



Quick Installation Guide

EAP717 V1.00

Enterprise Access Point

Copyright Notice

This document is protected by USA copyright laws and other laws. Besides, the document is the property of 4IPNET, INC. You may not copy, reproduce, distribute, publish, display, perform, or modify any part of this publication in any form or by any means without prior written permission from 4IPNET, INC. You may not alter or remove any copyright or other notice from copies of the content. All other brand and product names are claimed or registered marks of their respective companies or organizations.

All rights reserved.

To download up-to-date version, please visit www.4ipnet.com.

FCC CAUTION

This equipment has been tested and proven 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 or more 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.

The device contains a low power transmitter which will send out Radio Frequency (RF) signal when transmitting. This equipment complies with FCC RF radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with a minimum distance of 20 centimeters between the radiator and your body.

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 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 device and its antenna(s) must not be co-located or operating in conjunction with any other antenna or transmitter.

If this device is going to be operated in 5.15 ~ 5.25GHz frequency range, then it is restricted in indoor environment only.

CE CAUTION

Declaration of Conformity with Regard to the 1999/5/EC (R&TTE Directive) for European Community, Switzerland, Norway, Iceland, and Liechtenstein

Model: EAP717

For 2.4 GHz radios, the device has been tested and passed the requirements of the following standards, and hence fulfills the EMC and safety requirements of R&TTE Directive within the CE marking requirement.

- Radio: EN 300.328:
- EMC: EN 301.489-1, EN 301.489-17,
- EMC: EN 55022 Class B, EN 55024.+ A1 + A2 including the followings:
 - EN 61000-3-2, EN 61000-3-3.
 - EN 61000-4-2, EN 61000-4-3, EN 61000-4-4,
 - EN 61000-4-5, EN 61000-4-6, EN 61000-4-11
- Safety: EN 60950-1 + A11,

Caution:

- This declaration is only valid for configurations (combinations of software, firmware, and hardware) provided and supported by 4ipnet Inc. The use of software or firmware not provided and supported by 4ipnet Inc. may result in the equipment no longer being compliant with the regulatory requirements.

European standards dictate maximum radiated transmit power of 100mW EIRP and frequency range 2.400-2.4835 GHz. This equipment is intended to be used in all EU and EFTA countries. Outdoor use may be restricted to certain frequencies and/or may require a license for operation. Contact your local regulatory authority for compliance.

Taiwan NCC Statement

根據 NCC 低功率電波輻射性電機管理辦法 規定:

- | | |
|------|---|
| 第十二條 | 經型式認證合格之低功率射頻電機，非經許可，公司、商號或使用者均不得擅自變更頻率、加大功率或變更原設計之特性及功能。 |
| 第十四條 | 低功率射頻電機之使用不得影響飛航安全及干擾合法通信；經發現有干擾現象時應立即停用，並改善至無干擾時方得繼續使用。
前項合法通信，指依電信法規定作業之無線電通信。
低功率射頻電機須忍受合法通信或工業、科學及醫療用電波輻射性電機設備之擾。 |

Preface

The 4ipnet EAP717 Enterprise Access Point is an on-the-wall as well as a ceiling-mounted Wi-Fi IEEE 802.11n/a/b/g 2 x 2 MIMO access point, designed to blend into a working or a living environment practically and elegantly with its simplistic yet classy design. The EAP717 is ideal for appearance accentuated applications such as hotels as it has a small and inconspicuous form factor. The RH11 telephone pass through socket is yet another convenient feature for hotel applications. The two Ethernet LAN Ports eliminates the need for a network switch for additional IP Device connections.

When coupled with the 4ipnet WHG series Controller, the EAP717 supports Tunnel-based AP Management, and comes with all standards demanded by enterprise applications, including business-grade security (802.1X, WPA and WPA2), and multiple ESSIDs with VLAN tags to separate the traffics of different departments. A centralized WLAN management allows enterprises and organizations to support a wide array of value added applications, such as load balancing, bandwidth control, and access control. The patent-pending 4ipWES (Press-n-Connect) technology bridges multiple EAP717s at the touch of a button, which enables a quick and automatic WDS Easy Setup by pressing the WES button on EAP717. Extending wireless network coverage is a breeze, be it across conference rooms or along hallways.

EAP717's high throughput, security and optimal invisibility make it a perfect choice of wireless connectivity for your business.

Package Contents

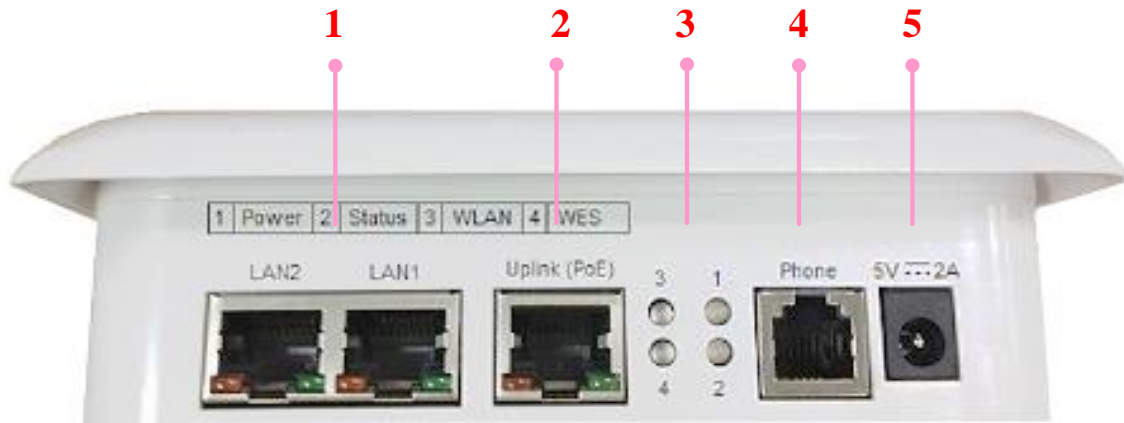
1. 4ipnet EAP717 x 1
2. Quick Installation Guide (QIG) x 1
3. CD-ROM (with User's Manual and QIG) x 1
4. Ethernet Cable x 1
5. Console Cable x 1
6. Power Adapter (DC 5V) x 1 (Optional)
7. Mounting Kit x 1



It is recommended to keep the original packing material for possible future shipment when repair or maintenance is required. Any returned product should be packed in its original packaging to prevent damage during delivery.

System Overview

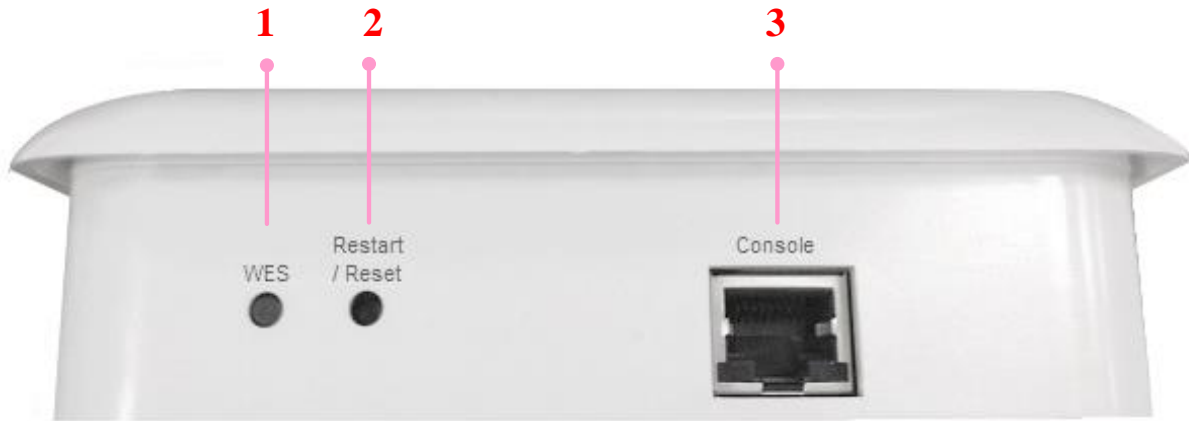
Front Panel



EAP717 Front Panel

1	LAN 1 – 2 Ports	Attach Ethernet cables here to connect to the wired local network.
2	Uplink (PoE) Port	For Uplink connection. This port can be used to connect to a controller, gateway, or directly to the internet. PoE is supported.
3	LED Indicators	4 LED lights. Representation is listed at the top of the panel.
4	Phone Jack	A telephone can bypass to a connected phone line in the back of the AP when connected to the socket.
5	5V 2 A	Attach the power adaptor here.

Rear Panel



EAP717 Rear Panel

1	WES Button	WDS Easy Setup. Press the button to build up a WDS link with another peer.
2	Restart / Reset Button	Press once to restart the system; Press and hold for more than 5 seconds to reset to factory default.
3	Console Port	To access EAP717 via the console interface.

Hardware Installation

Please follow the steps mentioned below to install the hardware of **EAP717**:

Step 1. Place the EAP717 at the best location. The best location is usually at the center of your intended wireless network. If admin would like to mount the AP on the wall (on a socket), please refer to the included EAP717/EAP747/EAP757 Connection Guide. Screw the metal panel to the wall, and then turn the EAP717 clockwise to fasten to the panel. For installation instructions on the Ceiling Mount Kit, please refer to the included Connection Guide.

Step 2. Connect one end of the Ethernet cable to the Uplink port and the other end of the cable to a switch, a router, or a hub. The EAP717 is now connected to your existing wired LAN network.

Step 3. There are two ways to supply power to EAP717

- a) Connect the DC power adaptor to the power jack socket.
- b) The Uplink port is capable of receiving PoE. Connect an IEEE 802.3af/at-compliant PSE device (e.g. a PoE-switch) to the Uplink port of EAP717 with the Ethernet cable.

Now, the Hardware Installation is complete.



- *Please use only the power adapter supplied with the package. Using a different power adapter may damage this system.*
- *To verify the wired connection between the AP and your switch / router / hub, please also check the LED status indicator of the respective network devices.*

Getting Started

4ipnet EAP717 supports web-based configuration. When hardware installation is complete, EAP717 can be configured through a PC by using a web browser such as Mozilla Firefox 2.0 or Internet Explorer version 6.0 and above.

The default values of LAN IP address and subnet mask of EAP717 are:

IP Address: 192.168.1.1

Subnet Mask: 255.255.255.0

Steps:

1. To access the Web Management Interface, connect the administrator PC to the LAN port of EAP717 via an Ethernet cable. Then, set a static IP address on the same subnet mask as EAP717 in TCP/IP of your PC, such as the following example:
IP Address: 192.168.1.100
Subnet Mask: 255.255.255.0
2. Launch the web browser on your PC by entering the IP address of EAP717 (**http://192.168.1.1**) at the address field, and then press **Enter**.
3. The following Admin Login Page will appear. Enter "**admin**" for both the *Username* and *Password* fields, and then click **Login**.



Administrator Login Page

4. After a successful login to EAP717, a **System Overview** page of the Web Management Interface will appear, as depicted below. The Radio Status and AP Status will be shown.

Overview Associated Clients WDS Link Status Event Log

Home > Status > System Overview

System Overview

System

System Name	Enterprise Access Point
Firmware Version	1.00.00
Build Number	1.5-1.6477
Location	
Site	EN-A
Device Time	1970/01/01 08:15:39
System Up Time	0 days, 0:15:39

Radio Status

MAC Address	00:1F:D4:02:32:F7
Band	802.11g+n
Channel	6
TX Power	Highest

LAN Interface

MAC Address	00:1F:D4:02:32:F6
IP Address	192.168.1.1
Subnet Mask	255.255.255.0
Gateway	192.168.1.254

AP Status

Profile Name	BSSID	ESSID	Security Type	Online Clients	Tun
VAP-1	00:1F:D4:02:32:F7	4ipnetAP-A1	Open	0	

CAPWAP

Status	Disabled
--------	----------

The Web Management Interface - System Overview Page

5. To logout, simply click on the **Logout** button at the upper-right corner of the interface to return to the Administrator Login Page. Click **OK** to logout.

Common Settings

Step 1. Change Administrator's Password

The screenshot shows the 'Change Password' page in the 4IPNET web interface. At the top, there are five main menu icons: System, Wireless, Firewall, Utilities, and Status. Below these are five sub-menu tabs: Change Password, Backup & Restore, System Upgrade, Reboot, and Upload Certificate. The 'Change Password' tab is selected. The breadcrumb path is 'Home > Utilities > Change Password'. The main heading is 'Change Password'. The form contains the following fields:

- Name :** admin
- Old Password :**
- New Password :** *up to 32 characters
- Re-enter New Password :**

At the bottom of the form are two buttons: **SAVE** and **CLEAR**.

Change Password Page

- Click on the **Utilities** icon on the main menu, and select the **Change Password** tab.
- Enter the old password and then a new password with a length of up to 32 characters, and retype it in the **Re-enter New Password** field.
- Click **SAVE** to save the changes.

Step 2. Configure General AP (Access Point) Settings

Home > **Wireless** > General

General Settings

Band : 802.11g+802.11n Pure 11n

Short Preamble : Disable Enable

Short Guard Interval : Disable Enable

Channel Width : 20 MHz

Channel : 6

Max Transmit Rate : Auto

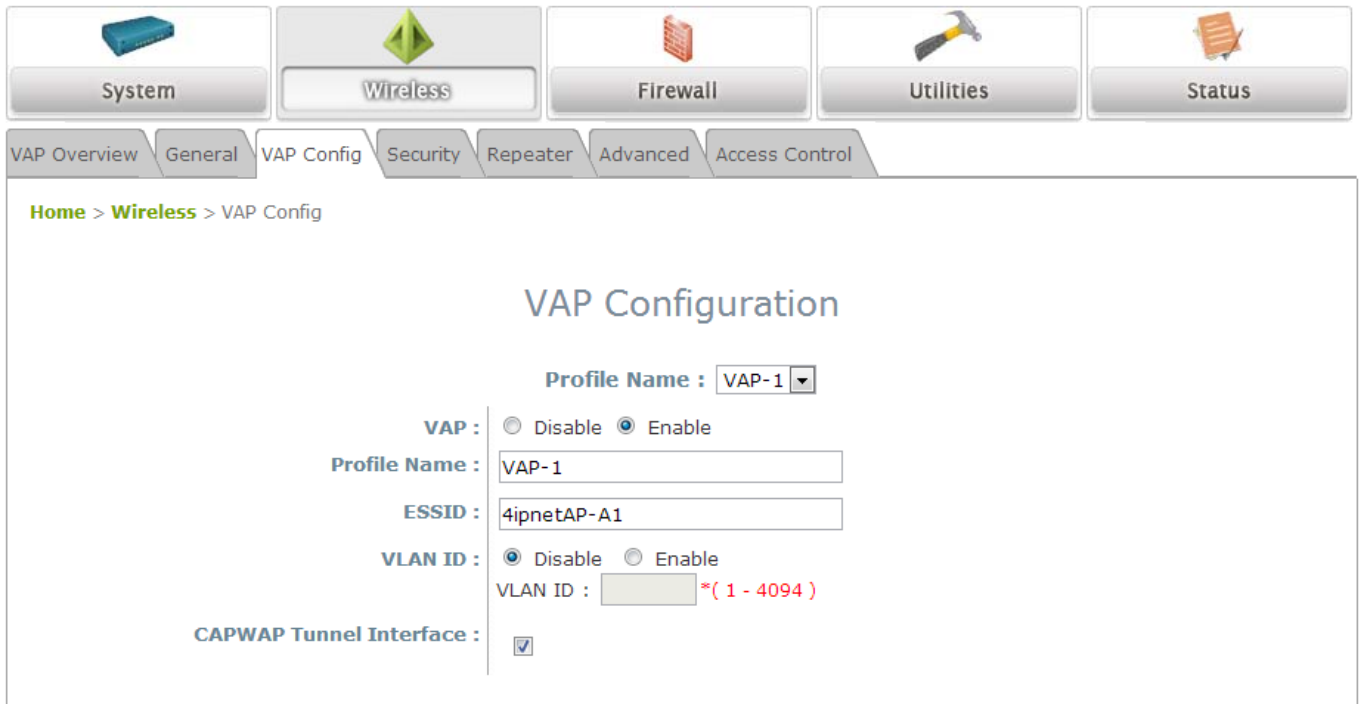
Transmit Power : Highest

Beacon Interval : 100 *(100 - 500ms)

Wireless General Settings Page

- Click on the **Wireless** icon on the main menu, and then select the **General** tab.
- Select the RF card you would like to set up.
- Determine the **Band** and **Channel** settings:
 Select your preferred **Band** and **Channel** for you wireless connection. For example, select **802.11g+802.11n** for the band and 6 for the channel.

Step 3. Configure VAP (Virtual Access Point) Profile Settings



VAP Configuration Page (VAP-1 shown)

- The EAP717 supports up to 8 virtual APs (VAPs).
- Configure VAP profile settings :
 - (a) Select the **VAP Configuration** tab to configure the settings of the desired VAP.
 - (b) Choose a specific RF card to set up
 - (c) Enable a selected VAP from the drop-down menu of **Profile Name** and configure related settings below.
 - (d) Check “CAPWAP Tunnel Interface” if you would like data of this VAP to go through the Controller when the Access Point is managed by CAPWAP.
- Check VAP status :

After finishing VAP configuration, the status of the enabled Virtual APs shall be reflected on the VAP Overview page – **at Wireless > VAP Overview**.

System

Wireless

Firewall

Utilities

Status

VAP Overview | General | VAP Config | Security | Repeater | Advanced | Access Control

Home > Wireless > VAP Overview

VAP Overview

VAP No.	ESSID	State	Security Type	MAC ACL	Advanced Settings
1	4ipnetAP-A1	Enabled	None	Disabled	Edit
2	4ipnetAP-A2	Disabled	None	Disabled	Edit
3	4ipnetAP-A3	Disabled	None	Disabled	Edit
4	4ipnetAP-A4	Disabled	None	Disabled	Edit
5	4ipnetAP-A5	Disabled	None	Disabled	Edit
6	4ipnetAP-A6	Disabled	None	Disabled	Edit
7	4ipnetAP-A7	Disabled	None	Disabled	Edit
8	4ipnetAP-A8	Disabled	None	Disabled	Edit

Virtual AP Overview Page

Step 4. Configure WDS (Wireless Distribution System) Settings (Optional)

System

Wireless

Firewall

Utilities

Status

VAP Overview | General | VAP Config | Security | Repeater | Advanced | Access Control

Home > Wireless > Repeater Config

Repeater Settings

Repeater Type : WDS WES

WDS Profile : RF Card A : WDS Link 1

WDS : Disable

MAC Address :

Security type : None

CAPWAP Tunnel Interface :

To extend the wireless coverage, EAP717 supports up to 4 WDS links for connecting wirelessly to other WDS-capable APs, or peer APs. By default, all WDS profiles are disabled.

- Click on the **Wireless** button on the main menu.
- Select the **Repeater** tab.
- Choose **WDS** as the **Repeater Type**.
- Choose the desired RF card and WDS profile:
 - (a) Enable **WDS**.
 - (b) Enter the **MAC Address** (peer AP) and then Click **SAVE**.

If you are using another EAP717 as the peer AP, simply repeat the above-mentioned steps to configure another peer AP(s).

▶ **Note:**

On each and every configuration page, you may click **SAVE** to save the changes of your configured settings, but you must reboot the system for the changes to take effect. After clicking **SAVE**, the following message will appear: **“Some modifications have been saved and will take effect after Reboot.”**

Congratulations!

Now, 4ipnet EAP717 is installed and configured successfully.



After EAP717's network configuration is completed, please remember to change the IP Address of your PC Connection Properties back to its original settings in order to ensure that your PC functions properly in its real network environments.

- ***It is strongly recommended to back up your configuration settings.***
- ***For further configuration and information, please refer to the User's Manual.***

P/N: V10020131016