WLg-IDA/N

WiFi access point, 2-port Ethernet bridge & WDS repeater for industrial automation



- WiFi IEEE 802.11 a/b/g/h & super AG, up to 108 Mbps
- Security: WEP, WPA-PSK, WPA2-PSK & IEEE 802.1x RADIUS
- Web based configuration, SNMP administration
- Auto-sensing 10/100 Base TX network interface
- PoE IEEE 802.3af or +9VDC to +36VDC dual redundant power supply input
- Shock & vibration proof IP30 metal enclosure, DIN rail or panel mounting









Top «C-KEY» for quick configuration, save & restore

Introduction

WLg-IDA/N features a WLAN interface coupled to a 2-port Ethernet 10/100 designed for harsh industrial environments and automotive applications. The unit is housed in a compact enclosure ready to be DIN rail or panel mounted.

The device offers many switch technology advancements, including auto MDI/MDIX crossover for easy plug and play application.

The configuration of the device is achieved using the web browser installed on your computer; it also offers SNMP administration / configuration and an optional C-Key which allows quick and easy on-site replacement of the WLg-IDA/N unit, eliminating the need to reconfigure the replacement part or to use any other equipment.

WLg-IDA/N fulfills the most severe requirements in terms of operating environment: operating temperature from -25°C to +70°C, shock and vibration proof according to MIL-STD-810F standard, IP30 seal rating.

Technical characteristics overview

| Ethernet link | 2-port Ethernet 10/100 auto-sensing; RJ45 connectors; plug & play mode & auto MDI/MDIX cross-over |
|---------------------|---|
| WiFi network | Compliant to the IEEE 802.11a/b/g/h 2.4 / 5 / 5.4 GHz standards, multi-country roaming support (IEEE 802.11d); Dynamic Frequency Selection (DFS) support provides flexible selection of best frequency to allow mobility among all existing IEEE 802.11a/b/g/h networks; "ClearVoice" band provides non-overlapping channels for fast-speed data transmission; Transmission Power Control (TPC) offers flexibility to adjust RF output power, based on the ATHEROS AR5414 (AR5006XS) chip set |
| Data rate | Up to 108 Mbps (Super AG mode), TCP user data rate up to 44 Mbps |
| Channels | 13 channels (b/g modes), 8 channels (a mode), 11 channels (h mode) Number of channels may vary depending on local laws. |
| Output power | Transmitter +20 dBm (Optional 26 dBm) |
| Sensitivity | Receiver -92 dBm for IEEE 802.11 a/g and -95 dBm for IEEE 802.11b |
| Antenna | One 2dBi 2.4 / 5 GHz antenna (RP-SMA connector) + one RP-SMA connector for an additional antenna (diversity mode) |
| Modulation | OFDM: BPSK, QPSK, 16QAM, 64QAM, DSSS: DBPSK, DQPSK, CCK |
| Security | 64/128 bits WEP, WPA-PSK, WPA2-PSK, IEEE 802.1x (RADIUS supplicant & authenticator), MAC addresses filtering, SSID broadcast control |
| Modes | Access point to build a WiFi network infrastructure, bridge to connect any Ethernet equipments to this network and MODBUS/TCP wireless gateway, repeater (WDS), infrastructure, AD-HOC, bridge router & fast roaming (less than 50 ms) modes are supported |
| Administration | Built-in WEB interface; SNMP V2c agent; ACKSYS NDM (Networking Device Manager). ACKSYS unique "C-Key" allows a quick and easy on-site replacement of the WLg-IDA unit, eliminating the need to reconfigure the replacement part or to use any other equipment (optional) |
| Operating systems | Windows, Linux, UNIX as well as any operating system supporting TCP/IP |
| Protocols | Ethernet TCP/IP & UDP, MODBUS/TCP, Ethernet/IP, PROFINET |
| Signaling | Led display for power supplies, LAN on each port & WLAN activity, radio receive level |
| Alarms | Relay output warning: power failure, LAN or WLAN connection failure, Watchdog. 1 FORM B solid state relay, 60V 0.15A, contacts on removable clamp cage terminal |
| Power supply | PoE IEEE 802.3af or +9VDC to +36VDC dual redundant power supply input (removable clamp cage terminal) |
| Consumption | 4.5W typical |
| Dimensions & weight | Shock & vibration proof metal enclosure (L: 110 x W: 150 x H: 120 mm), 570 g |
| Standards | MIL-STD-810F, 514.5 & 516.5 methods (shocks & vibrations) EN 301489-17 & EN 61000-6-2 (EMC) |
| Environment | Operating temperature: -25°C to +70°C (-4°F to 158°F), storage: -65°C to +100°C (-85°F to 212°F), Humidity: 5% to 95% (non-condensing), IP 30 seal rating |

Ordering references

WLg-IDA/N WiFi Access Point, 2-port Ethernet Bridge & WDS Repeater (a/b/g/h), PoE IEEE 802.3af or +9VDC to +36VDC dual redundant power supply input, shipped with 1 dual band 2 dBi omnidirectional (2.4 / 5 GHz) antenna and 1 meter of Ethernet RJ45 cable

C-Key_M1 Save / Restore configuration key for the WLg-IDA/N High power radio option (26 dBm, 400 mW) WLg-RF400MW

WLg-FIX-PLQ Panel fixing metallic plate

CAB-RJ45-1M 1 meter Ethernet RJ45 cable, straight

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