

OVERVIEW

The PC-3000XC controller is designed to operate up to 3 pumps in pump up or pump down applications. The controllers sequence pumps ON and OFF in response to a change in level input. The easy-to-read blue OLED display provides the operating status, featuring fast and intuitive menu navigation and setup. The PC-3000XC provides for advanced communication functionality for integration to open architecture telemetry/SCADA systems.

FEATURES

- Configurable front panel; no programming software required
- Red LED indicates an active alarm
- Green LEDs indicate pumps required
- Multiple alternation/sequence configurations
- High visibility blue OLED backlit 64x256 pixel display
- Process/level displayed digitally and via bar graph
- · Communications established indicator
- Built in pump failure detection
- Sensor failure detection with backup float switch to activate pump control override timer and alarm
- User selectable process/level units
- Level simulation, I/O, and relay output status screens to aid in setup and system troubleshooting
- · Continuous level monitoring, 4-20 mA level sensor input
- Flow monitoring (volumetric)
- Modbus communication via RS-485 comm port
- Station design data

- RS-485 terminal connections
- Modbus RTU protocol
- Designed to work with Pump Watch™
 Express gateway remote monitoring
 system (default)

Advanced Communication

Full bidirectional communication SCADA interface and access to Modbus register addresses to include:

- · Configurable node address
- Configurable baud rate
- Read/Write access to level set points
- Remote LEAD Pump selection
- Remote Pump Start
- Remote Pump inhibit
- Pump ETM and cycle counts
- Alarm counts
- And more





CONTROLLER WITH REMOTE COMMUNICATION

SPECIFICATIONS

Pump Control and Monitoring:

- Automatic pump alternation: Simplex, Duplex or Triplex
- · Pump alternation selection
- Pump over temperature monitoring
- Pump seal fail monitoring
- · Pump run monitoring
- Pump fail to start monitoring
- · Low-level and high-level alarms
- Flow monitoring (volumetric): inflow & discharge

System:

- Pump cycle counter
- · Pump elapsed time meters
- Alarm counts
- Level simulation mode
- Selectable level measure units

Electrical:

- 24 VDC supply power (19-28 VDC, 325 mA max)
- · Optional battery backup
- 6 Relay outputs (120 VAC, 3 A max)
- 4-20mA analog level input, 14-bit resolution
- 4-20 mA scalable analog level output 12-bit resolution
- 11 Digital Inputs (12 VDC, 16mA each

Serial Communication Port

- RS-485 3-wire
- Modbus RTU protocol
- Fixed: 1-stop bit, no parity, and 8 data bits
- Adjustable baud rate: 1200, 2400, 4800, 9600, 19,200, and 38,400
- Adjustable node address: 1-247

Mechanical:

- Overall dimensions:7.2" x 5.3" x 2.0"
- Screen dimensions: 2.7" diagonal
- · Panel Mount with 4 mounting holes
- Pluggable terminal blocks
- Fits legacy PC-3000 installations

Environment:

- Operating temperature:
 0 to 50°C (32 to 122°F)
- Storage temperature:
 -20 to 60°C (-4 to 140°F)
- Relative humidity (RH):
 5% to 95% (non-condensing)
- Indoor rated: for use indoors or mounted inside of an outdoor rated enclosure

