

DATASHEET

RadioLinx[®] 802.11abg Industrial Hotspot[™] RLXIB-IHW

The RadioLinx[®] 802.11abg Industrial Hotspot[™] (RLXIB-IHW) is a high-speed wireless Ethernet radio, with PoE and Serial Encapsulation. The RLXIB-IHW operates at speeds up to 54 Mbps, using the IEEE 802.11b/g (2.4 GHz band) and 802.11a (5 GHz band) standards. Designed for global installations, the RLXIB-IHW offers many Industrial features including hazardous location certifications, IGMP Snooping, OFDM for noise immunity, repeater mode for mesh architecture/self healing, OPC server diagnostics, extended temperature, high vibration/shock and din-rail mounting.



Features	Benefits
Conforms to IEEE 802.11a/b/g	<ul style="list-style-type: none"> ◆ Open standard protects wireless network investment ◆ High speed (54 Mbps), low latency communications ◆ Radio-based IGMP snooping/querying to filter multicast industrial Ethernet maximizing bandwidth
Rugged and Powerful	<ul style="list-style-type: none"> ◆ Metal enclosure, industrial operating temperatures, vibration and shock resistant ◆ Certification approved for use in hazardous locations and explosive atmosphere (ISA 12.12.01 Class I Div 2, ATEX Zone 2 Category 3) ◆ Transmit power and radio frequencies programmable for use globally
Data and Network Security	<ul style="list-style-type: none"> ◆ Cryptographic strength security with WPA2 - 802.11i with 128 bit AES encryption and CCM integrity check ◆ Limit access to approved device MAC IDs
Flexible and Reliable	<ul style="list-style-type: none"> ◆ Single radio operates as an access point and repeater/bridge and client ◆ Automatic network configuration (can be prioritized or fixed) with self-healing network and master redundancy for reliable large networks (for example, SCADA) ◆ Power over Ethernet (PoE) enables radio placement near antenna to reduce antenna cable costs and improve wireless network performance
Serial Device Connectivity	<ul style="list-style-type: none"> ◆ Encapsulation / de-encapsulation of serial data to / from TCP or UDP packets ◆ Advanced features include multicast and Domain Name Server (DNS) support
Easy to Configure and Monitor	<ul style="list-style-type: none"> ◆ Built-in web server for browser-based configuration and remote diagnostics ◆ Included OPC Server for HMI-based wireless network diagnostics

Configuration

RadioLinx IH Browser is a configuration and monitoring tool for the RadioLinx Industrial Hotspot[™] radios. Use RadioLinx IH Browser to view your network topology, assign IP addresses to radios for configuration, monitor network diagnostics, update radio firmware and detect the presence of other vendors' 802.11 radios on the network.

Specifications

Radio

Frequency Band (Varies by country)	802.11b/g: 2.412 GHz to 2.462 GHz (FCC) 2.412 GHz to 2.472 GHz (ETSI) 802.11a: 5.150 GHz to 5.250 GHz (FCC/ETSI) 5.725 GHz to 5.850 GHz (FCC)
Wireless Standards	802.11a, 802.11b, 802.11g, 802.11i
Transmit Power (Programmable) (varies by country)	Up to 50 mW without amplifier Up to 500 mW with optional amplifier. (not applicable for hazardous locations)
Channel data rates (Modulation)	802.11b: 11, 5.5, 2, 1 Mbps (DSSS - BPSK, QPSK, CCK) 802.11g: 54, 48, 36, 24, 18, 12, 9, 6 Mbps (OFDM) 802.11a: 54, 48, 36, 24, 18, 12, 9, 6 Mbps (OFDM)
Receiver Sensitivity (Typical)	-90 dBm @ 1 Mbps -85 dBm @ 11 Mbps -82 dBm @ 24 Mbps -75 dBm @ 54 Mbps
Channels Selection	1 to 13 (802.11b/g) 36, 40, 44, 48, 149, 153, 157, 161, 165 (802.11a)
Security	WPA2 - 802.11i with 128 bit AES-CCM Legacy WPA TKIP, WEP support MAC ID filter Admin password

Physical

Enclosure	Extruded aluminum with DIN and panel mount
Size	114.3 x 116.8 x 44.45 mm (W x H x D) 4.5 x 4.6 x 1.75 inches
Shock	IEC 60068 2-6 (20g, 3-Axis)
Vibration	IEC 60068 2-27 (5g, 10Hz to 150Hz)
Ethernet Ports	One 10/100 Base-T connector, shielded RJ45 IEEE 802.3, 802.3u, 802.3x
Antenna Ports	(2) RP-SMA connectors
Weight	1.06 lbs (479g)

Environmental

Operating Temperature	-40°C to +75°C (-40°F to +167°F)
Humidity	Up to 100% RH, with no condensation
External Power	10 Vdc to 24 Vdc
PoE Injector	48 Vdc
Average Power	<6W

Regulatory Approvals

Wireless Approvals

Visit our web site at www.prosoft-technology.com for current wireless approval information.

Hazardous Locations

UL	ANSI/ISA 12.12.01 Class I, Division 2, Groups A, B, C, D
cULus	C22.2 No. 213-M1987
CSA/UL	ANSI/EN60950-1
ATEX	EN60079-0/-15 Zone 2 Category 3



Additional Products

ProSoft Technology® offers a full complement of hardware and software solutions for a wide variety of industrial communication platforms. For a complete list of products, visit our web site at: www.prosoft-technology.com

Ordering Information

To order this product, please use the following:

RadioLinx® 802.11abg Industrial Hotspot™

RLXIB-IHW

To place an order, please contact your local ProSoft Technology distributor. For a list of ProSoft Technology distributors near you, go to: www.prosoft-technology.com and select Distributors from the menu.

Place your order by email or fax to:

North American / Latin American / Asia Pacific
orders@prosoft-technology.com
fax to +1 661.716.5101

Europe / Middle East / Africa
europe@prosoft-technology.com
fax to +33 (0) 5.61.78.40.52

Copyright © 2010 ProSoft Technology, Inc., all rights reserved. 9/15/2010

Specifications subject to change without notice.