

ELECTRO - CHEMICAL DEVICES, INC.

23665 Via Del Rio, Yorba Linda, CA 92687 USA

SPECIFICATION SUMMARY SHEET T23 RESISTIVITY TRANSMITTER

MEASUREMENT RANGE

0 to 20 megohms, fully expandable.

OUTPUT

4-20 mA or 20-4 mA, linear and expandable.
Up to a maximum of 3 outputs.

POWER REQUIREMENTS (with zero loop impedance)

Recommended 24 vdc
Maximum 50 vdc
Minimum 13.5 vdc

MAXIMUM LOOP IMPEDANCE (@ 24 vdc)

525 ohms for 4-20mA compliance on primary (channel 1) output (600 ohms @ 25.5 vdc); approximately 800 ohms on secondary outputs.

RELAY MODULE

2 each Form C, SPDT, dry contacts, 50/60 hz.
5 amps @ 24vdc
3 amp @ 24vdc inductive
Single channel T23: Both relays assigned to channel.
Dual Channel T23: One relay assigned to the primary channel, one relay assigned to the secondary channel
Relays can be field configurable as high or low relays. The deadband is fully adjustable.

DISPLAY

Menu driven, 32 character alphanumeric, Supertwist LCD.
The main menu simultaneously displays (1) process identity (2) process value (and engineering units), (3) percent output, (4) temperature in °C.

ENCLOSURE

NEMA 4X, weatherproof.

SHIPPING WEIGHT

Standard T23: 2 lbs (0.91 kgs)

ACCURACY

+/- 0.10% of full scale

SENSITIVITY

+/- 0.10 mV

LINEARITY

+/- 0.05% of full scale

STABILITY

+/- 0.2% per year @ 0°C to 100°C

RESPONSE TIME

1 second to reach 90% of the change.

REPEATABILITY

+/- 0.10 mV

OPERATING TEMPERATURE

-4°F to +158°F (-20°C to +70°C)

TEMPERATURE COMPENSATION

Automatic, -30°C to +140°C, RTD. Adjustable slope.
Accuracy within +/-0.1°C over a 0°C-100°C span.

50/60 Hz NOISE REJECTION

Greater than 70 db

INPUT/OUTPUT ISOLATION

Maximum 300 volts between process input and any 4-20 mA output (single and multiple channel outputs). No isolation between inputs on multiple channel units.

CALIBRATION

Auto Buffer Calibration

Allows the definition of one buffer point, saved in memory during initial start-up. This allows subsequent span buffer calibrations with only 2 keystrokes.

Temperature Trim

Allows for compensation for any differences in RTDs by programming the offset into the transmitter.

Temperature Slope

Allows for adjustment of the slope from -10% to 0% to compensate for temperature slope changes due to changes in water purity.

Temperature Display

Temperature is displayed in °C.

Display Contrast

Fully adjustable for ambient lighting conditions.