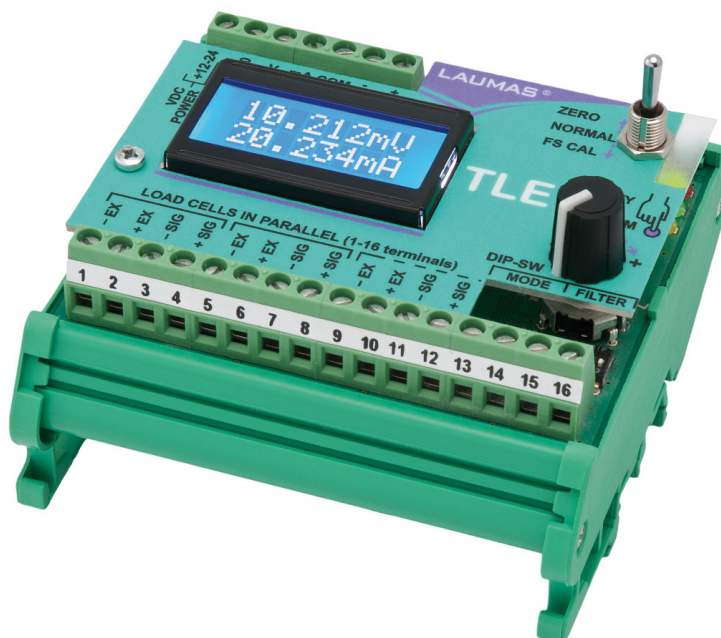




MODBUS RTU



DESCRIPTION

- Weight transmitter suitable for back panel mounting on Omega/DIN rail or junction box (on request).
- Dimensions: 90x95x60 mm.
- Backlit alphanumeric LCD display, two-line by 8-digit (5 mm height), visible area: 38x16 mm.
- 3-way selector switch, DIP-switch and control knob.

INPUTS/OUTPUTS AND COMMUNICATION

- Current or voltage 16-bit high-speed analog output (response time: 3 ms).
- RS485 serial port for communication via protocols ModBus RTU, ASCII Laumas or continuous one way transmission.
- 4 load cell dedicated inputs.

MAIN FUNCTIONS

- Connections to:
 - PLC via analog output;
 - PC/PLC via RS485 (up to 99 instruments with line repeaters, up to 32 without line repeaters);
 - up to 8 load cells in parallel by junction box.
- Zero and full scale adjustment without multimeter.
- Simultaneous display of the response signal of the load cells expressed in mV and the value of the analog output.
- Digital filter to reduce the effects of weight oscillation.
- Theoretical calibration (via keyboard) and real calibration (with sample weights).
- Tare weight zero setting.

CERTIFICATIONS

UL US UL Recognized component - Complies with United States and Canada regulations

EAC Complies with the Eurasian Customs Union regulations

UK CA Equivalent of the CE marking for the United Kingdom



TECHNICAL FEATURES

Power supply and consumption	12÷24 VDC ±10%; 5 W
Number of load cells • Load cells supply	up to 8 (350 Ω) - 4/6 wires • 5 VDC/120 mA
Linearity • Analog output linearity	<0.01% full scale • <0.01% full scale
Thermal drift • Analog output thermal drift	<0.0005% full scale/°C • <0.003% full scale/°C
A/D Converter	24 bit (16000000 points) - 4.8kHz
Divisions (RS485)	±200000 • 0.01 μV/d (with measurement range ±10 mV and sensitivity 2 mV/V) ±300000 • 0.01 μV/d (with measurement range ±15 mV and sensitivity 3 mV/V)
Measurement range	±39 mV
Usable load cells sensitivity	±7 mV/V
Conversions per second	300/s
Display range	±999999
Decimals • Display increments	0÷4 • x1 x2 x5 x10 x20 x50 x100
Digital filter • Readings per second	8 levels • 10÷300 Hz
Serial ports	RS485
Baud rate	2400, 4800, 9600, 19200, 38400, 115200 (bit/s)
Analog output	16 bit = 65535 divisions. 0÷20 mA; 4÷20 mA (up to 300 Ω) 0÷10 V; 0÷5 V; ±10 V; ±5 V (min 10 kΩ)
Humidity (condensate free)	85%
Storage temperature	-30 °C +80 °C
Working temperature	-20 °C +60 °C



Equipment to be powered by 12-24 VDC LPS or Class 2 power source

OPTIONS ON REQUEST

	DESCRIPTION	CODE
	IP67 polycarbonate box; dimensions: 170x140x95 mm (four fixing holes Ø4 mm; centre distance: 152x122 mm)	
	- transparent lid - transparent lid; 4+2 M16x1.5 cable glands - plugs - transparent lid; 4+2 PVC end-fittings for sheath	CASTL CASTLPG9 CASTLGUA
	ATEX II 3GD (zone 2-22) version - transparent lid; 4+2 M16x1.5 cable glands - plugs	CASTLATEX