

WLg-DONGLE

Compact serial RS232 server to WiFi IEEE 802.11 a/b/g/h (2.4/5 GHz)



- IEEE 802.11 a/b/g/h & super AG standards
- Security: WEP, WPA-PSK, WPA2-PSK and IEEE 802.1x (RADIUS)
- Easy to use web based configuration, TELNET, SNMP & ACKSYS NDM
- 250 Kbps serial RS232
- +5VDC power supply
- Compact metallic case (L:103xW:67xH:24mm)



Introduction

WLg-DONGLE gives access to any serial equipment from Windows, UNIX & Linux computers connected to your WiFi Ethernet TCP/IP network, making it possible to communicate between two distant serial equipments through the network, or directly with a peer to peer connection (Ad-Hoc mode).

The support of the Telnet (RFC 2217) extension associated to a COM ports re-director enables distant serial equipments connected to the WLg-DONGLE to be directly used by Windows & Linux existing applications using standard COM ports.

The WLg-DONGLE device is also designed to work as a wireless bridge between MODBUS ASCII/RTU protocols and the radio network, this feature allows connecting any serial MODBUS equipment to the radio.

Integrators and manufacturers (point of sales, medical instrumentation, industrial automation, security systems, video surveillance, automotive, building automation ...) can right now rely on this new technology to build safety wireless network applications while freeing themselves from wiring constraints.

Technical characteristics overview

Serial port	Full RS232 (SUB D9 connector) serial interface, 250 Kbps
WiFi network	Compliant to the IEEE 802.11a/b/g/h 2.4 / 5 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's AR5414 (AR5006XS) chip set, single channel rapid roaming (< 50 mS)
Data rate	Up to 108 Mbps (Super AG mode)
Channels	13 channels (b/g modes), 8 channels (a mode), 11 channels (h mode)
Output power	Transmitter +20 dBm (TPC)
Sensitivity	Receiver -92 dBm for IEEE 802.11 a/g and -95 dBm for IEEE 802.11b
Antenna	One 2 dBi bi-band external antenna, RP-SMA connector
Modulation	OFDM: BPSK, QPSK, 16QAM, 64QAM DSSS: DBPSK, DQPSK, CCK
Security	64/128 bits WEP, WPA-PSK, WPA2-PSK, IEEE 802.1x (RADIUS)
Modes	Support for TCP Client/Server, DHCP Client, TELNET RFC2217 extension, Telnet Server, COM port re-director (VIP), multipoint or point to point virtual link over UDP modes and MODBUS/TCP Client/Server, MODBUS/RTU & MODBUS/ASCII protocols, direct communication (ad hoc) or from access point
Administration	Thanks to its built-in WEB interface, the setup of the device is achieved using any web browser installed on your computer (Internet Explorer, Netscape, Mozilla ...), SNMP agent, ACKSYS NDM, TELNET from the serial link
Operating systems	Windows, Linux, UNIX as well as any operating system supporting TCP/IP
Signaling	TxD / RxD serial and WLAN radio activity on LEDs
Power supply	+5VDC power source on jack connector
Consumption	3.5 Watts typical, 5 Watts maximum
Dimensions	Compact metallic enclosure (L: 103 x W: 67 x H: 24 mm)
Environment	Operating temperature: -0°C to +70°C, storage: -65 to +100°C Humidity: 5% to 95% (non-condensing)

Ordering references

WLg-DONGLE	Single channel serial server and serial MODBUS to MODBUS/TCP data gateway with RS232 interface (SUB D9) to the wireless WiFi Network (IEEE 802.11 a/b/g/h), with COM port redirection software, external antenna and power supply
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