIR filter with 9 selectable levels		
Weighing Functions	zero, zero tracking, auto-zero at power		
ENVIRONMENTAL			
Operating Temperature	-10°C to 50°C		
Storage Temperature	-25°C to 70°C		
Relative Humidity	90% R.H without dew		
IP Level	front panel 65		
LOAD CELLS			
Excitation	5V		
Load Cells	Drives 8 Nos Load Cells of 350Ω		
MECHANICAL DATA			
Dimensions & Weight	105×151×57 mm (L×W×H) weight approx.550g		
Standard Mounting	Panel Mount		
Enclosure	ABS front panel, cast aluminum body		
INSTRUMENT WITH ANALOGUE OUTPUT	Γ: MA10I + 4-20 mA		
Туре	Isolaed 16-bit D/A converter		
Accuracy	0.04%		
Voltage Output	0-10V		
Current Output	4-20mA / 0-20mA		
INSTRUMENT WITH MODBUS RTU/ASC	II INTERFACE: MA10I + RS232/RS485		
Serial Interface RS232/RS485	1200-57600 baud, bus capability up to 31 units		
Communication Mode	Continuous or requested or Modbus RTU/ASCII		

#### **Selection Matrix:**

Model No.	Analogue output	RS232 / RS485	Modbus RTU interface
MA10I + 4-20 mA	•		
MA10I + RS232/RS485		•	•

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