



WS3500

Monitoring and Control Platform



WS3500

With superior provisioning capability, the WS3500 is a modular platform providing a custom approach to alarm collection and distributed reporting. Leveraging a real-time OS and architecture, the WS3500 ensures unsurpassed scalability, performance and reliability, bringing intelligent alarming and situational awareness to the entire organization.

For over 30 years, Westronic has provided the telecom industry with an extensive portfolio of alarm management solutions suitable for any environment. The WS3500 is the flagship platform and provides an unparalleled modular hardware and software approach to site tailored solutions.

Alarm aggregation, protocol mediation and distributed reporting is simple to configure and manage bringing a new level of monitoring capability to network operations. With backwards compatible I/O terminations, migration from serial based legacy RTUs to the latest IP centric solutions, becomes easy and cost effective.

Features and Benefits

Customizable Platform

- Modular approach
- Distributed reporting
- Concurrent protocol mediation
- Expandable I/O modules
- Many optional media interfaces
- Easily upgrade from legacy products

Superior Performance

- QNX real-time OS running on a 32 bit Microprocessor
- Software abstraction eliminates communication synchronization issues
- Systems with over 50,000 alarm points have been deployed.
- TL-1 protocol routing

Intelligent Alarm Management

- Rules-based correlation application
- Alarm consolidation with derived alarms
- Customizable ancillary alarm information
- Remote access and alarm viewing
- Specialized system alarms

Provisioning Made Easy

- Centralized offline configuration and firmware management tool
- Excel based bulk loading
- On-board protocol analyzer



WS3500 Specifications

Main Chassis

CPU:	32 bit, 300 MHz Vortex86SX
Power (V):	Dual 48VDC
Dimensions (HxWxD):	3.5"x17.6"x10.3" (8.9 cm x 44.7 cm x 26.2 cm)
Weight:	15 lbs. (6.8 Kg)
Available Module Slots:	2 which may be used for Serial Expansion or Discrete I/O
Expansion Interface:	The architecture supports up to three expansion chassis

Expansion Chassis

Available Module Slots:	2
Power (V):	Dual 48VDC
Dimensions (HxWxD):	3.5"x17.6"x10.3" (8.9 cm x 44.7 cm x 26.2 cm)
Weight:	15 lbs. (6.8 Kg), 18 lbs (8 kg) maximum packaged

Discrete I/O Module

Discrete Inputs:	64
Sampling Rate:	10 Hz
Input voltage:	Referenced to -48VDC
Input current:	0.74 mA – 3.1 mA per point
Protection:	Sustain maximum transient voltages of 15 kV per Telcordia GR1089
Logic Levels:	0 [Off] -15VDC through -60VDC 1 [On] -7VDC through +5VDC
Discrete Outputs:	8
Relay Type:	SPDT Form C
Operation Types:	Momentary, latched, or flash
Contact Ratings:	1.0 Amp at 30VDC 0.5 Amps at 125VAC 30 Watts (maximum) switching power

Analog Input (WS-ARM/1)

Channels:	8 total 6 for 4 – 20 mA or bipolar 100mV operations (configurable) 2 for 0 – 60VDC operation
Temperature and Humidity:	1 onboard module expandable to a total of 4

Communications

Main Chassis Serial Ports:	1x user configurable RS232 and 1x RS232 Craft port
Expansion Serial Ports:	0, 8, 16, 24 RS232 ports (individually configurable to RS485)
Expansion Modems:	0 or 1 modem (RJ11)
Ethernet:	1, or 2 Ethernet ports (10BaseT - RJ45)
E2A Specific:	8x RS232 or up to 4x 202T and 4x RS232 collection channels
Miscellaneous:	Web-based, Telnet, TL-1, SSH management interfaces

General Specifications

Storage Temperature:	-40°F to +158°F (-40°C to +70°C)
Operating Temperature:	-4°F to +104°F (-20°C to +40°C)
Relative Humidity:	5% to 90% non-condensing

Firmware

Southbound Protocols

- TABS (Serial and IP)
- TBOS
- E2A (Synchronous and IP)
- DS5PA
- TL-1 (IP)

Northbound Protocols

- SNMP (includes re-Trap method to resend current alarms)
- TL-1
- TABS (Serial and IP)

Miscellaneous

- Total history is 1024 records with a First In, First Out rollover scheme.
- Correlation application
- Derived alarms
- Firmware version query and download
- Configuration version query, upload and download

Certifications and Standards

- NEBS 3 Certified

Warranty and Support

- Two Years Parts and Labor
- Unlimited support