

4-wire 4.00 - 20.00 mA output

CONDUCTIVITY/TDS TRANSMITTER

Model : TRCD-431

ISO-9001, CE, IEC1010



Lutron

LUTRON ELECTRONIC

The Art of Measurement

4-wire 4.00 - 20.00 mA output

CONDUCTIVITY/TDS TRANSMITTER

Model : TRCD-431

FEATURES

* Build in temperature sensor, ATC (auto temperature compensation).
* 1.413 standard solution are standard accessories.
* 4-wire installation.
* Linear current output (4.00 - 20.00 mA)
* Easy installation and connection.
* Conductivity range 1 : 0 to 200 μ S.
* Conductivity range 2 : 0 to 2.000 μ S.
* Conductivity range 3 : 0 to 20 mS.
* TDS (Total Dissolved Solids) range 1 : 0 to 132 ppm.
* TDS (Total Dissolved Solids) range 2 : 0 to 1320 ppm.
* TDS (Total Dissolved Solids) range 3 : 0 to 13200 ppm.
* Power supply by DC 9 ~ 30 V .
* Available for wide applications, such as aquarium, beverage, fish hatcheries, food processing, photography, laboratory, quality control, school & colleges, swimming pools, water conditions.

General Specifications (23 $\pm$ 5 $^{\circ}$ C)

Conductivity Probe	The carbon cell type probe
Measurement & Range	Conductivity range 1 : 0 to 200 μ S.
	Conductivity range 2 : 0 to 2000 μ S.
	Conductivity range 3 : 0 to 20 mS.
	TDS (Total Dissolved Solids) range 1 : 0 to 132 ppm.
	TDS (Total Dissolved Solids) range 2 : 0 to 1320 ppm.
CD Calibration	TDS (Total Dissolved Solids) range 3 : 0 to 13200 ppm.
	1.413 mS points (15.30 mA)
Accuracy (23 $\pm$ 5 $^{\circ}$ C)	Conductivity $\pm$ (3% F.S. + 1d) TDS $\pm$ (3% F.S. + 1d)
Analog output	Analog output: 4 to 20 mA. * linear for range.
Loop impedance	Max. 200 Ω @24 V DC.
Power supply	Power 9 to 30VDC@200 mA. * Ripple < 2.5% (Isolated)
Operation Temp.	0 $^{\circ}$ C to 70 $^{\circ}$ C .
Operation humidity	Max. 85% RH.

Electrical Specifications (23 $\pm$ 5 $^{\circ}$ C)

A. CONDUCTIVITY

RANGE	Measurement	Resolution	Accuracy
2000 μ S	0 to 200 μ S	0.1 μ S	$\pm$ (3% F.S. + 1d)
2000 μ S	0 to 2.000 μ S	1 μ S	*F.S. -Full scale
20 mS	0 to 20.00 mS	0.01 mS	

* Temperature Compensation :
Automatic from 0 to 60 $^{\circ}$ C , with temperature
compensation factor variable between 0 to 5.0% per $^{\circ}$ C
* mS -milli Simens * μ S - micro Simens * 23 $\pm$ 5 $^{\circ}$ C

B. TDS (Total Dissolved Solids)

RANGE	Measurement	Resolution	Accuracy
2000 ppm	0 to 132 ppm	0.1 ppm	$\pm$ (3% F.S. + 1d)
2000 ppm	0 to 1320 ppm	1 ppm	*F.S. -Full scale
20000 ppm	0 to 13200 ppm	10 ppm	

* Temperature Compensation :
Automatic from 0 to 60 $^{\circ}$ C , with temperature
compensation factor variable between 0 to 5.0% per $^{\circ}$ C
* ppm - parts per milli * 23 $\pm$ 5 $^{\circ}$ C