

ConsoliDator 4 MULTI-CHANNEL CONTROLLER



ConsoliDator Common Features

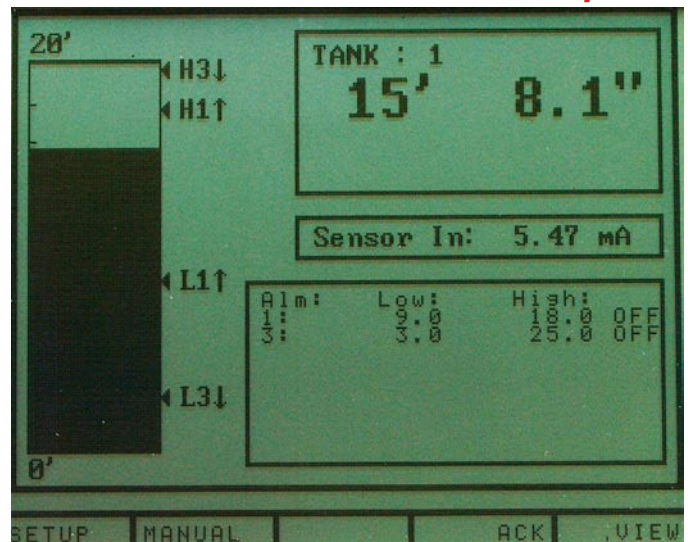
- Multiple screens show everything
 - Master screen shows all inputs
 - Individual screens for each input
 - Multiple setup & programming screens
- Easy on-screen programming
- Panel or flush mounting
- Easy to read LCD screen
 - Visible in direct sunlight
 - Backlit for dimly lit areas
- Modbus RTU communications
- Transient voltage protection

Your Local Distributor is:

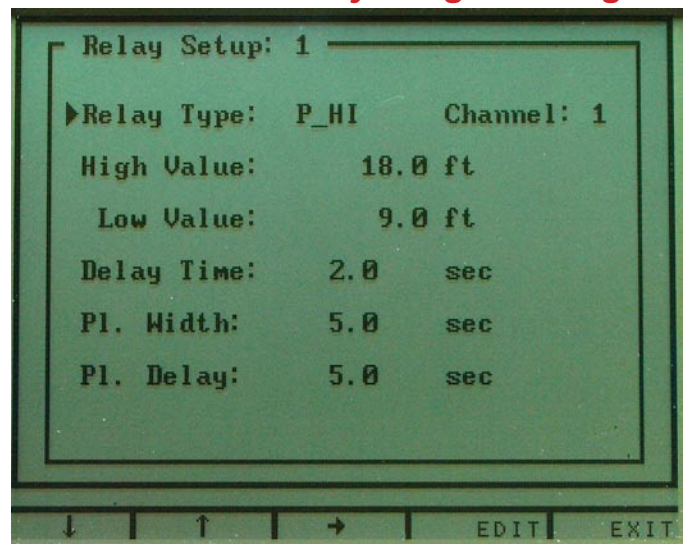
ConsoliDator 4 Specific Features

- Four 4-20 mA inputs
- Four pulse inputs
- Four digital inputs
- Four 4-20 mA outputs
- Four relays

Individual Screens for Each Input



On-Screen Relay Programming



PRELIMINARY

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SPECIFICATIONS

Except where noted all specifications apply to operation at +25°C

General

Display: LCD; 4.75" x 4.50" (120 x 114 mm) backlit
Enclosure: Painted steel, general purpose
Programming method: Five front panel buttons
Power: AC: 90-264 V, 50/60 Hz, 20 VA; DC: 8-30 V, 15 W
Lightning Protection: Analog inputs have chokes & TVSSs. Power inputs have MOVs and are fused.
Mounting: Panel or flush models
Connections: Removable screw terminals
Dimensions: (W x L x H)
 Flush Mount: 7.60" x 7.0" x 2.25" (193 x 175 x 57 mm)
 Panel Mount: 8.60" x 7.0" x 2.25" (218 x 175 x 57 mm)
Weight: 3.75 lbs (3.18 kg).
Environmental:
 Operating Temp Range: -30 to +50°C (-22 to +122°F)
 Relative Humidity: 0 to 90% non-condensing
Warranty: 1 Year

Screen Displays

Numeric Display: Six digits, +/-999999 or feet & inches
Engineering Units: ppm, gal, M, lbs, g/h, psi, ozs, ft, mA, °C, °F, f&i, %, or user definable
Bargraph: Ten segments
Numeric & Bargraph Screen:
 Numeric Displays: Eight (user selectable)
 Bargraphs: Eight (user selectable)
Numeric Only Screen:
 Numeric Displays: Eight
 Bargraphs: None
Individual Inputs Screen:
 Numeric Display: One (with sensor input value in mA)
 Bargraphs: One (with setpoint markings)
 Relay Status: Low & high values and status

Process Inputs

Number: Four
Input: 4-20 mA
Accuracy: ± 0.0002% of reading, ± 1 count
Short Circuit Protection: Current limited to 40 mA max.
Transmitter Supply: 24 VDC ± 1 V @ 20 mA per input

Digital Inputs

Number: Four
Input Types:
 1. NO or NC Switches: External excitation not required
 2. Open Collector Transistor: Open circuit voltage is approximately 5 VDC
 3. Logic Levels: LO = 0 to 1 VDC, HI = 2.5 to 12 VDC
 input impedance: 240 Ω

Pulse Inputs

Number: Four
Input: 100 mV to 15 V_{P-P}; 1 Hz to 10 kHz
Accuracy: ± 0.0002% of reading ± 1 count

Relays

Type: SPDT (Form C) with built in MOVs
Number: Four
Rating: 10 A @ 120 VAC resistive load. 1/3 HP @ 120 VAC for inductive loads. AC loads need a minimum of 50 mA.
Assignment: Any relay may be assigned to any channel
Action: Any relay may be programmed for high or low
Deadband: 0-100% adjustable
Reset: Automatic or manual
Alternation: User programmable for any relay
Duty (hours): Amount of time relay has been active
Duty (cycles): Number of times relay has transferred
Time Delay: 0-999 sec, on and off delays; programmable
Pulse Output: Any relay can be setup for a scaled pulse output from the pulse input.
Manual Override: Any relay may be turned on or off via front panel push button
Trouble or Summary Relay: Any relay may be configured as a summary relay that will engage if any of the following occurs: CPU failure, loss of power, loss of transmitter input, transmitter is out of acceptable range, or if any other non-summary relay is engaged.

4-20 mA Analog Output

Number: Four
Assignment: Any process or pulse input
Accuracy: ± 0.05% of reading (± 0.002 mA)
Output Loop Resistance: 0 to 300 Ω, 12 VDC minimum
Isolation: 500 V input-to-output

Modbus

Type: RS232 Modbus RTU
Baud Rate: 300 to 38400
Data: 8 bits
Parity: No
Stop bit: 1
Address: 1 to 254
Transmit Delay: Programmable; 0 to 99 ms

ORDERING INFORMATION

Model	Description	Mounting
PD940-8K8-15	ConsoliDator Multi-Channel Controller	Flush
PD941-8K8-15	ConsoliDator Multi-Channel Controller	Panel

LDS940-9_X02

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