



Product Description

The Point-to-Point (PtP) Wireless Ethernet System (WES) is a wireless transmission system that operates in the license free 5 GHz band. The system is designed as a plug and play 10/100 CAT5/Ethernet cable replacement device. A secure encryption method is used to prevent unauthorized access to the system. The WES modules transmit bi-directional data at up to 20+ Mbps in standard mode and up to 50+ Mbps in turbo mode. The WES provides connectivity for IP devices such as: IP cameras, DVRs, encoder/decoders and web servers in ranges from 150m to 3.2km (500 ft to 2 miles). In applications where it is not possible, cost effective or desirable to run a cable, WES is an ideal solution.

Product Features

- 20+ Mbps standard mode, 50+ Mbps in turbo mode
- 5 User Selectable Channels, 802.11a technology
- Plug and Play operability
- Compact billet aluminium casing
- Secure Encrypted Transmission
- Web browser interface for advance operation
- Ranges from 150m to 3.2km (500 ft to 2 miles)
- LED indicators for quick set up and diagnostics

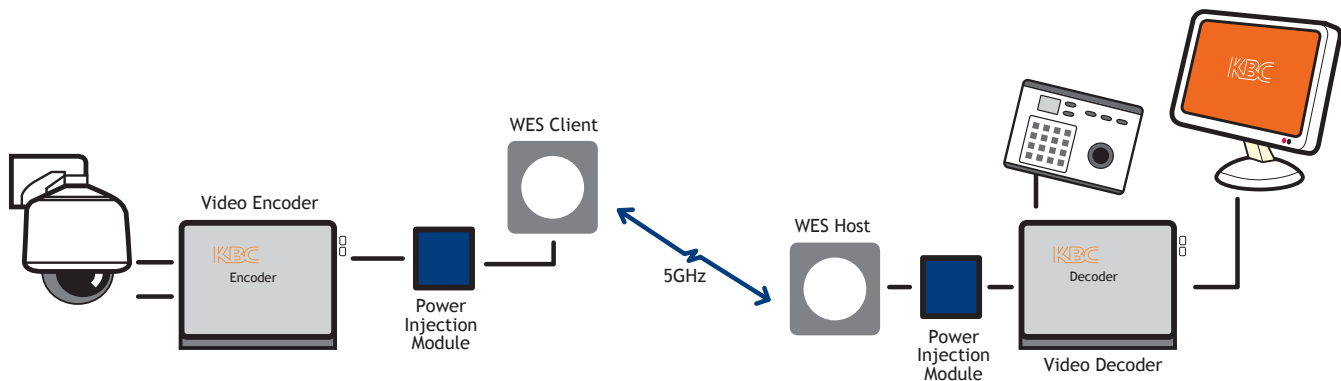


WES-2500



WES-2-4

Typical System Configuration



Specifications

RF Section

Power Output	50 W EIRP @ 5.8 GHz (maximum)
Transmitting Frequency	5.725 - 5.825 GHz (U-NII-3 / ISM)
Channel Capacity	5 non-overlapping channels 5.8 GHz Band - 5745, 5765, 5785, 5805, 5825
Modulation	OFDM
Latency	<10 milliseconds
Receiver Sensitivity	-82dBm for maximum data rate
Polarization	Linear, horizontal or vertical
Antenna Type & Gain	Small patch, 5.8dBi @ 5.8 GHz 6x6 patch, 16.7dBi @ 5.8 GHz Small patch in 18" dish, 24dBi @ 5.8 GHz
Beam Width	Small patch -90°, 6x6 patch -24° & 46cm/18" dish -8°
Data Throughput Rate	Up to 20+ Mbps - std mode, 50+ Mbps- turbo mode (2 channels maximum)
FCC ID	JRRWES
Industry Canada	4887A-WES

Mechanical

Physical	Environmental, sealed, billet aluminum, powder coated housing with UV stabilized PVC radome
Dimensions	26mm x 54mm x 41mm (1.0" x 2.125" x 1.625")
Weight	31g (1.1 oz)

Power

Power Requirements	12 - 20 VDC @ 3 W (Reverse voltage protected)
Power Method	Power-over-Ethernet (PoE) via power injector module ("mid-span" compliant - pins 4, 5 positive - pins 7,8 ground)
Connector	RJ45 - in and out of power injection box
Cable Specifications	100 Meters (328 Feet) on 24 AWG CAT- 5 cable

Environmental

Humidity	95% non-condensing
Operating Temperature	-40° ~ +66° C (-40° ~ +150° F)

Management

Interface	10 / 100 Base T, half / full duplex, rate auto negotiated (802.3 compliant)
Frequency Selection	Rotary switch - channels 0 - 7
Web Browser Interface	User ID / Password, Super Mode, IP Address, WPA2 AES and WEP Encryption
Access Method	Time division duplexing/Time division multiple access (TTD / TDMA)
Protocols Used	IPV4, UDP, TCP, ICMP, Telnet, HTTP, FTP, SNMP
Network Management	HTTP

Part Numbers

	Antenna Type	Approximate Transmission Distance ⁽¹⁾
WES-2500	Radio w/ integrated directional patch antenna on both WES	0-760m (2500 ft)
WES-2	Radio w/ integrated directional 6x6 patch antenna on both WES	0-3.2km (2 miles)

Each WES Kit Includes: 2 x RF module with integral patch antenna, 2 x Pole/wall mount brackets and hardware, 2 x PoE power injection modules with power supplies

1. Transmission distance is provided for reference only and cannot be taken as an absolute figure.

Power Injection Module Specifications

Mechanical

Physical	Plastic housing, not weatherproof
Dimensions	26mm x 54mm x 41mm (1.0" x 2.125" x 1.625")
Weight	31g (1.1 oz)
Interface	2 - RJ45 connectors

Environmental

Humidity	Not weatherproof, PIM unit must be enclosed
Operating Temperature	-29° ~ +66° C (-20° ~ +150° F)

Power

Power Supply	120VAC. 50/60Hz, 10W input 12 VDC 500 mA output (UL / cUL listed wall transformer supplied)
Power-over-Ethernet (PoE)	PoE "mid-span" compliant (pins 4,5 positive - pins 7,8 ground)
Indicator	LED - green
Connectors	DC Jack 2.5mm x 5.5mm

Due to ongoing technological improvements, product specifications are subject to change without notice.