



# High-Power Wireless AC1750 Dual-Band Gigabit PoE Access Point

450 Mbps Wireless N (2.4 GHz) + 1300 Mbps Wireless AC (5 GHz), WDS, Wireless client isolation, 27.5 dBm, wall-mount Part No.: 525787

Add performance and security to your business' wireless network with the Intellinet High-Power Wireless AC1750 Dual-Band Gigabit PoE Access Point.

#### **Concurrent 2.4 and 5 GHz Performance**

The main benefit of a dual-band AC access point is the ability to shift traffic from the congested 2.4 GHz band to the relatively uncluttered 5 GHz space. So, you can use the 2.4 GHz band for your everyday tasks, such as surfing the Internet, social media or e-mail, while the 5GHz AC band can be used for heavy-duty traffic like the important VoIP calls in your business environment.

#### **Backward Compatible**

AC is the next generation of wireless technology, providing faster speed and improved coverage. But if none of the devices you own support Wireless AC, never fear — the Intellinet High-Power Wireless AC1750 Dual-Band Gigabit PoE Access Point is backward compatible with older 802.11b/g/n/a devices, so you can connect virtually any of your wireless devices to it.

#### Fast Roaming through 802.1X PMK Caching

Every time an 802.1X EAP-enabled client moves from one access point to another, it has to re-authenticate. While that process is generally quick, it still can cause disruptions in voice-over-IP calls due to the small delay created by the authentication. This is where 802.1X caching comes in. This technology virtually eliminates that delay by caching Pairwise Master Keys (PMK), making seamless roaming truly a reality. Your mobile WiFi users will thank you for that.

#### **Power over Ethernet Ports**

The Intellinet High-Power Wireless AC1750 Dual-Band Gigabit PoE Access Point comes with a PoE+ PD port. This port can be used to power the AP from an IEEE 802.3at PoE+-compliant LAN switch, which is very convenient in situations where AC power is not readily available. Should you prefer to use a power adapter instead of PoE, that's okay, too, since we have included a standard 12V power adapter.

#### **Secure Communications**

The Intellinet High-Power Wireless AC1750 Dual-Band Gigabit PoE Access Point provides maximum wireless security by supporting 802.1x user authentication for external RADIUS servers and, thanks to its internal RADIUS server, the access point can be used as the authentication server for 256 different user accounts in smaller to medium-sized networks. Other security features included in this access point are MAC address filtering, disable SSID broadcast and support for the latest wireless encryption mechanisms.

#### Features:

Super long-range indoor Wireless AC access point and WDS

For more information on Intellinet products, consult your local dealer or visit www.intelllinet-network.com. All names of products or services mentioned herein are trademarks or registered trademarks of their respective owners. Distribution and reproduction of this document, and use and disclosure of the contents herein, are prohibited unless specifically authorized.



- The latest in wireless technology transfer delivers up to 1.3 Gbps (5 GHz) and 450 Mbps (2.4 GHz) speeds
- Simultaneous dual-band operation (2.4 GHz and 5 GHz) provides twice the bandwidth
- Gigabit Ethernet port for a super-fast wired connection
- Complies with the IEEE 802.3az (Energy Efficient Ethernet EEE) specification
- Multiple ESSIDs support VLAN tagging
- Create up to 32 SSIDs: 16 SSIDs for 2.4 GHz, 16 SSIDs for 5 GHz
- Supports up to 50 active users per SSID
- Supports a total of 100 active user connections; 50 at 2.4 GHz and 50 at 5 GHz
- Load balancing adjust the maximum amount of users per SSID
- Ultra-fast roaming between access points thanks to 802.1X PMK caching
- Integrated RADIUS authentication server for 256 accounts
- Supported modes: access point, WDS
- Supports Wi-Fi Protected Setup (WPS)
- Supports WEP and WPA/WPA2 (TKIP and AES) data encryption
- Wireless client isolation (L2, access point mode)
- QoS (Quality of Service) bandwidth management
- Automatic search for least congested WLAN channel for optimal performance
- Supports SNMP v1, v2c and v3
- PoE-enabled, no need to install near a traditional power source
- IEEE 802.3at-compliant PoE-powered device with one PoE+ (PD) port
- Power and status LED can be disabled to make the device even less conspicuous
- Easy installation through Web-based user interface
- Detailed statistics for connected wireless clients
- Firmware upgradeable
- Includes mounting bracket and power adapter
- Three-Year Warranty

### **Specifications:**

### Standards

- IEEE 802.1d (Spanning Tree Protocol)
- IEEE 802.11a (54 Mbps Wireless LAN)
- IEEE 802.11b (11 Mbps Wireless LAN)
- IEEE 802.11ac (1.3 Gbps Wireless LAN)
- IEEE 802.11g (54 Mbps Wireless LAN)
- IEEE 802.11n (450 Mbps Wireless LAN)
- IEEE 802.1x (Network Access Control)
- IEEE 802.3 (10Base-T Ethernet)
- IEEE 802.3ab (Twisted Pair Gigabit Ethernet)
- IEEE 802.3af (Power over Ethernet 802.3at Type 1)
- IEEE 802.3at (Power over Ethernet 802.3at Type 2)
- IEEE 802.3az (Energy Efficient Ethernet EEE)
- IEEE 802.3u (100Base-TX Fast Ethernet)
- SNMPv1/v2c/v3 (Simple Network Management Protocol)

General



- Gigabit Ethernet PHY: Qualcomm Atheros ETHOS® AR8035
- LAN port: 1 RJ45 10/100/1000 Mbps data and power input port (PD port)
- LAN port: 1 RJ45 10/100/1000 Mbps data and power out port (PSE port, restrictions apply refer to documentation))
- Flash: 16 MB
- Memory: 128 MB DDR2
- USB 2.0 port for save/backup configuration and firmware upgrades
- IPv6, VPN pass-through
- RSTP (Rapid Spanning Tree)
- Certifications: FCC Class B, CE, RoHS

Wireless 5.0 GHz

- Chipset: Qualcomm Atheros QCA9880
- Link speed: up to 1300 Mbps (technically it is 1299 Mbps, 3 x 433 Mbps)
- Wireless frequency range:
- 5.18 5.24 GHz
- 5.26 5.32 GHz
- 5.5 5.7 GHz
- 5.745 5.825 GHz
- Modulation technologies:
- Orthogonal Frequency Division Multiplexing (OFDM): BPSK, QPSK, 16QAM, 64QAM, 256QAM
- Direct Sequence Spread Spectrum (DSSS): DBPSK, DQPSK, CCK
- Channels:
- Country-dependent: 36, 40, 44, 48, 52, 56, 60, 64, 100, 104, 108, 112, 116, 120, 124,
- 128, 132, 136, 140, 149, 153, 157, 161, 165
- Output power:
- 11a: 26.5 dBm @ 6 Mbps
- 11a: 22.5 dBm @ 54 Mbps
- 11a/n (MCS0/MSC8): 27.5 dBm
- 11a/n (MCS7/MSC15): 22.5 dBm
- 11ac (MCS0, VHT20/40/80): 27.5 dBm
- 11ac (MCS9, VHT40): 19.5 dBm
- 11ac (MCS9, VHT80): 19.5 dBm
- Receiver sensitivity:
- 11a (6 Mbps): ?89 dBm
- 11a (54 Mbps): ?72 dBm
- 11a/n (MCS0 HT20): ?89 dBm
- 11a/n (MCS0 HT40): ?86 dBm
- 11a/n (MCS7 HT20): ?66 dBm
- 11a/n (MCS7 HT40): ?68 dBm
- 11ac (MCS0, VHT20/40/80): ?84 dBm
- 11ac (MCS9, VHT40/80): ?56 dBm

Wireless 2.4 GHz

- Chipset: Qualcomm Atheros QCA9558
- Link speed: up to 450 Mbps
- Wireless frequency range: 2.412 2.484 GHz



- Modulation technologies:
- 802.11b: Direct Sequence Spread Spectrum (DSSS): DBPSK, DQPSK, CCK

- 802.11g: Orthogonal Frequency Division Multiplexing (OFDM): BPSK, QPSK, 16QAM, 64QAM

- 802.11n: Orthogonal Frequency Division Multiplexing (OFDM): BPSK, QPSK, 16QAM, 64QAM

- Channels:
- USA & Canada: 11 channels
- Europe: 13 channels
- Japan: 14 channels
- Output power:
- 11b: 27.5 dBm
- 11g: 27.5 dBm @ 6 Mbps
- 11g: 23.5 dBm @ 54 Mbps
- 11n: 27.5 dBm @ MCS0 (HT20/40)
- 11n: 22.5 dBm @ MCS7 (HT20/40)
- Receiver sensitivity:
- 11b: ?93 dBm @ 1 Mbps
- 11b: ?85 dBm @ 11 Mbps
- 11g: ?86 dBm @ 6 Mbps
- 11g: ?72 dBm @ 54 Mbps
- 11n: ?83 dBm @ MCS0 (HT20/40)
- 11n: ?66 dBm @ MCS7 (HT20/40)
- Wireless 2.4 + 5 GHz
- Wireless security:
- WEP encryption (64/128 bit)
- WPA TKIP
- WPA2 AES
- WPA2 mixed
- WPA RADIUS
- Client access control through media access control (MAC) filter
- 256 WLAN MAC address filter
- Adjust transmit power: 10%, 25%, 50%, 75%, 90%, 100%
- 3 x 2 dBi external SMA dipole antennas

### Power

- External power adapter: 12 VDC, 4 A
- Power consumption: 18 watts max.
- Via PoE PD port (IEEE 802.3at)

### Environmental

- Dimensions: 184 (L) x 184 (W) x 36 (H) mm / 7.24 (L) x 7.24 (W) x 1.42 (H) in.
- Weight: 0.6 kg (1.3 lbs.)
- Operating temperature: 0 40°C (32 104°F)
- Storage temperature: -20 60°C (-4 140°F)
- Operating humidity: 10 90% RH, non-condensing



### Package Contents

- High-Power Wireless AC1750 Dual-Band Gigabit PoE Access Point
- 3 external detachable dipole antennas
- Wall mounting kit
- Quick installation guide
- Installation CD
- Power adapter









For more information on Intellinet products, consult your local dealer or visit www.intelllinet-network.com. All names of products or services mentioned herein are trademarks or registered trademarks of their respective owners. Distribution and reproduction of this document, and use and disclosure of the contents herein, are prohibited unless specifically authorized.





For more information on Intellinet products, consult your local dealer or visit www.intelllinet-network.com. All names of products or services mentioned herein are trademarks or registered trademarks of their respective owners. Distribution and reproduction of this document, and use and disclosure of the contents herein, are prohibited unless specifically authorized.