

2.4GHz 802.11n 300Mbps Outdoor Wireless AP



Rugged and Durable Outdoor Wi-Fi Solution

The 802.11n Outdoor Wireless AP comes with the **IP67**-rated aluminum case, enormously protected from dust and water immersion. It adopts the mature technology of **IEEE 802.11n 2T2R** standard with maximum connectivity and **300Mbps** performance in **2.4GHz** frequency band. By connecting high-gain antenna through the flexible N-type connectors, it is easy to achieve various outdoor long-distance applications and capable to adapt to any rough environment.



PoE Function

For the maximum adaptability and stability in the rugged environment, the 802.11n Outdoor Wireless AP not only comes with **IP67**-rated aluminum die-cast housing, but also adopts the enterprise-level Qualcomm kernel, capable of withstanding wide temperature ranging from **-40 to 70** degrees C. With the IEEE 802.3af/at PoE, the 802.11n Outdoor Wireless AP can be easily installed in the areas where power outlets are not available. Furthermore, it is also suitable to be integrated with Solar Power PoE System to offer wireless services even in the suburbs.

Industrial Wireless LAN and LAN

- Compliant with the IEEE 802.11b/g/n wireless technology
- 2T2R architecture with data rate of up to 300Mbps
- Equipped with 10/100Mbps RJ45 port, auto MDI/MDI-X supported

Fixed-network Broadband Router

- Supported WAN connection types: DHCP, Static IP, PPPoE
- Supports Port Forwarding and DMZ for various networking applications
- Supports DHCP server in Gateway/WISP mode

RF Interface Characteristics

- Two built-in N-type connectors
- High output power with multiply-adjustable transmit power control

Outdoor Environmental Characteristics

- IP67-rated sturdy aluminum case
- IEEE 802.3af/at Power over Ethernet design
- Operating temperature: -40~70 degrees C

Multiple Operation Modes and Wireless Features

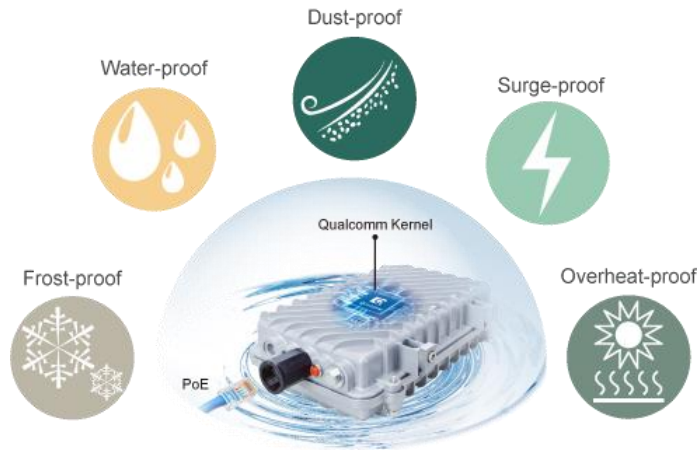
- Multiple operation modes: AP, Gateway, Repeater, WDS, WISP
- WMM (Wi-Fi multimedia) provides higher priority to multimedia transmitting over wireless
- Coverage threshold to limit the weak signal of clients occupying session
- Real-time Wi-Fi channel analysis chart and client limit control for better performance

Secure Network Connection

- Full encryption supported: 64-/128-bit WEP, WPA/WPA2, WPA-PSK/WPA2-PSK and 802.1X RADIUS authentication
- Supports 802.1Q VLAN and SSID-to-VLAN mapping
- Supports IP/Port/MAC address/URL filtering, DoS, SPI Firewall
- Supports DMZ and Port Forwarding
- Bandwidth control per IP address to increase network stability

Easy Deployment and Management

- Supports AP Controllers in AP mode
- Easy discovery by Smart Discovery
- Self-healing mechanism through system auto reboot setting
- System status monitoring through remote Syslog Server
- Supports DDNS/ Easy DDNS



Environmental Adaptations in Outdoor Area

Designed for Heavy Data Transmission Traffic

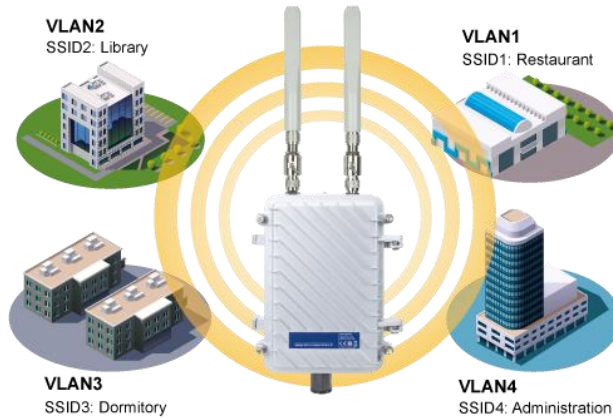
With larger memory capacity and faster CPU clock speed, the 802.11n Outdoor Wireless AP is capable of withstanding high frequency of user access and heavy data transmission traffic in the densely-populated area. To have a suitable coverage threshold, the product can flexibly control the client access, efficiently limit unreachable clients and retain bandwidth for authorized users. To provide maximum performance, the 802.11n Outdoor Wireless AP can implement up to 8 operation modes where a multitude of applications can be had for communities, warehouses, campuses, harbors, etc.

Efficient Client Control



Multiple SSIDs with VLAN Tagging

As for security, the 802.11n Outdoor Wireless AP supports WPA/WPA2, and the 802.1X RADIUS authentication to secure the wireless connection. Besides, the supported IEEE 802.1Q VLAN allows multiple VLAN tags to be mapped to multiple SSIDs to distinguish the wireless access. This makes it possible for the 802.11n Outdoor Wireless AP to work with managed Ethernet switches to have VLANs assigned to a different access level and authority.



Multi-SSIDs + VLANs

Optimized Efficiency in AP Management

The brand-new GUI configuration wizard helps the system administrator easily set up the 802.11n Outdoor Wireless AP step by step. Besides, the built-in Wi-Fi analyzer provides real-time channel utilization to prevent channel overlapping to assure greater performance. With the automatic transmission power mechanism, distance control and scheduling reboot setting, the 802.11n Outdoor Wireless AP is easier for the administrator to deploy and manage without on-site maintenance. Moreover, you can simply install AP controller software, **SAPC (Smart AP Control)**, to deliver wireless profiles to multiple APs simultaneously, thus making the central management simple.

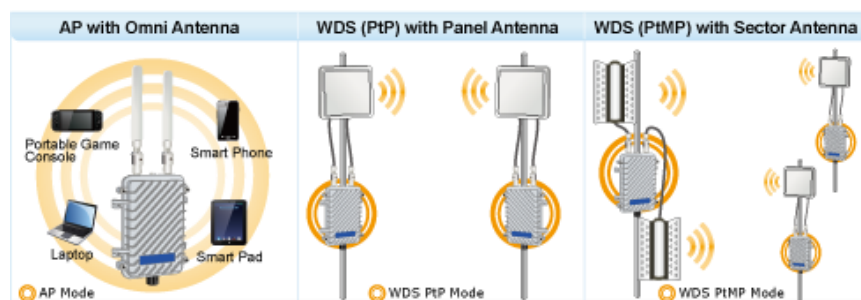


Applications

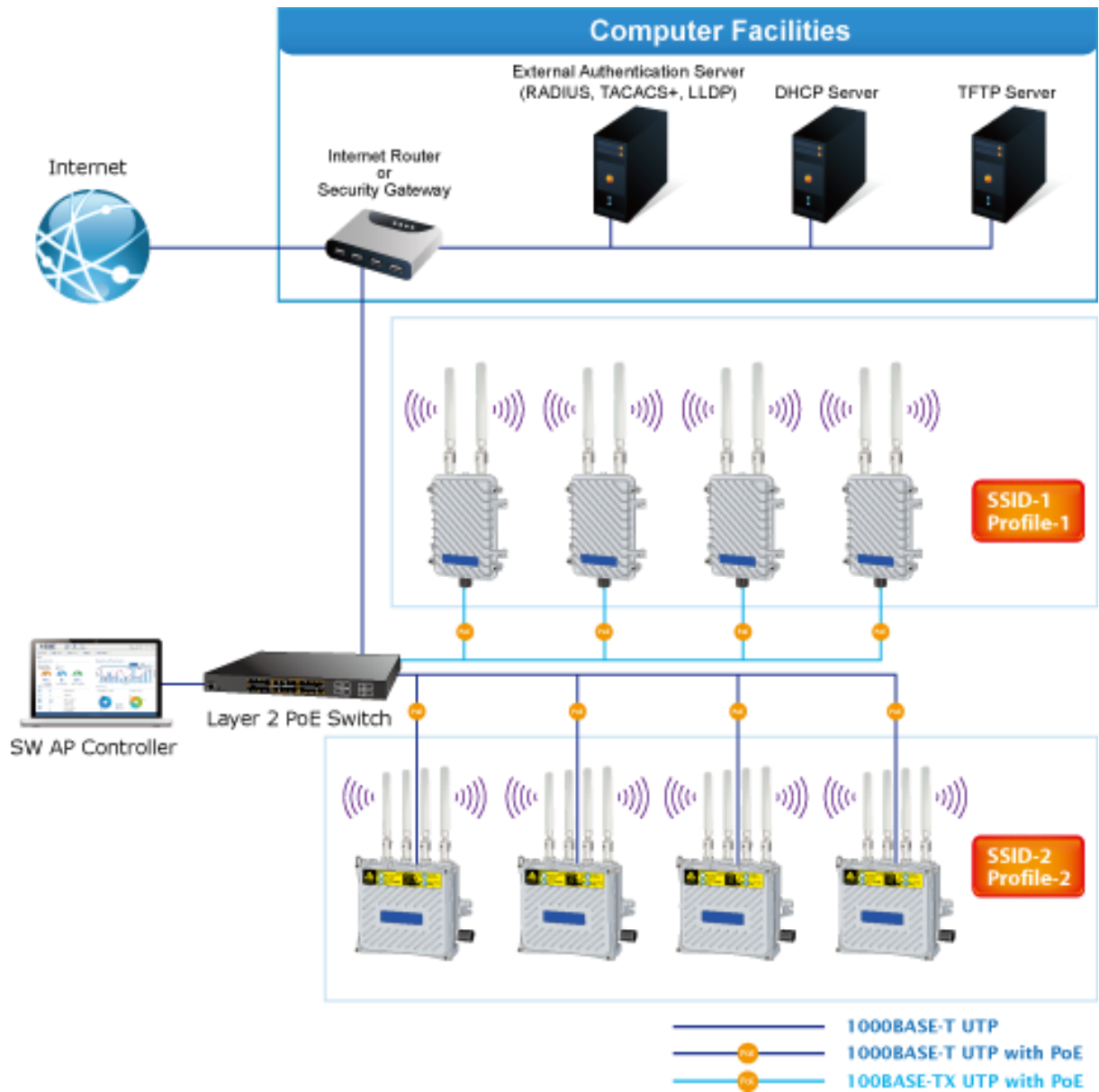
Flexible Hardware and Software Characteristics for Various Applications

With a specific antenna connected through the built-in N-type connectors and eight operation modes, the 802.11n Outdoor Wireless AP greatly benefits the system integrator as a multitude of applications can be had for communities, warehouses, campuses, harbors, etc. Designed to be adapted to any rigorous environment, the 802.11n Outdoor Wireless AP comes with a IP67-rated aluminum case and standard PoE power scheme, thus eliminating the difficulty in the outdoor wireless LAN deployment.

Flexible Deployment with Various Antennas



Furthermore, compatible with the latest Smart AP Control, the 802.11n Outdoor Wireless AP can assist administrators in managing the network centrally with ease.



**Matching the 802.11n Outdoor Wireless AP with the related products to get the best results is recommended.

Specifications

Hardware	
Standard Support	IEEE 802.11b/g/n IEEE 802.11i IEEE 802.3 10BASE-T IEEE 802.3u 100BASE-TX IEEE 802.3x flow control
Material	Aluminum
Dimensions (W x D x H)	153.2 x 79.5 x 234.5 mm
Weight	2kg
Power Requirement	48V 0.5A, IEEE 802.3af/at PoE+
Power Consumption (max.)	< 13W
Mounting Type	Mast mounting
Interface	Wireless IEEE 802.11b/g/n, 2T2R PoE LAN: 1 x 10/100BASE-TX, auto-MDI/MDIX, 802.3af/at PoE In
Button	Reset button
Antenna	Two built-in N-type connectors
Data Rate	IEEE 802.11b: 1, 2, 5.5, 11Mbps IEEE 802.11g: up to 54Mbps IEEE 802.11n (20MHz): up to 150Mbps IEEE 802.11n (40MHz): up to 300Mbps
Media Access Control	CSMA/CA
Modulation	802.11g/n: OFDM (BPSK/ QPSK/ 16QAM/ 64QAM) 802.11b: DSSS (DBPSK/ DQPSK/ CCK)
Frequency Band	FCC: 2.412~2.462GHz ETSI: 2.412~2.472GHz
Operating Channels	FCC: 1~11 Channels ETSI: 1~13 Channels
Max. Transmit Power (dBm)	FCC: up to 29 ± 1dBm ETSI: < 20dBm (EIRP)
Receiver Sensitivity (dBm)	802.11b(1Mbps):-95dBm 802.11b(11Mbps):-90dBm 802.11g(6Mbps):-90dBm 802.11g(54Mbps):-72dBm 802.11n HT20(MCS0/MCS8):-90dBm 802.11n HT20(MCS7/MCS15):-72/-68dBm 802.11n HT40(MCS0/MCS8):-90dBm 802.11n HT40(MCS7/MCS15):-72/-68dBm
Environment & Certification	
Operating Temperature	-40 ~ 70 degrees C
Operating Humidity	10 ~ 90% (non-condensing)
IP Level	IP67
ESD Protection	± 8kV air-gap discharge ± 4kV contact discharge
Surge Protection	± 4kV
Regulatory	CE, RoHS
Software	
LAN	Static IP Supports IP-MAC binding
WAN Type (GWWISP mode)	<ul style="list-style-type: none"> ■ Static IP ■ Dynamic IP ■ PPPoE
Wireless Modes	<ul style="list-style-type: none"> ■ Access Point ■ Gateway ■ Repeater ■ WDS (AP/Bridge/Station) ■ WISP
Channel Width	20MHz, 40MHz
Encryption Type	64-/128-bit WEP, WPA, WPA-PSK, WPA2, WPA2-PSK, 802.1X
Wireless Security	Enable/Disable SSID Broadcast Wireless MAC address filtering User Isolation
Max. SSIDs	4
Max. Wireless Clients	64 per radio (50 is suggested, depending on usage)
Max. WDS Peers	4
Wireless QoS	Supports Wi-Fi Multimedia (WMM)
Wireless Advanced	Auto Channel Selection 5-level Transmit Power Control (100%, 75%, 50%, 25%, 12.5%) Client Limit Control, Coverage Threshold Distance control (Auto Ack Timeout) Wi-Fi channel analysis chart
Status Monitoring	Device status, wireless client List PLANET Smart Discovery DHCP client table System Log supports remote syslog server

VLAN	IEEE 802.1Q VLAN (VID: 3~4094) SSID-to-VLAN mapping up to 4 SSIDs
Self-healing	Supports auto reboot settings per day/hour
Management	Remote management through DDNS/ Easy DDNS Configuration backup and restore Supports UPnP Supports IGMP Proxy Supports PPTP/L2TP/IPSec VPN Pass-through SNMP v1/v2c/v3 support, MIB I/II, Private MIB
Central Management [1]	Applicable controllers: WAPC-500, WAPC-1000 and Smart AP Control(SAPC) *Remarks[1]: the feature will be supported through firmware/system upgrade.