comnet
Communication Networks

Industrially Hardened High Performance Outdoor Wireless Bridge

NWK(1,2)[IC]

netwave®

HARDENED	⚡PD	⚡PSE	IP67	10/100 ETHERNET	GIGABIT ETHERNET
-40° TO 75°C	IEEE802.3at	IEEE802.3at	IP67	1	1

The NetWave® NWK(1,2)[IC] Industrial Grade high performance wireless transmission kit includes a Client and an Access Point. These radios kits are ideal for high capacity and scalable deployments where channel overlapping and interference typically cause our discounted competitors radios to become unstable. The wide range of channel spectrum widths available on the NWK(1,2)[IC] series of radios gives you the option of narrowing channel bandwidths as your network grows which will increase the number of non-overlapping channels and improve stability.

The NWK(1,2)[IC] comes standard with an integrated antenna and an IP67 rated impact resistant polycarbonate enclosure that is designed to survive the most extreme conditions. The NWK1 is FCC certified for use in the United States. The NWK2 is ETSI, DFS and TPC certified for use in the European Union. The NWK1IC is certified for use in Canada.

FEATURES

› New and improved impact resistant polycarbonate enclosure

› Up to 500 Mbps Throughput (subject to environmental conditions)

› 20, 40, and 80 Mhz Channel Bandwidth Support

› 802.11a/n/ac Compliant

› Distances up to 2 mi (FCC, IC) or 2 km (ETSI)

› IEEE802.3at PoE Compliant PD on port 1

› IEEE802.3af power source (PSE) available on port 2

› Environmentally Hardened -40° to +75°C

› Meets class IP67 dust and water immersion protection standards

› Secure transmission: WPA2 – AES or TKIP encryption

› ComNet Antenna alignment feature eases installation and setup

› Antenna Alignment Tools

› LED array displays unit operational status along with received signal strength

› Firmware Upgrades Included Free for the life of the product

› Installation and Configuration Trainings Available

› Radio Internal Components covered by Lifetime Warranty.

› *Enclosure covered by Three Year Warranty.

APPLICATIONS

› High-Bandwidth Video Surveillance

› Multipurpose Networks

› ITS Applications

LIFETIME WARRANTY   **WWW.COMNET.NET**   TECH SUPPORT: 1.888.678.9427

SPECIFICATIONS

Software Features

Addressing	Static IP / DHCP Client / DHCP Server
SNMP	V3
Dynamic DNS	802.1q VLAN support
Embedded Firewall	QoS support
Ability to Assign Static Routes	
Spanning Tree Protocol support	
802.1x Port-Based Network Access Control	
User-Configurable Watchdog and Auto-Reboot Mechanism	
Multi-Level Configuration and Monitoring Login Accounts	
User Configurable Long Range Parameters	

Wireless Radio

EIRP	NWK1 (FCC, IC): Up to +36 dBm for point to multipoint deployments, +49 dBm for point to point deployments with MAC-lock feature enabled NWK2 (ETSI): +30 dBm
RF Output	+30 dBm Rated Transmitter
Operational Frequency	5180 MHz – 5825 MHz, Region-dependent. Not all frequencies are supported in all regions. Contact ComNet for frequencies supported in your region.
Bandwidths	20, 40, and 80 Mhz

Standard Internal Antenna

Antenna	Internal 20 dBi Dual Polarized Directional
Gain	20 dBi
Azimuth	17° Horizontal/Vertical
Elevation	17° Horizontal/Vertical

Connectors

Gigabit Ethernet	Port 1 RJ-45, Sealed Cable Gland
10/100 Ethernet	Port 2 RJ-45, Sealed Cable Gland

Power

Power Consumption	5 W Max
PD Power	IEEE802.3af/at pass-through PD compliant
PSE Power	IEEE802.3af PSE compliant uplink

Mechanical

Indicating LEDs	Power On Ethernet Link Signal Strength
Size (L × W × H)	10.6 × 10.6 × 2.9 in (27 × 27 × 7.5 cm)
Shipping Weight:	< 4.4 lb / 2 kg

Environmental

MTBF	>100,000 hours
Operating Temp	-40° C to +75° C
Storage Temp	-40° C to +85° C
Relative Humidity	5% to 95%, non-condensing[1]
Wind Load	132N(Front) at 200 km/h

Warranty

Internal Components	Lifetime
Enclosure	3 Year

NOTE: In a continuing effort to improve and advance technology, product specifications are subject to change without notice.

AGENCY COMPLIANCE

FC PART 15 COMPLIANT   CE   RoHS

Low Power Consumption

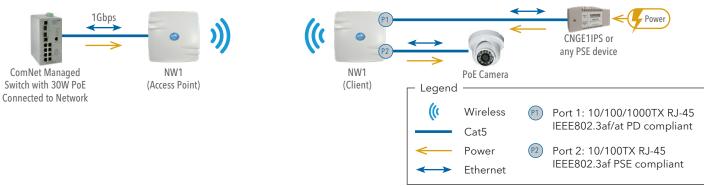## ORDERING INFORMATION

Part Number	Description
NWK1	Industrially Hardened Point-to-Point Wireless Ethernet Kit, Supports distances up to 2 mi/3.2 km, FCC certified for North America
NWK2	Industrially Hardened Point-to-Point Wireless Ethernet Kit, Supports distances up to 2 km/1.25 mi, ETSI certified for European Union
NWK1IC	Industrially Hardened Point-to-Point Wireless Ethernet Kit, Supports distances up to 2 km/1.25 mi, IC certified for Canada
Included Accessories	Pole Mounting Hardware Kit
Options (Extra charge, consult factory)	NWBKT - Articulating Wall or Pole Mounting Kit. Supports up to 3in/76mm diameter poles. (Sold Separately) CNGE1IPS - Hardened 35 W Midspan 1 Gbps Power Injection Module for Passthrough PoE Applications supporting 90-264V AC Input and 56V DC Output [1] Add suffix '/C' for Conformally Coated Circuit Boards to extend to condensation conditions (Extra charge, consult factory)

TYPICAL APPLICATION

1Gbps

ComNet Managed Switch with 30W PoE Connected to Network

NW1 (Access Point)

P1   P2

NW1 (Client)

PoE Camera

Power

CNGE1IPS or any PSE device

Legend

(((	Wireless
———	Cat5
⟶	Power
⟷	Ethernet

P1 Port 1: 10/100/1000TX RJ-45 IEEE802.3af/at PD compliant

P2 Port 2: 10/100TX RJ-45 IEEE802.3af PSE compliant

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24 Feb 2021

Low Power Consumption

an ACRE brand