

U10/U20 USB Network Interface Models 75010, 75020-1, and 75020-2



U10 USB Network Interface – TP/FT-10 Channel



U20 USB Network Interface – PL-20 Channel

Description

The U10 and U20 USB Network Interfaces are low-cost, high-performance LONWORKS interfaces for USB-enabled PCs. The U10 USB Network Interface connects directly to a TP/FT-10 Free Topology Twisted Pair (ANSI/CEA-709.3) LONWORKS channel through a removable connector, and is fully compatible with link powered channels. The U20 USB Network Interface connects to a PL-20 Power Line (ANSI/CEA-709.2) LONWORKS channel through a plug-in coupling circuit/power supply (included). The U20 interface may also be connected directly to 10-18VDC power lines without a coupling circuit, or to virtually all powered lines via a customer-supplied coupling circuit/power supply.

Designed for use in LONWORKS networks with USB-enabled, typically PC-based devices that perform monitoring, management and diagnostics functions, the U10 and U20 interfaces are ideal for industrial control, building automation, process control, home automation, and transportation applications. The interfaces feature easy to install, auto-configuring drivers for Microsoft Windows

- ▼ Low-cost USB to LONWORKS® (ANSI/CEA-709.1) network interface
- ▼ Free topology twisted pair (TP/FT-10) and power line (PL-20 C-Band) LONWORKS channel support
- ▼ High network throughput and performance
- ▼ Rugged design, removable connectors
- ▼ Plug-and-play drivers for Windows 2000, XP, and Server 2003
- ▼ Compatible with LNS® and OpenLDV™ based applications
- ▼ Compatible with LonScanner™ Protocol Analyzer
- ▼ CE, UL, cUL, and TÜV

2000, XP and Server 2003, and are compatible with LNS 3 and Turbo Edition applications, including the LonMaker® Integration Tool. Compatible with OpenLDV applications and the LonScanner Protocol Analyzer.

The U10 and U20 interfaces are certified USB 2.0 compatible by the USB Implementers Forum. In addition, the U10 and U20 interfaces carry the *Designed for Windows XP* logo compatibility certification.

A 60cm USB extension cable is included with both the U10 and U20 interfaces, to allow easy connection in various laptop and desktop environments.

Installation software and a user's guide are included on CD-ROM, and may also be downloaded from Echelon's web site.



Specifications

Transceiver	Model 75010: TP/FT-10, compatible with ANSI/CEA-709.3 Model 75020: PL-20, compatible with ANSI/CEA-709.2. EN50065.1 C-Band protocol software configurable.
Network Connector	Model 75010: Removable screw terminal connector included Model 75020: 2.1mm barrel connector with positive tip. Plug-in coupling circuit/power supply included. May be connected directly to 10-18VDC power line, or to customer-supplied coupling circuit/power supply.
Operating Input Voltage (PL-20)	10-18VDC
Operating Input Current (PL-20)	250mA maximum @ 18VDC
Operating Input Current (USB)	50mA maximum @ 5VDC
USB Compatibility	Certified USB 2.0 compatible. Works with USB 1.1 and Hi-Speed USB systems, peripherals and cables.
LED Indicators	Service (amber), Transmit (green), Receive (green)
Temperature	
Operating	0 to +70° C
Non-operating	-20° to +85° C
Humidity	
Operating (Non-condensing)	25 to 90% RH @ +50° C
Non-operating (24 hour, Non-condensing)	95% RH @ 70°C
Shock and Vibration	ETSI300 019-2-3 T3.2
Dimensions	18.2mm high x 113.2mm long x 22.4mm wide
EMC	FCC Part 15 Level B, EN55022 Class B, EN55024, CISPR 22 Class B, VCCI Class B
Agency Listings	U.L. 60950, cU.L. C22.2 No. 60950-00, TÜV EN60950, CE, C-Tick

Documentation

The *LONWORKS USB Network Interface User's Guide* is provided in PDF format on the driver software CD-ROM (included).

Document	Echelon Part Number
LONWORKS USB Network Interface User's Guide	078-0296-01

Ordering Information

Product	Echelon Model Number
U10 USB Network Interface – TP/FT-10 Channel	75010
U20 USB Network Interface – PL-20 Channel (US Plug)	75020-1
U20 USB Network Interface – PL-20 Channel (Continental Europe Plug)	75020-2

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