Device Servers
Serial to LAN

XPress DR-PB Device Link

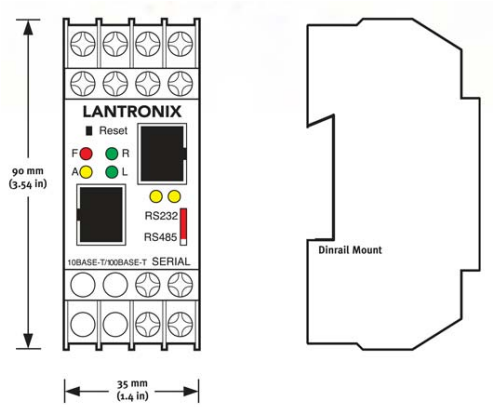
LANTRONIX® RoHS

Remotely Configure, Program, Monitor, and Manage: PLCs, drives, process controls, power monitoring equipment, barcode scanners, and other factory floor serial devices

The XPress DR and XPress DR-IAP Device Servers enable virtually any industrial device with serial capability to be connected to a new or existing Ethernet network. By encapsulating serial data and transporting it over Ethernet, the XPress DR/DR-IAP establishes virtual serial links over Ethernet. By using these units, limited-distance, point-to-point, direct serial connections can now be extended within the plant, throughout the facility, or across the global enterprise.

When used in conjunction with an OPC server, most Windows® based HMI, SCADA, and PC-based control applications have full access to information in the connected device. Existing COM-port based Windows® applications can access network-enabled devices using our Com Port Redirector software. Redirector software allows the creation of virtual serial ports, which can be mapped to the remote device servers over Ethernet and connected to the XPress DR and XPress DR-IAP.

The XPress DR-IAP installable communication drivers allow specific support for various industrial communication protocols. With native support for these protocols, devices that previously allowed only one connection can now support multiple connections simultaneously.
Flexible configuration options allow the unit to be set up locally using the serial port, or remotely over Ethernet using Telnet or a common web browser.
Included Windows® based configuration software simplifies the process of installing communication drivers and configuring them for use with attached devices. Flash memory provides for maintenance-free, non-volatile storage, and allows future system upgrades.

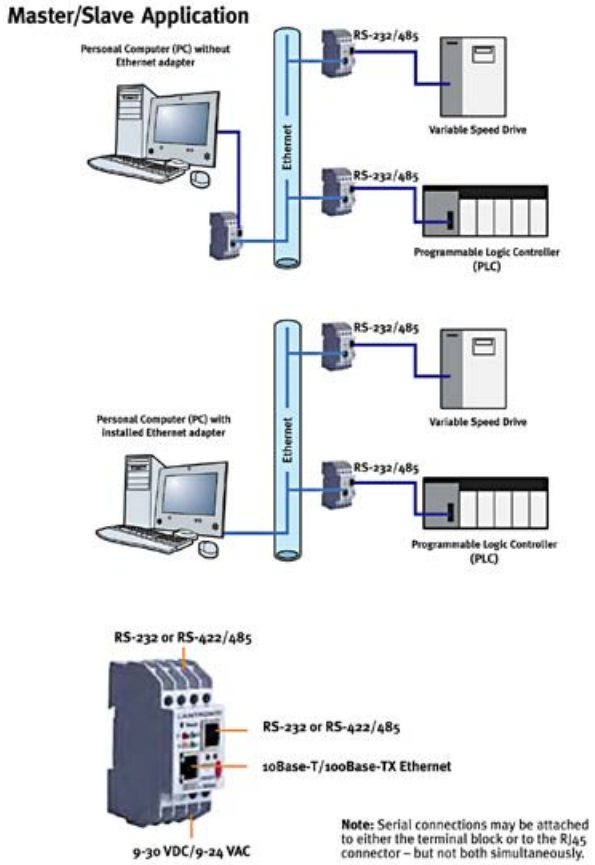


Packaged in a rugged DIN-rail mount case and featuring 2000V galvanic isolation, 1500V Ethernet isolation, a wide 0° to 60°C operating range, and a 9-30VDC/9-24VAC power input, the XPress DR and XPress DR-IAP are ideal for any industrial application.

Features

- Connect enterprise (ERP, MES) systems to factory floor devices without disturbing existing control networks
- Allow remote firmware upgrades, saving money and time from manual upgrades
- IAP version supplies many industrial communication protocols
- Configurable serial interface supports RS-232, RS-422, or RS-485
- 10Base-T/100Base-TX Ethernet (RJ45)
- Isolated serial and Ethernet ports
- FM-approved for hazardous locations Class I, Div.2
- RoHS compliant

Specifications: see next page



Specifications	
Serial Interface	Interface: RS-232, RS-422, or RS-485. Connector: Screw terminals or RJ45 Data Rates: 300 to 115,200 bps. Characters: 7or 8data bits. Parity: odd, even, none Stop Bits: 1or 2. Flow Control: Software: XON/XOFF. Hardware: RTS/CTS Installable Serial Protocols (XPress OR-IAP only)
Network Interface	Standards: ARP, UDP/IP. TCP/IP, ICMP, SNMP, BOOTP, DHCP, TFTP, Telnet and HTTP Interface: 10Base-T/100Base-TX Ethernet. Connector: RJ45 Installable application layer protocols (XPress DR-IAP only)
Indicators (LED)	Ready, Fault/Configuration, Activity, link, Serial Transmit Data, Serial Receive Data
Management	SNMP. serial, Telnet, and HTTP (web browser)
Isolation	Ethemet: 1500 Vrms. Serial: 2000 Vrms
Power	Input: 9to 30VDC/9-24VAC, 3W maximum. Connector: Screw terminals for power and ground
Environmental	Temperature: 0° to 60°C. Humidity: 20% to 90% RH, non-condensing (Operating)
Form Factor	Mounting: DIN-rail (35 mm). Material: High-impact plastic. Dimensions: 60 x36 x90 mm
Software	Included Windows® 95/98/ME/NT12000-based configuration software simplifies initial setup
Agency Approvals	Ul, CSA, TUV, FCC, CE
Warranty	1-Year Limited
Partnr.	
XSDRSN-02 XSDRIN-02	XPress-DR: standard part XPress-DR-IAP with installable industrial protocols Industrial Device Server, DIN-rail mounting, serial interface (RS-232, RS-422, RS-485 - terminal block or RJ45), 1OBase-T11OOBase-TX Ethernet, diagnostic lEDs, 9VDC to 30VDC power input, CO-ROM with configuration tools, installable communication drivers, and Installation Guide.

Specifications are subject to change without notice.

Our Websites

- mulder-hardenberg.com
- mh-hminterfaces.com
- mh-fiberoptics.com
- mh-labeling.com
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XPress DR+ Industrial Device Server

LANTRONIX®

Network All Your Industrial Equipment – Quickly and Easily!

For demanding factory applications, Lantronix introduces the XPress-DR+™ industrial device server. The XPress-DR+ enables users to remotely configure, monitor and control PLCs, drives, motion controllers, power equipment, barcode scanners and other serial devices from anywhere over the Net.

A versatile, powerful tool for remote management of automation and assembly/packaging equipment at manufacturing sites, automated distribution centers, refinery plants – or any industrial setting – it provides complete access and control of virtually any type of equipment with a serial port!

Extending Network Connectivity with SwitchPort+

Supporting two serial ports and two 10/100 Ethernet ports, the XPress-DR+ features patent-pending SwitchPort+™ technology which enables multiple industrial serial devices to be daisy chained (cascaded) from a single network backbone connection. SwitchPort+ combines Lantronix advanced device server technology with Ethernet switching technology to provide a robust and reliable method for networking equipment.

Saves time and money by avoiding unnecessary cable runs and eliminates serial cable distance limitations.

Standards Based Communications

Using an open Ethernet architecture as a standard for device communication provides the flexibility to communicate to virtually any type of industrial equipment.

Additionally it enables new equipment to be quickly and easily incorporated into existing network system designs.

When used in conjunction with an OPC server, most Windows® based HMI, SCADA and PC-based control applications have full access to information in the connected device. Existing COM-port based Windows applications can access network-enabled devices using Lantronix Com Port Redirector™. This specialized software creates virtual serial ports, which are mapped to the XPress-DR+ over Ethernet.

Thrives in the Industrial Environment

The XPress-DR+ meets the demanding, complex industrial environment head on. Packaged in a rugged DIN-rail mount case, it's equipped with isolated serial and Ethernet ports and screw terminal connectors for serial and power. It supports industrial protocols such as Modbus TCP, Modbus ASCII, Modbus RTU and DF1, and is FM-approved for hazardous locations Class 1, Div. 2.

- 15KV serial ESD protection and 2.5KV Ethernet isolation protects circuitry from overcurrent conditions
- Wide -40°– 70°C operational temperature range
- 9-30 VDC and 9-24 VAC power input options

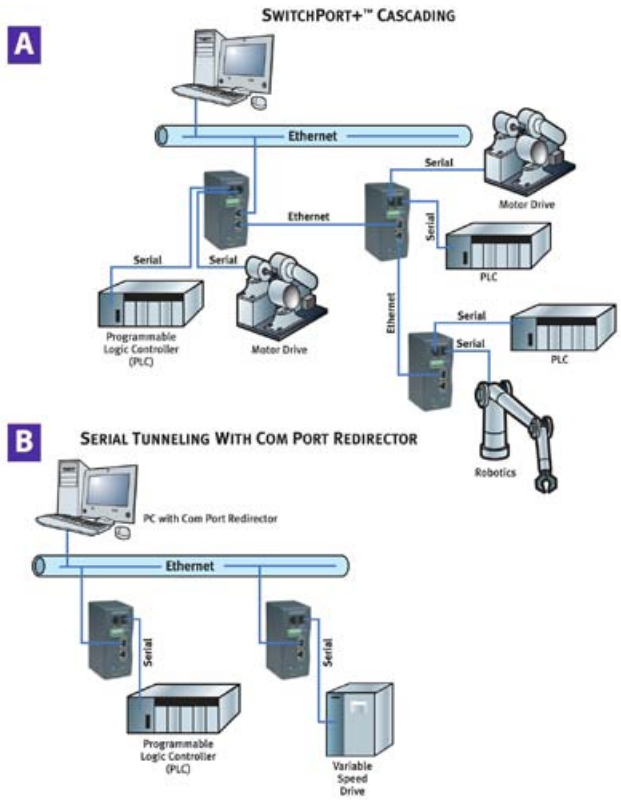
Configuration Flexibility

Flexible configuration options allow the unit to be set up locally using the serial port, or remotely over Ethernet using Telnet or browser. The included DeviceInstaller™ software simplifies the process of installing industrial protocols and configuring them for use with attached devices. The CPU's flash memory provides maintenance-free, non-volatile storage and easily accommodates future system upgrades. Complete with an auto MDI/MDIX Ethernet interface, the XPress-DR+ is a powerful device communication solution that's perfect for your most demanding industrial applications.

Features

- Cascade multiple devices from a single network connection
- Connects enterprise systems to non-networked factory floor devices
- Enables remote firmware upgrades, saving time and money
- Supports industrial protocols
- Maximizes flexibility with an internal 2-Port 10Base-T/100Base-TX Ethernet switch
- 15KV serial ESD protection and 2.5KV Ethernet isolation
- Wide -40°– 70°C operational temperature range
- RoHS compliant
- RoHS compliant

Specifications: see next page



Specifications	
Serial Interface	2RJ45 RS-232 Serial Ports. Baud rate selectable from 300 to 230 Kbps 1screw terminal RS-422/485 interface on Serial Port 2 (2 and 4-wire support) LED indicators for TXD and RXD activities
Serial Line Formats	Characters: 7or 8data bits. Stop bits: 1or 2. Parity: odd, even, none
Flow Control	Hardware: RTS/CTS. Software: XON/XOFF
Modem Control	DTR, DSR
Network Interface	2RJ4510Base-T/l00Base-TX Ethernet ports. Embedded, unmanaged, fully compliant 802.3u non-blocking Ethernet switch. Store and forward architecture with 1KMAC address lookup table. Automatic MDI/MDI-X crossover. Full duplex IEEE 802.3x flow control. Half duplex back pressure flow control. IEEE 802.1d spanning tree
LED Indicators	TX/RX activity per serial. Link/Activity per Ethernet port. Power/System OK
Management	Internal web server (standard tunneling firmware only). SNMP (read only). Serial login. Telnet login. DeviceInstaller software
Isolation	8KV direct contact, 15KV air discharge, ESD protection on all Serial ports (IEC 1000-4-2, IEC 61000-4-2). 2KVAC / 2.8K VDC galvanic isolation between Power Input port to Ethernet ports (except Chassis ground). 2KVAC / 2.8K VDC galvanic isolation between Power Input port to Serial ports. Transient Voltage protection and ESD with max nonrepetitive surge current 800 Amp (8/20 µs) (IEC 61000-4-2). 2KVA / 2.8K VDC galvanic isolation between Ethernet ports (except chassis ground). 2KVA / 2.8K VDC galvanic isolation between Ethernet ports to Serial ports 40 A(5/50 ns) EFT protection (IEC 61000-4-4), 12A(8/20 µs) lightning protection (IEC 61000-4-5) on all Ethernet ports
Power	Removable screw terminal block connector 9-30 VDC or 9-24 VAC with chassis ground 2.3 Watts maximum
Environmental	Temperature: -40°C to +70°C. Humidity: 20% to 90% relative humidity, non-condensing
Protocols Supported	ARP, UDP/IP, TCP/IP, Telnet, ICMP, SNMP, DHCP, BOOTP, TFTP, and HTTP
Installable Industrial Application Protocols: ModBus TCP, ModBus ASCII/RTU, DF1 Multi-Master	
CPU	Lantronix DSTNI-EX 48 MHz clock, 256 KB SRAM Internal CPU Memory
Flash Memory	2MB Flash
EEPROM / Reset	2KB / Front panel recessed push button
Form Factor	Case: High-impact plastic case with integrated DIN Rail (35 mm) mount. IP30 enclosure rating Dimensions: (LxWxH): 88 x 57 x 123 mm, terminal blocks included. Weight: 0.21 kg
Agency Approvals	UL, CSA, FCC, CE, TUV, Click, VCCI
Warranty	2-Year Limited
Partnr.	
X5DR22000-01	XPress-DR+ two port industrial device server with dual switched Ethernet ports and industrial protocols

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Our Websites

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xDirect Device Server

LANTRONIX®

Network Connectivity for any Serial Device 'Right on the Wire'

xDirect™ is a sleek and compact Serial-to-Ethernet device server, providing quick and easy Ethernet connectivity to virtually any device or machine with a serial interface.

With an integrated Ethernet port and serial cable, multiple power options including PoE, and an industry-best five year warranty, xDirect provides a portable, extremely flexible, and highly affordable network connectivity solution.
xDirect comes with a built-in web server that enables users to access and configure the unit using a standard web browser on a PC, smartphone, or tablet from anywhere.
With plug-and-play simplicity, small form factor, multiple power options, and a robust device server application, xDirect provides the easiest and shortest path to network connectivity 'right on the wire'.

Features

- Complete Network Connectivity Solution
- Integrated 10/100 Ethernet Port and Serial Cable
- Complete Device Server Application with Full IP Stack and Web Server
- Space Saving Form Factor
- Serial Data Rate of up to 921.6 Kbps
- 128/192/256-bit AES Encryption
- Flexible Power Options including PoE
- Extended Temperature Range of -40° to 85°C
- 5-year Limited Warranty

Specifications: see next page

Specifications	
Serial Interface	Modes: RS232, RS422* or RS485* (2 and 4 wire support). Baud Rate: 300bps to 921.6 Kbps Characters: 7 or 8 data bits. Stop Bits: 1 or 2. Parity: Odd, even, more Modem Control Signals: DTR, DSR/DCD. Flow Control: XON/XOFF (software), CTS/RTS (hardware). **Available on xDirect485 & PoE models*
Serial Connectors	Single-port: DB9F (DCE Pinned)
Ethernet Interface	Interface: 10Base-T /100Base-T (Auto-sensing). Speed: 10/100 Mbps Connector: RJ45. Protocols: UDP, TCP, ARP, Telnet, ICMP, SNMP, DHCP, BOOTP, TFTP, Auto IP, HTTP, Telnet Com Port Control
Indicators (LED)	Power/Status, Link, Activity, Serial RX Activity & TX Activity
Processor	CPU: Based on DSTni-EX Enhanced 16-bit x86 Architecture. Memory: 256 KB SRAM, 1 MB Flash
Power	Input Voltage: 5V at mini-USB-B jack. Input Voltage: 5-15 VDC at DB9F pin 9 Power Consumption: 1.3W max w/o PoE, 2.0W max with PoE
Environmental	Operating Temperature: -40° to 85°C, non-PoE models, -40° to 70°C, PoE model Storage Temperature: -40° to 85° C Relative Humidity: 0% to 90% non-condensing
Form Factor	Dimensions (LxWxH): 86.6x30x29 mm. Weight: 0.068 kg
Included Software	Windows 7/Vista/XP/2008 Server/2003 Server (32-bit and 64-bit versions), DeviceInstaller™ configuration software, Com Port Redirector software and related utilities Configuration Options: Web Browser, Telnet Client, Serial Terminal
Security	128/192/256-bit AES Encryption
Isolation and Protection	Serial Port: 15 KV ESD protection on RS232 and RS422/485 transceivers Ethernet Port: 1500 VAC isolation shielded. PoE: 1500 VAC isolation
Regulatory Approvals	**Emissions:** FCC Part 15, Subpart B, Class B. EN55022, Class B. EN61000-3-2, EN61000-3-3. ICES-003 Issue 4. AS/NZS CISPR22 **Immunity:** EN55024. EN61000-4-2, EN6100-4-3, EN61000-4-4, EN61000-4-5, EN61000-4-6, EN61000-4-8, EN61000-4-11 **Agency Approvals:** UL 60950-1, 2nd Edition, CAN/CSA C22.2 No. 60950-1-07, 2nd Edition CE, VCCI, C-Tick, IEC 60950-1 2005, 2nd Edition
Warranty	5-Year Limited
Partnr.	
XDT2321002-01-S	xDirect232 Single Port RS232 10/100 Device Server, 100-240 VAC International Power Supply with Regional Adapters, RoHS
XDT4851002-01-S	xDirect485 Single Port RS232/422/485 10/100 Device Server, 100-240 VAC International Power Supply with Regional Adapters, RoHS
XDT10P0-01-S	xDirect PoE Single Port RS232/422/485 10/100 Device Server, No Power Supply, RoHS
Accessories 140-448-R 520-119-R	 Mini DB9M-M Gender Changer, Null Modem with Pin 9, RoHS Power Supply, 100-240 VAC, 50-60Hz, 5VDC 1A, Mini USB-B Right Angle, 4 Regional Adapters, Level V, RoHS

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Remotely Monitor, Manage and Control Industrial Equipment over the Net

The UDS1100-IAP is a rugged and powerful tool which enables users to connect, manage and control just about any piece of industrial equipment from virtually anywhere over Ethernet or the Internet. This single-port Device Server is a quick, simple and inexpensive way to bring the advantages of real-time or on-demand information access.

Standards Based Communications

Using an open Ethernet architecture as a standard provides the flexibility for equipment to communicate to virtually any type of industrial device. When used in conjunction with an OPC server, most Windows® based HMI, SCADA and PC-based control applications have full access to information in the industrial equipment networked by the UDS1100-IAP.

Extending Communications Across the Globe

Our approach to network-enabling devices is transparent to your attached equipment and software so you won't need to change the way you work. Using a method called serial tunneling, the UDS1100-IAP encapsulates serial data into packets and transports it over Ethernet. Serial tunneling can e done in multiple ways:

- Using Lantronix supplied Com Port Redirector™ software, Windows device applications not designed for network communications are re-directed to communicate to devices connected to the UDS1100-IAP.
- Connecting two UDS1100-IAP Device Servers configured to automatically talk to each other over the network creates virtual serial connections that can extend serial communications across a facility or around the world.

Built-in Web Server

The built-in web server enables users to access and configure the UDS1100-IAP from a standard web browser. Web pages enabling the UDS1100-IAP to be customized for unique applications can be built using Lantronix development tools. On-board Flash memory provides room for future system software upgrades and maintenance-free, nonvolatile web page storage.

Easy to Set Up and Use

The UDS1100-IAP can be set up locally through its serial port, or remotely using Telnet or a web browser. The included DeviceInstaller™ Windows-based configuration software simplifies setup and provides an easy way to:

- Assign IP & other network specific addresses
- Load custom web pages
- Enable web-based configuration of the Device Server
- Ping or query the attached device(s) over the network

UDS1100-IAP Industrial Device Server

LANTRONIX® RoHS

- View specific device data files
- Upgrade firmware
- Simplify process of installing industrial protocols

Complete with an auto MDI/MDIX Ethernet interface, the UDS1100-IAP is a powerful device communication solution that's perfect for your most demanding industrial applications.

Modem Replacement

In modem emulation mode, the UDS is used to replace dialup modems. The unit accepts modem AT commands on the serial port. It then establishes a network connection to the end device, leveraging network connections and bandwidth to eliminate dedicated modems and phone lines.

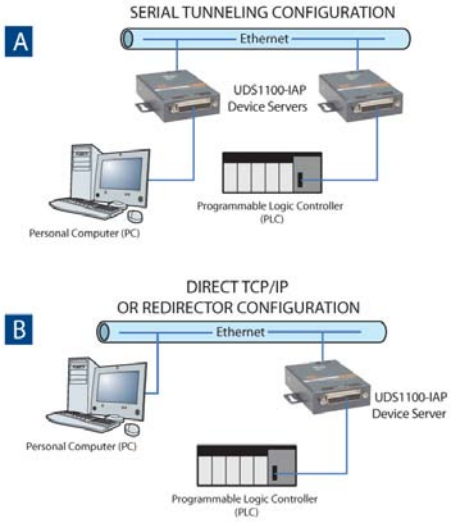
RoHS-compliant, the UDS1100-IAP meets Directive 2002/95/EC on the restriction of the use of certain hazardous substances in electrical and electronic equipment. If you're looking for a transparent, cost-effective, and scalable means to network-enable your industrial automation equipment, look no further than the UDS1100-IAP.

Features

- In minutes, securely connect factory floor devices to enterprise systems
- Access, monitor and control equipment over Ethernet
- Replace dedicated PCs and/or modem lines with fast and reliable Ethernet networking
- Supports RS-232, RS-422 and RS-485 communications
- Includes Modbus TCP, ASCII, RTU and DF1 protocols
- 15KV serial ESD protection
- Wide -40°– 70°C operating temperature range
- Environmentally-friendly RoHS and WEEE-compliant

Specifications: see next page

Sample Configurations



Specifications		
Serial Interface	Interface: Software-selectable RS232, RS422 or RS485 (2 and 4 wire support) Connectors: 1 DB25F DCE serial port Data Rates: Software-selectable baud rate from 300 to 230 KBaud Characters: 7 or 8 data bits. Parity: odd, even, none. Stop Bits: 1 or 2 Control Signals: CTS/RTS (Hardware). Flow Control: XON/XOFF (Software)	
Network Interface	Interface: 10Base-T/100Base-TX Ethernet port. Software selectable Ethernet speed 10/100/Auto Software selectable Half/Full/Auto duplex. Connector: RJ45 Standards: ARP, UDP, TCP, ICMP, Telnet, TFTP, AutoIP, DHCP, HTTP, SNMP, TCP, UDP, and Telnet,TFTP	
Indicators (LED)	Power, 10/100 Link/Activity (green), 100/100 Link/Activity(green), Diagnostics (red), Status (green)	
Processor	CPU: Lantronix DSTNI-EX 48 MHz clock. Memory: 256 KB zero wait state SRAM, 2 MB Flash	
Management	Lantronix DeviceInstaller GUI, Serial login, SNMP, Telnet login, HTTP	
Power	9-30 VDC or 9-24 VAC on barrel connector (1.5 Watts maximum consumption) 9-30 VDC on DB25F serial interface. 3.3VDC on serial interface	
Environmental	Operating: -40° to 70°C. Storage: -40° to 85°C	
Packaging	Material: Metal enclosure with integrated wall mounts; optional 35 mm DIN-rail mount available. Dimensions (LxWxH): 9.0 x 6.4 x 2.3 cm. Weight: 0.2 kg. IP Rating: 30	
Included Soft-ware	Windows® 98/ME/NT/2000/XP-based DeviceInstaller configuration software, Com Port Redirector™ software and related utilities	
Emissions	FCC Part 15 Subpart B Class A ICES-003 Issue 4 February 2004 Class A AS/NZS CISPR 22: 2004 Class A EN55022: 1998 + A1: 2000 + A2: 2003 Class A VCCI V-3/2005.04 Class A EN61000-3-2: 2000 Class A EN61000-3-3: 1995 + A1: 2001	Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Harmonic Current Emissions Fluctuations and Flicker
Immunity	EN55024: 1998 +A1: 2001 +A2: 2003 IEC_61000-4-2: 1995 ESD 8KV Air Discharge (Direct), 4KV Contact Discharge (Direct/Indirect) IEC_61000-4-3: 1995 Radiated Immunity 3.0V/m, 1KHz AM Sine Wave at 80% IEC_61000-4-4: 1995 EFT/Burst 1.0KV Power Lines, 0.5KV I/O Lines IEC_61000-4-5: 1995 Surge Immunity 1.0KV Common Mode, 1.0 KV Differential Mode IEC_61000-4-6: 1996 Conducted Immunity 3.0 Vrms, 80% AM Modulated (1KHz) IEC_61000-4-8: 1993 Magnetic Field Immunity 50Hz 1.0 Arms/m IEC_61000-4-11: 1994 Voltage Dips and Interrupts (>95%, 0.5 periods), (30%, 25 periods), (>95%,250 periods)	
Isolation	Designed with protection against transients and ESD for use under harsh environments. Serial Port: 15 KV ESD protection on RS232 and RS422/485 transceivers Power Input: Up to non-repeated 600 W 10/100 usec pulse protection against transient over voltages Ethernet Port: 1500 VAC isolation shielded with shield connected to chassis ground for signal integrity and ESD protection	
Agency Ap-provals	FCC, C/UL, CSA, VCCI, CE,TUV, CTick	
Warranty	2-Year Limited	
Partnr.		
UD1100IA2-01	UDS1100-IAP Device Server, 100-240 VAC International power supply with regional adapters, includes 500-163 cable and ACDIN1001-01 Din rail mount	
Accessories: 500-163-R ACDIN1001-01 500-171-R	 DB25M to DB9F serial cable (included) Optional DIN-rail mount (included) DB25M to RS485 and power input screw terminal adapter (order separately)	

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UDS1100/2100 Family Serial Device Servers

Reliable Device Servers for Affordable Serial-to-Ethernet Connectivity

The UDS family of device servers provides a hassle-free and inexpensive way to add Ethernet connectivity to virtually any device with a serial interface. Designed from the ground up with ease-of-use in mind, each member of the UDS family enables users to connect to, monitor, and control their equipment from practically anywhere via a network or the Internet.

Available in one and two-port models, and equipped with flexible power options including PoE, the UDS makes it simple to network-enable equipment without changing the way you work. Supplied with Lantronix' TruPort® COM Port Redirector software, UDS creates a fully transparent serial connection to existing PC-based software applications—making it possible to remotely connect to equipment already in the field as if it were connected to a local PC serial port.
Additionally, every UDS is equipped with a built-in web server that allows users the flexibility to access, control, and configure remote equipment using a standard web browser.

Features

- Provides a simple and cost effective serial-to-Ethernet connectivity solution for virtually any device with an RS-232/422/485 serial interface
- Delivers flexible power configurations eliminating the need for costly power converters
- Simplifies deployment with a tightly integrated, proven form factor rated for use under harsh conditions
- Enables interoperability with a versatile collection of ready-to-use networking protocols
- Provides new business intelligence from network-enabled equipment

Specifications: see next page

Specifications	
Serial Interface	Modes: RS232, RS422 or RS485 (2- and 4-wire configurations supported) Baud rate: 300 bps to 921.6 Kbps. Characters: 7 or 8 data bits. Stop Bits: 1 or 2 Parity: odd, even, none. Flow Control: CTS/RTS, XON/XOFF
Serial Connectors	UDS1100 (Single-port): 1 x DM25F (DCE). UDS2100 (Dual-port): 2 x DB9M (DTE)
Ethernet Interface	Interface: 10Base-T/100Base-T. Speed: 10/100/Auto Mbps. Connector: RJ45. Protocols: ARP, UDP, TCP, ICMP, Telnet, TFTP, AutoIP, DHCP, HTTP, SNMP TCP, UDP, and Telnet, TFTP, RFC2217
Indicators (LED)	Power, Link, Activity, RX Activity, TX Activity
Processor	CPU: Lantronix DSTNI-EX 48 MHz clock. Memory: 256 KB SRAM, 2 MB Flash
Management	Lantronix DeviceInstaller GUI, Serial login, SNMP, Telnet login, HTTP
Power	Input supply: 9-30 VDC (PoE only available on UD11000P0-01 version) Power Consumption: 1.8 Watts maximum
Environmental Limits	Operating temperature: 0° to 60°C. Storage temperature: -40° to 85°C Operating Humidity: 10% to 90%. Storage Humidity: 10% to 90%
Form Factor	Housing: Metal enclosure with integrated wall mounts (optional 35 mm DIN-rail mount available) Dimensions: 9.5 x 7.2 x 2.3 cm. Weight: 0.4 kg (0.9 lb). IP Rating: 30
Included Software	Windows 98/ME/NT/2000/XP/Vista (32-bit versions) DeviceInstaller configuration software, Com Port Redirector software and related utilities. Configuration Options: Web browser, Telnet client, Serial Terminal
Emissions	FCC Part 15 Subpart B Class A. ICES-003 Issue 4 February 2004 Class A AS/NZS CISPR 22: 2006 Class A EN55022: 1998 + A1: 2000 + A2: 2003 Class A UL 864: indoor dry environments (UDS1100 only) VCCI V-3/2006.4 Class A EN61000-3-2: 2000 Class A EN61000-3-3: 1995 + A1: 2001
Immunity	EN55024: 1998 +A1: 2001 +A2: 2003 IEC_61000-4-2: 1995 8KV Air, 4KV Contact IEC_61000-4-3: 1995 3.0V/m, 1KHz AM Sine Wave at 80% IEC_61000-4-4: 1995 1.0KV Power Lines, 0.5KV I/O Lines IEC_61000-4-5: 1995 1.0KV Common, 1.0 KV Differential IEC_61000-4-6: 1996 3.0 Vrms, 80% AM Modulated (1KHz) IEC_61000-4-8: 1993 50Hz 1.0 Arms/m IEC_61000-4-11: 1994 (>95%,0.5), (30%,25), (>95%,250)
Isolation	Power Input: Up to non-repeated 600W 10/100 usec pulse protection against transient over voltages. Serial Port(s): 15 KV ESD protection. Ethernet Port: 1500 VAC isolation with shield connected to chassis ground
Agency Approvals	FCC, C/UL, CSA, VCCI, CE, TUV, CTick
Warranty	2-Year Limited
Partnr.	
UD1100001-01	**UDS1100 one-port device server** - US domestic 110 VAC power supply - Six-foot DB9F-to-DB25M serial cable (P/N 500-163-R) - CD Includes: User Guide and Software utilities (DeviceInstaller and Com Port Redirector) - Quick Start Guide
UD1100002-01	**UDS1100 one-port device server** - 100-240 VAC International power supply with regional adapters - Six-foot DB9F-to-DB25M serial cable (P/N 500-163-R) - CD Includes: User Guide and Software utilities (DeviceInstaller and Com Port Redirector) - Quick Start Guide
UD11000P0-01	**UDS1100 one-port device server with PoE** - Six-foot DB9F-to-DB25M serial cable (P/N 500-163-R) - CD Includes: User Guide and Software utilities (DeviceInstaller and Com Port Redirector) - Quick Start Guide
UD110000B-01	**UDS1100 one-port device server** - (Board only – no enclosure)
UD2100001-01	**UDS2100 two-port device server** - US domestic 110 VAC power supply - DB9F-to-DB9F Null Modem cable (P/N 500-164-R) - CD Includes: User Guide and Software utilities (DeviceInstaller and Com Port Redirector) - Quick Start Guide
UD2100002-01	**UDS2100 two-port device server** - 100-240 VAC International power supply with regional adapters - DB9F-to-DB9F Null Modem cable (P/N 500-164-R) - CD Includes: User Guide and Software utilities (DeviceInstaller and Com Port Redirector) - Quick Start Guide
500-163-R	DB9F-to-DB25M serial cable
500-164-R	DB9F-to-DB9F Null modem cable
500-171-R	DB25M-to-RS485 and power input terminal adapter
ACDIN1001-01	DIN-rail mount UDS1100
ACDIN2001-01	DIN-rail mount UDS2100

Specifications are subject to change without notice.

Our Websites

- mulder-hardenberg.com
- mh-hminterfaces.com
- mh-fiberoptics.com
- mh-labeling.com
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Mulder-Hardenberg, est. 1927, is the answer to professional demands in the domain of electronic related environments. We don't just sell products. We use our multidiscipline knowledge to provide the best possible solution, designed to your specific interest.

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SDS1101 Single-Port Secure Device Server

LANTRONIX®

The Most Secure Way to Connect, Monitor, Manage and Control Devices Over a Network or the Internet

The SecureBox® SDS1101 offers the most secure way to add formerly isolated electronic equipment to the Ethernet network. With this capability, virtually any device with a serial port can be remotely accessed and controlled securely over the network or the Internet. This adds an unprecedented level of flexibility and efficiency to your business, and breathes new life into your existing equipment.

With the proliferation of information in today's electronic world, businesses are more concerned than ever about protecting data from unwanted intrusion as it is transferred over a network or the Internet. The SDS1101 features the most robust security available on the market with a National Institute of Standards and Technology (NIST) certified implementation of 128-256 bit AES (Advanced Encryption Standards; Rijndael) as specified by FIPS-197 (Federal Information Processing Standards).

Extending Serial Communication Across the Globe

SecureBox is ideal for commercial applications where secure data communications are essential, medical facilities, government agencies and financial institutions.

Using a method called serial tunneling, SecureBox encrypts and encapsulates serial data into packets and transports it over Ethernet. Using two device servers connected by a network, secure virtual serial connections can be extended across a facility or around the world. SecureBox SDS1101 can also work with Lantronix's Secure Com Port Redirector™ (SCPR) software to extend the functionality of COM port-based Windows® applications across Ethernet. SCPR creates encrypted virtual COM port connections to transport data to a remote SecureBox over the network or the Internet. This provides secure access and control of COM port-based applications from anywhere, at any time.

Easy to Setup and Use

The Lantronix approach to secure communications is transparent to your attached devices and software. There is no need to change the way you work or develop special software to encrypt/decrypt information over the network. The Windows-based configuration software, user-friendly web interface and on-line help simplify and streamline the set-up process. SecureBox can also be set up locally through its serial port, or remotely over a network using Telnet or a web browser. For added security, the web interface can be disabled.

Built to expand as your needs grow, SecureBox's Flash memory provides maintenance-free, non-volatile web page storage and facilitates easy future system upgrades.

Secure Modem Replacement

SecureBox can be used as a faster, less expensive and more reliable alternative to dial-up modems. In modem emulation mode, the unit accepts modem AT commands on the serial port and establishes a secure network connection to the end device, eliminating the need for dedicated modems and phone lines.

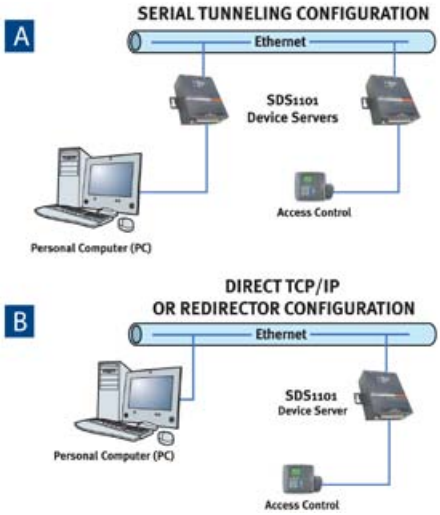
RoHS-compliant, the SDS1101 meets Directive 2002/95/EC on the restriction of the use of certain hazardous substances in electrical and electronic equipment.

Features

- Securely network-enable serial devices with 128-256 bit AES-certified encryption
- Transparent communications - no need to develop special software
- RS-232 DCE serial port pinned the same as modem for easy connection
- 10/100 Ethernet Interface
- Supported by Lantronix's Secure Com Port Redirector™ software

Specifications: see next page

Sample Configurations



Specifications		
Serial Interface	Interface: Software-selectable RS232, RS422 or RS485 (2 and 4 wire support) Connectors: 1 DB25F DCE serial port Data Rates: Software-selectable baud rate from 300 to 230 KBaud Characters: 7 or 8 data bits. Parity: odd, even, none. Stop Bits: 1 or 2 Control Signals: CTS/RTS (Hardware). Flow Control: XON/XOFF (Software)	
Network Interface	Interface: 10Base-T/100Base-TX Ethernet port. Software selectable Ethernet speed 10/100/Auto. Software selectable Half/Full/Auto duplex. Connector: RJ45 Standards: ARP, UDP, TCP, ICMP, Telnet, TFTP, AutoIP, DHCP, HTTP, SNMP TCP, UDP, and Telnet,TFTP	
Indicators (LED)	Power, 10/100 Link/Activity (green), 100/100. Link/Activity(green), Diagnostics (red), Status (green)	
Processor	CPU: Lantronix DSTNI-EX 48 MHz clock. Memory: 256 KB zero wait state SRAM, 2 MB Flash	
Management	Lantronix DeviceInstaller GUI, Serial login, SNMP, Telnet login, HTTP	
Power	9-30 VDC or 9-24 VAC on barrel connector (1.5 Watts maximum consumption) 9-30 VDC on DB25F serial interface	
Environmental	Operating: 5° to 50°C. Storage: -40° to 66°C	
Packaging	Material: Metal enclosure with integrated wall mounts; optional 35 mm DIN-rail mount available. Dimensions (LxWxH): 9.0 x 6.4 x 2.3 cm. Weight: 0.20 kg. IP Rating: 30	
Included Software	Windows® 98/ME/NT/2000/XP-based DeviceInstaller configuration software, Com Port Redirector™software and related utilities	
Emissions	FCC Part 15 Subpart B Class A ICES-003 Issue 4 February 2004 Class A AS/NZS CISPR 22: 2004 Class A EN55022: 1998 + A1: 2000 + A2: 2003 Class A VCCI V-3/2005.04 Class A EN61000-3-2: 2000 Class A EN61000-3-3: 1995 + A1: 2001	Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Harmonic Current Emissions Fluctuations and Flicker
Immunity	EN55024: 1998 +A1: 2001 +A2: 2003 IEC_61000-4-2: 1995 ESD 8KV Air Discharge (Direct), 4KV Contact Discharge (Direct/Indirect) IEC_61000-4-3: 1995 Radiated Immunity 3.0V/m, 1KHz AM Sine Wave at 80% IEC_61000-4-4: 1995 EFT/Burst 1.0KV Power Lines, 0.5KV I/O Lines IEC_61000-4-5: 1995 Surge Immunity 1.0KV Common Mode, 1.0 KV Differential Mode IEC_61000-4-6: 1996 Conducted Immunity 3.0 Vrms, 80% AM Modulated (1KHz) IEC_61000-4-8: 1993 Magnetic Field Immunity 50Hz 1.0 Arms/m IEC_61000-4-11: 1994 Voltage Dips and Interrupts (>95%,0.5 periods), (30%,25 periods), (>95%,250 periods)	
Isolation	Designed with protection against transients and ESD for use under harsh environments. Serial Port: 15 KV ESD protection on RS232 and RS422/485 transceivers Power Input: Up to non-repeated 600 W 10/100 usec pulse protection against transient over voltages Ethernet Port: 1500 VAC isolation shielded with shield connected to chassis ground for signal integrity and ESD protection	
Agency Approvals	UL, CSA, FCC, CE,TUV, CTick, VCCI	
Warranty	2-Year Limited	
Partnr.		
SD1101002-11	SDS1101 single Port Secure device server with AES Encryption, universal power supply	
Accessories: 500-163 ACDIN1001-01 500-171-R	 External Antenna for PremierWave XN 2.15 dBi, Reverse Polarity, SMA Connector DB25M to DB9F serial cable (included) DB25M to RS485 and 9-30 VDC power input screw terminal adapter	

Specifications are subject to change without notice.

Our Websites

- mulder-hardenberg.com
- mh-hminterfaces.com
- mh-fiberoptics.com
- mh-labeling.com
- mh-networking.com
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SDS2101 SecureBox™ Secure Device Server

LANTRONIX® RoHS

The Most Secure Way to Connect, Monitor, Manage and Control Devices Over a Network or the Internet

The SecureBox family of device servers offers the most secure way to add formerly isolated electronic equipment to the Ethernet network. With this capability, virtually any device with a serial port can be remotely accessed and controlled securely over the network or the Internet. This adds an unprecedented level of flexibility and efficiency to your business, and breathes new life into your existing equipment.

With the proliferation of information in today's electronic world, businesses are more concerned than ever about protecting data from unwanted intrusion as it is transferred over a network or the Internet.
SecureBox device servers feature the most robust security available on the market with a National Institute of Standards and Technology (NIST) certified implementation of 128-256 bit AES (Advanced Encryption Standards; Rijndael) as specified by FIPS-197 (Federal Information Processing Standards).

Easy to install and implement, SecureBox device servers are ideal for commercial applications where secure data communications are essential, medical facilities, government agencies and financial institutions. Using a method called serial tunneling, SecureBox encrypts and encapsulates serial data into packets and transports it over Ethernet. Using two device servers connected by a network, secure virtual serial connections can be extended across a facility or around the world.

The Lantronix approach to secure communications is transparent to your attached devices and software.
There is no need to change the way you work or develop special software to encrypt/decrypt information over the network. The Windows-based configuration software, user-friendly web interface and on-line help simplify and streamline the set-up process. SecureBox can also be set up locally through its serial port, or remotely over a network using Telnet or a web browser.
For added security, the web interface can be disabled.

SecureBox device servers can be used as a faster, less expensive and more reliable alternative to dial-up modems. In modem emulation mode, the unit accepts modem AT commands on the serial port and establishes a secure network connection to the end device, eliminating the need for dedicated modems and phone lines.
Available in single port (SDS1101) or dual port (SDS2101) configurations, SecureBox can also work with Lantronix's Secure Com Port Redirector (SCPR) software to extend the functionality of COM port-based Windows® applications across Ethernet. SCPR creates encrypted virtual COM port connections to transport data to a remote SecureBox over the network or the Internet. This provides secure access and control of COM port-based applications from anywhere, at any time.

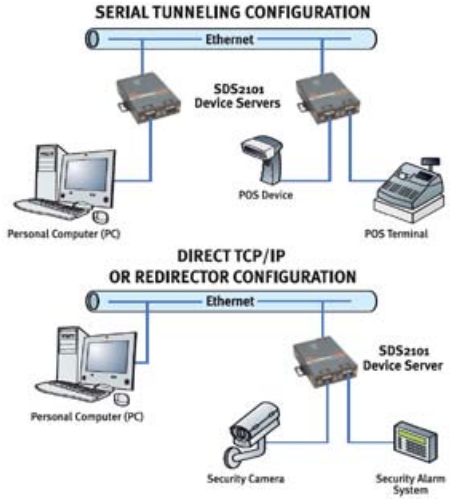
Built to expand as your needs grow, SecureBox's Flash memory provides maintenance-free, non-volatile web page storage and facilitates easy future system upgrades. If you're looking for the most cost-effective and scalable solution for securely network-enabling your equipment, look no further than SecureBox.

Features

- Securely network-enable serial devices with 128-256 bit AES-certified encryption
- Transparent communications - no need to develop special software
- Two RS-232 DTE serial ports pinned the same as PC for easy connection
- 10/100 Ethernet Interface

Specifications: see next page

Sample Configurations



Specifications		
Serial Interface	Interface: Software-selectable RS232, RS422 or RS485 (2 and 4 wire support) Connectors: 2 DB9M DTE serial ports Data Rates: Software-selectable baud rate from 300 to 921 KBaud Characters: 7 or 8 data bits. Parity: odd, even, none. Stop Bits: 1 or 2 Control Signals: CTS/RTS (Hardware). Flow Control: XON/XOFF (Software) Data Encryption: 128-256 Bit AES encryption, NIST AES Cert #120	
Network Interface	Interface: 10Base-T/100Base-TX Ethernet port. Software selectable Ethernet speed 10/100/Auto Software selectable Half/Full/Auto duplex. Connector: RJ45 Standards: ARP, UDP, TCP, ICMP, Telnet, TFTP, AutoIP, DHCP, HTTP, SNMP and RFC2217	
Indicators (LED)	Power (blue). RXI Serial (Activity) (green). TXI Serial (Activity) (yellow). RX2 Serial (Activity) (green) TX2 Serial (Activity) (yellow). RJ45 LEDs Link (100=green,10=yellow) Act (Full=green, Half duplex=green)	
Processor	CPU: Lantronix DSTNI-EX 48 MHz clock. Memory: 256 KB zero wait state SRAM, 2 MB Flash	
Management	Lantronix DeviceInstaller GUI, Serial login, SNMP, Telnet login, HTTP	
Power	9-30 VDC on barrel connector (1.8 Watts maximum consumption)	
Environmental	Operating: 0° to 60°C. Storage: -40° to 85°C	
Packaging	Material: Metal enclosure with integrated wall mounts; optional 35 mm DIN-rail mount available. Dimensions (LxWxH): 9.5 x 7.2 x 2.3 cm. Weight: 0.4 kg. IP Rating: 30	
Included Software	Windows® 98/ME/NT/2000/XP-based DeviceInstaller configuration software, Com Port Redirector™ software and related utilities	
Emissions	FCC Part 15 Subpart B Class A ICES-003 Issue 4 February 2004 Class A AS/NZS CISPR 22: 2006 Class A EN55022: 1998 + A1: 2000 + A2: 2003 Class A VCCI V-3/2006.04 Class A EN61000-3-2: 2000 Class A EN61000-3-3: 1995 + A1: 2001	Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Radiated Emissions 30MHz – 1000MHz Harmonic Current Emissions Fluctuations and Flicker
Immunity	EN55024: 1998 +A1: 2001 +A2: 2003 IEC_61000-4-2: 1995 ESD 8KV Air Discharge (Direct), 4KV Contact Discharge (Direct/Indirect) IEC_61000-4-3: 1995 Radiated Immunity 3.0V/m, 1KHz AM Sine Wave at 80% IEC_61000-4-4: 1995 EFT/Burst 1.0KV Power Lines, 0.5KV I/O Lines IEC_61000-4-5: 1995 Surge Immunity 1.0KV Common Mode, 1.0 KV Differential Mode IEC_61000-4-6: 1996 Conducted Immunity 3.0 Vrms, 80% AM Modulated (1KHz) IEC_61000-4-8: 1993 Magnetic Field Immunity 50Hz 1.0 Arms/m IEC_61000-4-11: 1994 Voltage Dips and Interrupts (>95%,0.5 periods), (30%,25 periods), (>95%,250 periods)	
Isolation	Designed with protection against transients and ESD for use under harsh environments. Serial Port: 15 KV ESD protection on RS232 and RS422/485 transceivers Power Input: Up to non-repeated 600 W 10/100 usec pulse protection against transient over voltages Ethernet Port: 1500 VAC isolation shielded with shield connected to chassis ground for signal integrity and ESD protection	
Agency Approvals	FCC, C/UL, CSA, VCCI, CE,TUV, CTick	
Warranty	2-Year Limited	
Partnr.		
SD2101002-11	SDS2101 two-port 10/100 secure device server RoHS compliant; universal power supply with regional adapters	
Accessories: 500-164-R 500-163-R ACDIN2001-01	 DB9F to DB9F Null modem cable (included) DB25M to DB9F serial cable Optional DIN-rail mount	

Specifications are subject to change without notice.

Our Websites

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IntelliBox 2100 Device Server

LANTRONIX®

RoHS

Fully Automate Your Remote Equipment with Real-time Event Management and Reporting

IntelliBox®-I/O 2100 is a breakthrough in truly automated control of remote equipment. Powered by Lantronix EventTrak™ technology, this highly-advanced, programmable device server connects your equipment to an IP network and monitors it to watch for events at specified intervals. When an event occurs, IntelliBox automatically sends pre-determined, user-defined command(s) to the equipment causing it to take appropriate and/or corrective actions – without any user intervention. IntelliBox can send email notification that the event was detected and handled accordingly.

True Autonomous Control with EventTrak

IntelliBox proactively monitors and controls remote digital I/O, dry contact (relay) and RS232/422/485-based equipment. With built-in EventTrak technology, IntelliBox can be set to query an attached device at timed intervals then, depending on the results, take pre-specified action(s). In addition to monitoring a serial line the IntelliBox can also monitor digital I/O. Fluid-level monitoring is a simple example – if IntelliBox notices a digital float sensor drop to a 'low level,' it can trigger a relay to start the fluid pump. When the level is restored the relay is triggered to stop the pump. IntelliBox sends an email to the user notifying them of the situation and the actions taken. Instead of reacting to an event or problem, users are proactively notified that an event occurred and the appropriate response automatically took place. This also enables users to control networked equipment directly through the serial or I/O port rather than depending on a PLC or SCADA server. In some instances, several events should occur before action is taken. EventTrak allows "Chain Definitions" (series of events/ actions) to be defined. They can be saved, stored and transferred from one IntelliBox to another, providing a great deal of flexibility for large-scale deployment. IntelliBox is ideal for alarms, fluid pumps, motor drives, lights, fans, phone systems, access/control/alarm panels, HVAC equipment, PLC's, projectors, security cameras, proximity readers, card readers, etc.

Automated Reporting

IntelliBox consolidates the task of monitoring/reporting on multiple pieces of equipment. Rather than query and review the output of each device separately, users can configure the IntelliBox to query attached equipment at configurable intervals and gather the returned data. Incoming data can be sent via email or RSS feed, allowing hundreds of devices to be monitored from one RSS-enabled web page. Incoming data can be scanned for specific information. When it is detected, IntelliBox can send an email flagged as "Important" along with the data and take corrective action if needed.

Enterprise-grade Security and Data Center Standards

Equipped with the Lantronix Evolution OS™networking operating system, IntelliBox delivers enterprise-grade level networking security with built-in SSH/SSL support. The hardened OS and mature protocol stack are resilient to denial of service (DoS) and port mapping attacks and prevent it from being used to bring down other networked devices. Evolution OS uses familiar data-center standards such as a Cisco-like command line interface (CLI) very similar to that used by routers and hubs, simplifying configuration and enterprise network integration. It also incorporates XML – a standard tool for web services, data transfer and rich content management that encapsulates data into a text-based format.

Main Features

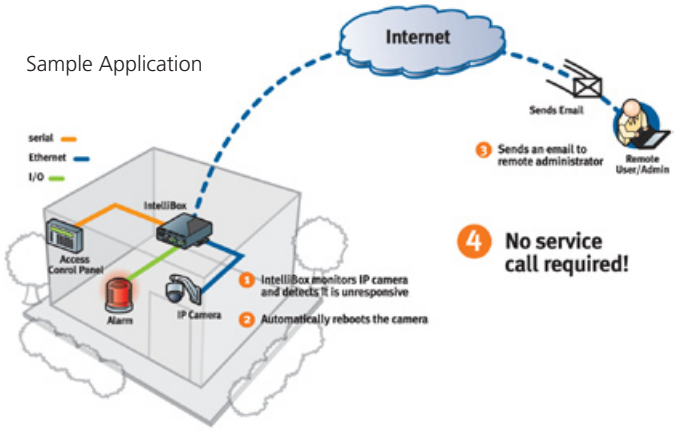
- Reduce service calls or trips to repair or check on equipment. IntelliBox does it for you!
- Save time, reduce costs and increase efficiency
- Network-enables equipment for Internet access
- Proactively monitors serial and Ethernet devices
- Takes automatic action and/or troubleshooting
- Automatically reporting with email or RSS

Powerful and Rugged

IntelliBox is equipped with isolated serial, I/O and Ethernet ports and screw terminal connectors for serial, I/O, relay and power. It supports Modbus TCP, Modbus ASCII and Modbus RTU and is FM-approved for hazardous locations Class 1, Div. 2. IntelliBox also features 15KV serial port ESD protection which protects the IntelliBox from electrical overstress; ESD-protected I/O channels (independent and optically isolated); wide -40°–75°C operational temperature range; and flexible power with 9-30 VDC and 9-24 VAC input range.
IntelliBox can act as a Modbus TCP slave, enabling Modbus TCP masters to monitor the status of digital inputs and set the digital outputs and relays. It can also be used as a "Modbus bridge" (Modbus TCP to Modbus RTU/ASCII protocol converter) enabling users to connect RS232/RS485 Modbus RTU/ASCII devices to their Ethernet network to be controlled by Modbus TCP masters (PLCs, OPC servers, SCADA software, etc).

Specifications: see next page

Sample Application



Specifications	
Serial Interface	2Serial ports: 1RS232,1 RS422/485 (4-wire/2-wire) with terminal block connection Baud rate selectable from 300 to 230 Kbps Customizable baud rate support for non-standard serial speeds LED indicators for TXD and RXD activities
Serial Line Formats	Characters: 7or 8 data bits. Stop bits: 1or 2. Parity: odd, even, none
Flow Control	Hardware: RTS/CTS. Software: XON/XOFF
Modem Control	CTS, RTS, DTR, DCD on Serial 1
Digital I/O	2 Independently configurable digital I/O's, configured via GUI set-up Menu Opto-isolated to eliminate grounding issues Logically compatible with 3.3V level and also higher voltage levels Transient voltage and polarity reversal protection built in
Relay	Contacts are capable of handling up to 8A resistive load Contacts are mechanically isolated to eliminate grounding issues Contacts are non-latching with Normally Open (NO) or Normally Closed (NC) for simple application such as power failure indication
Network Interface	1RJ45 Ethernet port - 10Base-T/100Base-TX Full or half duplex - Auto-negotiating or hard coded
LED Indicators	10Base-Tand 100Base-TX link - Ethernet Activity Serial Transmit Data - Serial Receive Data - Power / Status
Management	Internal web server - SNMP v2C (MIB-II, RS232MIB) - Serial login Telnet/SSH login - XML - Device Installer software
Power	Removable screw terminal block connector 9-30 VDC or 9-24 VAC with chassis ground 2.3W
Environmental	Temperature: -40°C to 75°C Operating Temperature: -40°C to 85°C Storage Humidity: 10% to 90% relative humidity, non condensing
Agency Approvals	UL, CSA, FCC, CE, TUV, CTick, VCCI
Protocols Supported	ARp, UDP/Ip, TCP/Ip, Telnet, ICMp, SNMp, DHCp, BOOTp, TFTp, Auto Ip, SMTp, FTp, DNS, Traceroute, HTTP
Industrial Application Protocols	Modbus TCp, Modbus ASCII/RTU
CPU	Lantronix DSTNI-EX 120 MHz clock, 2S6 KB SRAM, 16 KB Boot ROM Internal CPU Memory
Memory • EEPROM	4MB Flash - 2MB SRAM • 64 Kbits
Reset	Recessed push button
Packaging	Case: metal enclosure with wall mounts IP30 enclosure rating Dimensions: (L xWx H): 115 x 109 x23 mm, terminal blocks included Weight: 0.3 kg
Isolation	1.5 KVAC I 2.1 KVDC galvanic isolation between power input port, Ethernet port (except chassis ground), serial ports 1.5 KVAC I 2.1 KVDC opto-isolation between digital 1/0 ports and all other ports 1.5 KVAC I 2.1 KVDC mechanical isolation between Relay contacts and all other ports 8KV direct contact, 15 KV air discharge, ESD protection on all serial ports (IEC 1000-4-2, IEC 61000-4-2) 40 A(5150 ns) EFT protection (IEC 61000-4-4), 12 A(8/20 us) lightning protection (IEC 61000-4-5) on Ethernet port Transient voltage protection and ESD at power input with max non-repetitive surge current 800 A(8/20 us) (IEC 61000-4-2) Transient voltage protection and ESD with max non-repetitive surge power 600W peak (10/1000 us) at digital 1/0 ports
Partnr.	
IBIO21002-01	IntelliBox-I/O 2100, 2 port IA device and I/O server with EventTrak, worldwide power supply with regional adapters.

Specifications are subject to change without notice.

Our Websites

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Mulder-Hardenberg, est. 1927, is the answer to professional demands in the domain of electronic related environments. We don't just sell products. We use our multidiscipline knowledge to provide the best possible solution, designed to your specific interest.

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