

Dynisco **UPR900** **Process Indicator**

1/4 DIN Panel Display
of Pressure and/or
Temperature or
Differential Pressure



Features

- Graphical/text LCD Display with color change LED backlight on alarm (red/green)
- Graphical trend view of process, alarms & events as standard
- Easy to use Setup Wizard
- Display of differential pressure is available
- USB port option for access to configuration and log files
- Data logging option logs process values, set points and alarms to .csv file for use with spreadsheets
- Modbus RS-485 and Modbus TCP Ethernet supported
- BlueControl configuration and commissioning software option
- Display pressure, temperature, or even differential pressure
- Optional second input/output for cost-effective single instrument
- Analog retransmission of process variable allows signal to be sent to other devices
- Configure locally or remotely by optional Modbus RTU

Description

The UPR900 is a compact 1/4 DIN process indicator. The UPR900 can display your choice of engineering units related to a selectable range of input types. Add an optional secondary input for an all-in-one display of polymer melt pressure and temperature. The secondary input can be strain gauge to indicate differential pressure measurement. The UPR900 includes two standard assignable alarms with the option to add a 3rd. The LCD graphical display allows for easy reading of trending graphs with user selectable monochromatic configurations.

The UPR900 is easily field-configured, can be programmed remotely via optional Modbus RS-485 or can be programmed with BlueControl software.



Specifications

PERFORMANCE CHARACTERISTICS

Instrument Type: Digital, panel-mount PID closed loop controller
Display: 160 x 80 Monochromatic Graphical LCD with backlight

Accuracy:
Thermocouple : ±0.1% of full range, ±1LSD (±1°C for internal CJC if enabled)
DC Linear : ±0.1% of full range, ±1LSD
Sampling Time: 50mS, typical

INPUT

Input: Strain gauge, Thermocouple or linear (Vdc, mA)
Strain Gauge: 350 to 5000Ω, 1.4 to 4mV/V, excitation 10V ±7%
Linear Input: 0 to 5Vdc and 0 to 10Vdc, 0 to 20mA and 4 to 20mA
Input Signal: -25 to 125% full scale (approximately -10mV to +50mV)
Input Impedance: <10Ω for linear current input >165kΩ for linear voltage input
Shunt Calibration: With or without resistor (40 to 100%)
Digital: 4 programmable voltage-free contact closure

ALARM OUTPUTS

Alarm Type: SPST 2A max @ 240Vac resistive load Dual relays have a shared common
Alarm Number: 3 standard
Alarm Update Time: 100mS, typical

OUTPUTS

Type (Retransmission): 0-5Vdc and 0-10Vdc, 0-20mA and 4-20mA
Type (Control): 0-5Vdc and 0-10Vdc (2% under/over drive) 0-20mA and 4-20mA
Resolution: 15 3/4 bit
Accuracy: ±0.1% of output span (mA @ <500Ω, V @ >500Ω)

CONTROL FUNCTION

Type: Adaptive auto-tuning algorithm
 Serial Communication Interface
 Isolated RS-485
Protocol: Modbus RTU

MECHANICAL & PACKAGING CHARACTERISTICS

Termination: Screw terminals on rear
Front Panel: IP65 with gasket (IP65 front USB connector)
Operating Temp: 32 to 122°F (0 to 50°C)
Storage Temp: -4 to 158°F (-20 to 70°C)
Humidity: 85% relative humidity, non-condensing
Weight: 1.43 lbs. (650g)

APPROVALS & CERTIFICATIONS

CE Mark: Self-certified to applicable standards
Agency Approvals: UL

POWER SUPPLY (MAINS)

Input Power
Mains Version: 100 to 240Vac, 50/60Hz switching
Low Voltage Version: 20 to 48Vac 50/60Hz 15VA or 22 to 65Vdc 12W 24Vac/dc option available

Power Consumption: 15VA, max
Transmitter Power Supply: 24Vdc into 400Ω min, 60mA drive for 2-or 4-wire mA transmitters

Ordering Guide

UPR900 -X-X-X-X-X-X-X (Includes Retransmission)

