



# Quick Install Guide

High Power Dual-Band Wireless 900N Low Profile Access Point





#### Use the XAP-1500 to:

- Deliver Broader Wi-Fi Coverage and Eliminate Client Device Roaming Issues with Fewer APs
- Maximize Data Rates with Concurrent Dual-Band (2.4GHz and 5GHz) Technology
- Optimize VoIP, Streaming Media and Other Demanding Applications
- Create a Secure Guest Network
- Simplify Wi-Fi Installation while Minimizing Setup Time and Costs
- Minimize Unsightly Cables and Equipment

## Ouick Install Guide

## HIGH POWER DUAL-BAND WIRELESS 900N LOW PROFILE ACCESS POINT

Model Number: XAP-1500 FCC ID: W59XAP1500 IC: 8584A-XAP1500

#### Quick Install Guide

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## **DOCUMENT CONVENTIONS**

These graphical alerts are used in this document to indicate notable situations:



**NOTE:** Tips, hints, or special requirements that you should take note of.



**CAUTION:** Care is required. Disregarding a caution can result in data loss or equipment malfunction.



**WARNING!:** Indicates a condition or procedure that could result in personal injury or equipment damage.

## **FCC COMPLIANCE**

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

## CONTACT LUXUL

#### Sales

P: 801-822-5450 F: sales@luxul.com

## Technical Support

P: 801-822-5450 E: support@luxul.com



## **PACKAGE CONTENTS**

The following items should be included in the box:

- ► One: XAP-1500 Dual Band Wireless AP
- ▶ One: Mounting Bracket and Hardware
- ▶ One: PoE Injector and Power Cord
- ► Two: Ethernet Cables
- ► One: Quick Install Guide



**NOTE:** If any of the listed items are missing or damaged, please contact the reseller from whom you purchased for return/replacement.

## HARDWARE DESCRIPTION

#### XAP-1500 LEDs



XAP-1500 Side LEDs

#### XAP-1500 LED Indicators

| Name                              | Status                      | Function   |  |  |
|-----------------------------------|-----------------------------|--|--|--|
| LEDs on the side of the enclosure |                             |  |  |  |
| Power                             | On                          | Indicates the device is on                                       |  |  |
| 2.4GHz                            | On                          | Indicates the configuration and broadcasting of a 2.4GHz network |  |  |
| 5GHz                              | On                          | Indicates the configuration and broadcasting of a 5GHz network   |  |  |
| Ethernet Port LEDs                |                             |  |  |  |
| PoE<br>(Power and Data<br>Input)  | Yellow                      | Connected device is 10/100Mbps                                   |  |  |
|                                   | Green                       | Connected device is 1000Mbps                                     |  |  |
| LAN (Data Out)                    | Yellow or Green<br>Flashing | Indicates data packets are being passed                          |  |  |

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XAP-1500 Rear Port View

## PoE Injector LED Indicators

| Name | Status   | Function  |  |
|------|----------|---|--|
| PoE  | On       | Indicates the PoE Injector is delivering power to the connect 802.3af/at PoE enabled device |  |
|      | Off      | Indicates no power is being delivered to the connected device                               |  |
|      | Flashing | Flashing: An error indicating a power fault   |  |
| PWR  | On       | Power is connected to the PoE Injector  |  |
|      | Off      | Injector is not receiving power   |  |

## PREPARING FOR INSTALLATION

## System Requirements

- ► Computer supporting TCP/IP and equipped with a Web browser. Supported Web browser versions include I.E. 9.0, Firefox 3.6, Safari 5.0, Chrome 6.0, Opera 10.6 and up. The Web browser is used to configure the XAP-1500.
- ▶ Power must be AC 100-240V~0.3A 50/60Hz.

## XAP-1500 INSTALLATION

The XAP-1500 high powered access point is designed for optimal performance as well as for simple and efficient installation and setup. It designed for mounting on the ceiling, wall or placed on a desktop or other flat surface. Because the signal generated by the XAP-1500 is omnidirectional, the unit should be mounted on a ceiling or wall directly in the center of the desired coverage area. Note that orientation of the unit is less important than the mounting location.



## Ceiling and Wall Mounting

The XAP-1500 comes with a circular mounting bracket to mount it to the wall or ceiling. Use the Mounting Pattern (Page 6-7) for mounting bracket alignment.



XAP-1500 mounted on a ceiling

XAP-1500 mounted on a wall

## **Desktop Installation**

Attach the included rubber foot pads to the circular mounting bracket and place on any flat surface



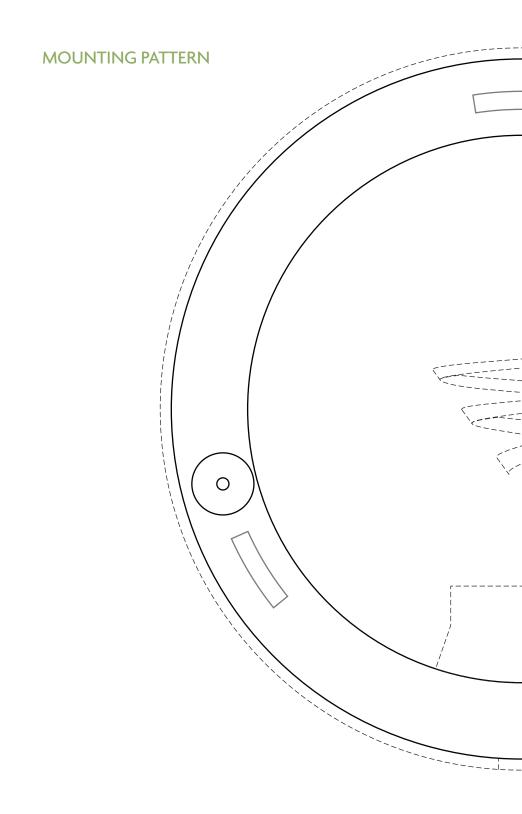
XAP-1500 on a desktop or flat surface

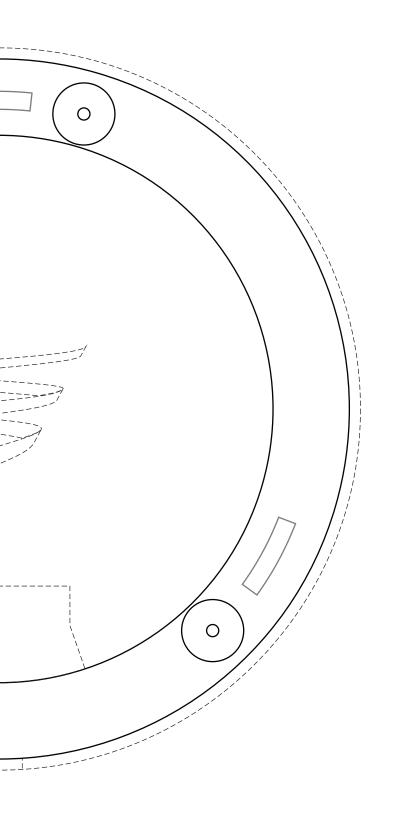


**WARNING!:** The circular mounting bracket is required in all installation positions to allow for adequate airflow.



**CAUTION:** Because the XAP-1500 is a High-Powered access point it is normal for it to be hot to the touch





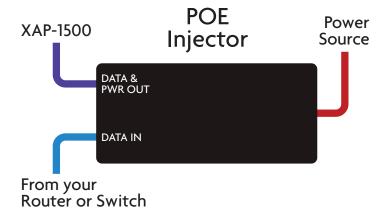
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## Hardware Setup

- ▶ **Data In:** Connect an Ethernet cable from your router or switch to the **Data In** port of the included PoE Injector
- ▶ Data & PWR Out: Connect an Ethernet cable from the Data & PWR Out port of the included PoE Injector to the PoE Port of the XAP-1500
- ▶ **AC Power:** Connect the included AC Cord to the Power Input of the Included Injector first and then to the AC outlet.



**NOTE:** The XAP-1500 is not a router and will need to be connected to a network with a router in order to deliver Internet access.



The PoE Injector combines power and data to the XAP-1500



**CAUTION:** The XAP-1500 will only work properly when connected to the provided PoE Injector .

## **CONFIGURATION**

## **Default IP Address**

The XAP-1500 is not equipped with internal DHCP server. If connected to a Luxul Router, configuration will be automatic. Otherwise, the IP address of the computer for login and configuration will need to be manually configured. The table below lists the default parameters of the XAP-1500.



## Simply Connected

| Parameter:          | Default Value |
|---------------------|---------------|
| Default IP address: | 192.168.0.16  |
| Default user name:  | admin         |
| Default password:   | admin         |

The Luxul Xen XAP-1500 default IP addresss is 192.168.0.16. If the IP address of your router is not set to the 192.168.0.X network, a temporary static IP address must be set on the computer being used for configuration. To do so, set the IP address of the computer to the 192.168.0.X range and then use the default IP address of your XAP-1500 as the Gateway/Router. Once configured, set the computer IP configuration back to "Obtain Automatically/DHCP."



**NOTE:** Go to <a href="http://luxul.com/how-to-videos">http://luxul.com/how-to-videos</a> for videos about changing the IP address of your Operating System.

#### Connect a Client Device

- Connecting a Wireless Client Device: Connect the client device to one of the XAP-1500 default wireless networks (LuxulXen1500\_24 or LuxulXen1500\_5X). Both Wireless networks will run in Open Security mode. A passphrase is not required until Wireless Security is configured.
- ▶ **Connecting an Ethernet Device:** Use Ethernet cable to connect your computer or device to one of the XAP-1500 LAN ports.



**NOTE:** Only devices that support 5GHz will see LuxulXen1500\_5X wireless network.

## Login

## Login to the XAP-1500 with the following steps:

- 1. Open a Web browser, and enter 192.168.0.16. The access point login screen will appear.
- 2. Enter the user name and password (default user name and default password are both set as "admin"), and then click "OK" to login to the access point configuration interface.

## **ADVANCED SETTINGS**

For advanced settings information go to luxul.com

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## WARNINGS AND SAFETY INFORMATION

- Read all installation instructions and site survey reports, and verify correct equipment installation before connecting the XAP-1500 to its power source.
- Verify that the electrical circuits have appropriate grounding and overload protection.
- ▶ Attach only approved power cords to the device.
- Verify there is adequate ventilation around the device, and that ambient temperatures meet equipment operation specifications.
- ▶ The XAP-1500 is designed for indoor use only. DO NOT place this outdoors.
- ▶ DO NOT install in or near hot or humid places, such as a kitchen or bathroom. Take care to minimize exposure to excessive heat or moisture.
- Small parts and plastic bags used for packaging may be harmful to small children. KEEP All ACCESSORIES OUT OF THE REACH OF CHILDREN!
- The XAP-1500 may become hot when in use for extended time periods. This is normal and is not a malfunction. DO NOT install where it will be exposed to paper, cloth or other flammable materials.
- ▶ The XAP-1500 contains no user-serviceable parts. If it is not working properly, contact your dealer and ask for help. DO NOT attempt to disassemble the device.

## REGULATORY COMPLIANCE

The device complies with internationally recognized standards covering human exposure to electromagnetic fields from radio devices. This equipment also complies with FCC radiation exposure set forth for an uncontrolled environment. In order to avoid the possibility of exceeding the FCC radio frequency exposure limits, human proximity to the antenna shall not be less than 20 cm (8 inches) during normal operation.

Unauthorized antennas, modifications, or attachments could cause damage and may violate regulatory approvals. Any changes or modifications not expressly approved by the party responsible for compliance could void the authority to operate the equipment.

The equipment version marketed in the U.S. is restricted to usage of channels 1-11 only.

## Health and Safety Recommendations

**Warnings for the use of Wireless Devices:** Please observe all warning notices with regard to the usage of wireless devices

**Potentially Hazardous Atmospheres:** You are reminded of the need to observe restrictions on the use of radio devices in fuel depots, chemical plants etc. and areas where the air contains chemicals or particles (such as grain, dust, or metal powders).

**Safety in Hospitals:** Wireless devices transmit radio frequency energy and may affect medical electrical equipment. When installed adjacent to other equipment, it is advised to verify that the adjacent equipment is not adversely affected.



## **RF Exposure Guidelines**

**Safety Information:** The device complies with internationally recognized standards covering human exposure to electromagnetic fields from radio devices.

## Warning: Exposure to Radio Frequency (RF) Radiation:

The radiated output of this device is below the FCC radio frequency exposure limits. Nevertheless, the device should be used in such a manner that the potential for human contact during normal operation is minimized.

- ▶ The end user must avoid any extended human RF exposure directly in front of the device, up to a distance of 20cm, when unit is on.
- ▶ When servicing the equipment and selecting a location for the antennas, it is important to note that a minimum distance of 20cm is required between personnel and the device or antenna to comply with the radio frequency exposure limit.
- ▶ The antenna used for this transmitter must be installed to provide a separation distance of at least 20cm from all persons and must not be co-located or operating in conjunction with any other antenna or transmitter.

#### The following safety precautions should be observed:

- Do not touch or move the antenna while the unit is transmitting or receiving.
- Do not hold any component containing the radio such that the antenna is very close or touching any exposed parts of the body, especially the face or eyes, while transmitting.
- Do not operate the radio or attempt to transmit data unless the antenna is connected; this behavior may cause damage to the radio.

## FCC Statement—Wireless FCC 2.4GHz & 5GHz 802.11abgn

Operations in the 5.15-5.25GHz band are restricted to indoor usage only.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one of the following measures:

- ▶ Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- ► Consult the dealer or an experienced radio/TV technician for help.

**FCC Caution:** Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.

This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

## **Radiation Exposure Statement**

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator & your body.



NOTE: (1)The manufacturer is not responsible for any radio or TV interference caused by unauthorized modifications to this equipment.(2) To avoid unnecessary radiation interference, it is recommended to use a shielded RJ45 cable

## Industry Canada (RSS-Gen Issue 2)

This device complies with Industry Canada licence-exempt RSS standard(s). Operation is subject to the following two conditions: (1) this device may not cause interference, and (2) this device must accept any interference, including interference that may cause undesired operation of the device.

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes : (1) l'appareil ne doit pas produire de brouillage, et (2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

This Class B digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

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