

2.4GHz Wireless LAN



802.11g High-Speed Wireless Access Point

The AirPlusXtreme G^{TM} DWL-2000AP is an enhanced high-performance 802.11g wireless Access Point for use indoors. This device supports wireless networking speeds of up to 54Mbps, while providing seamless interoperability with all existing 802.11b and 802.11b+ wireless equipment. With high data transfer rates, better security and built-in bridge function, this device is the ideal wireless solution that offers an upgrade to a fast, new technology while protecting your past investments through interoperability with your current network equipment.

Up to 54Mbps Speed on 2.4GHz Frequency Band

Providing transmission speeds of up to 54Mbps, the DWL-2000AP compares favorably with 802.11b devices that offer 11Mbps speed, and with 802.11b+ equipment that gives 22Mbps transmission. This enhanced speed and adoption of 2.4GHz frequency, now available for public use in most countries, plus the mobility and convenience inherent in a wireless LAN, make this device an ideal solution for bandwidth intensive WLAN applications.

Compatible With 802.11b and 802.11b+

802.11g/s compatibility with existing wireless LAN standards means that you do not need to change your entire network to maintain connectivity. The DWL-2000AP can transmit data at up to 45Mbps when used with D-Link AirPlusXtremeG and other 802.11g products. You may sacrifice some of this speed when you mix 802.11b and 802.11b+ with this device, but you will not lose the ability to communicate.

Built-in Bridge Functions

The DWL-2000AP can be configured to operate in any one of the 4 modes: (1) as a wireless access point, (2) a point-to-point bridge with another access point, (3) a point-to-multi-point wireless bridge, or (4) a wireless client. With the built-in bridge functions, the DWL-2000AP gives you the flexibility to configure the device to meet your environment's requirements.

Easy Migration to Higher Bandwidth

By maintaining compatibility with your existing wireless network equipment, the DWL-2000AP lets you upgrade to a higher speed at the pace you want. The DWL-2000AP and other 802.11g standard devices can be gradually added to your network, while the rest of your older network remains perfectly connected.

Wi-Fi Protected Access

Enhanced security is provided with Wi-Fi Protected Access to authorize and identify users based on a secret key that changes automatically at a regular interval. Used in conjunction with a RADIUS server, WPA employs TKIP (Temporal Key Integrity Protocol) to change the temporal key every 10,000 packets. This insures much greater security than the standard WEP security, which requires the keys to be changed manually.

802.1x Authentication

The DWL-2000AP supports 802.1x authentication for protection against network intrusion. Used in conjunction with a RADIUS server, this function provides a means to verify the identity of the client before an access to the network is granted.

Pre-Shared Key

This function brings a lot of convenience (when used in conjunction with other 802.11g products) for users that do not incorporate a RADIUS server in their networks. Utilizing the Pre Shared Key mode of WPA, the DWL-2000AP gives each user a new security key every time he connects to the 802.11g network. Users only need to input their encryption information once in the configuration menu. With the DWL-2000AP, each user will automatically receive a new key every time he connects, the inconvenience of manual WEP key input is eliminated.

Embedded DHCP Server

The DWL-2000AP includes an embedded DHCP server that once enabled will automatically assign IP addresses to wireless clients. This unique feature makes the DWL-2000AP an ideal solution for quickly creating and extending a wireless local area network (WLAN) in offices or other workplaces, and at trade shows and other special events.

Features

- 802.11g 2.4GHz standard
- Up to 54Mbps high-speed transmission
- 10/100Mbps port for connection to Fast Ethernet or DSL/cable modem router
- Compatible with existing 802.11b, 802.11b+ wireless devices
- Seamless roaming from cell to cell and across Access Points
- Built-in DHCP server

- 4 operation modes: AP, AP-to-AP bridge, AP-to-multi-point bridge, wireless client
- Detachable reverse SMA dipole antenna
- 64/128-bit WEP data encryption
- Advanced security with WPA, 802.1x authentication, TKIP and Pre-Shared Key
- Web-based configuration & management

DWL-2000AP

Technical Specifications

Standards

- IEEE 802.11g-Draft wireless LAN
- IEEE 802.3 Ethernet/IEEE 802.3u Fast Ethernet

Wireless Data Rates

(With Automatic Fallback) 54 Mbps, 48 Mbps, 36 Mbps, 24 Mbps, 18 Mbps, 12 Mbps, 11 Mbps, 9 Mbps, 6 Mbps, 5.5 Mbps, 2 Mbps, 1 Mbps

Security

- 64/128-WEP data encryption
- 802.1x authentication
- WPA -- Wi-Fi Protected Access (64-, 128-WEP with TKIP, MIC, IV Expansion, Shared Key Authentication)

Media Access Control

CSMA/CA with ACK

Wireless Frequency Range

2.4 - 2.4835 GHz

Modulation Technology

- Orthogonal Frequency Division Multiplexing (OFDM)
- Complementary Code Keying (CCK)

Receiver Sensitivity

- 54 Mbps OFDM, 10% PER, -68 dBm
- 48 Mbps OFDM, 10% PER, -68 dBm 36 Mbps OFDM, 10% PER, -75 dBm
- 24 Mbps OFDM, 10% PER, -79 dBm
- 18 Mbps OFDM, 10% PER, -82 dBm
- 12 Mbps OFDM, 10% PER, -84 dBm
- 11 Mbps CCK, 8% PER, -82 dBm
- 9 Mbps OFDM, 10% PER, -87 dBm
- 6 Mbps OFDM, 10% PER, -88 dBm
- 5.5 Mbps CCK, 8% PER, -85 dBm - 2 Mbps QPSK, 8% PER, -86 dBm
- 1 Mbps BPSK, 8% PER, -89 dBm

Transmit Output Power

15 dBm (32 mW) +/- 2dB

Antenna

2dBi Gain detachable dipole antenna with reverse SMA connector

Wireless Operating Range *

- Indoors: Up to 100 m (328 feet)
- Outdoors: Up to 400 m (1,312 feet)
- * Environmental factors may adversely affect operating range

Device Management

- Web-Based: Internet Explorer v6 or later; Netscape Navigator v6 or later; or other Java- enabled browsers
- DHCP Server and Client

LEDs Power

- WAN
- LAN (10/100Mbps)
- WLAN

Physical & Environmental

Power Input

- DC 5V, 2.0A
- Through external power adapter

Dimensions

142 (L) x 109 (W) x 31 (H) mm (5.6 x 4.3 x 1.2 inches)

Weight

200 grams (0.44 lbs)

Operating Temperature

0° - 55° C (32° - 149° F)

Storage Temperature

-20° - 75° C (4° - 167° F)

95% maximum (non-condensing)

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Emissions

- FCC Class B
- CE Class B

Safety

UL.



Ordering Information

802.11g Access Point

DWL-2000AP 1 RJ-45 10BASE-T/100BASE-TX port

(for connection to Ethernet)

Please specify your model number as follows:

DWL-2000AP/ANA US power adapter, North America frequency DWL-2000AP/EEU EU power adapter, EU frequency

DWL-2000AP/ENA EU power adapter, North America frequency DWL-2000AP/BEU UK power adapter, EU frequency DWL-2000AP/NEU Australia power adapter, EU frequency DWL-2000AP/CN

China power adapter, China frequency, China packaging US power adapter, North America frequency,

TDWL-2000AP Taiwan packaging

BDWL-2000AP US power adapter, North America frequency,

USA packaging

RECYCLABLE

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