

# Aruba Instant On AP22 Access Point

## Installation Guide

The Aruba Instant On AP22 access point delivers high performance concurrent 2.4 GHz and 5 GHz Wi-Fi 6 (802.11ax) functionality with MIMO radios (2x2 in 2.4 GHz, 2x2 in 5 GHz), while also supporting legacy 802.11a/b/g/n/ac wireless services.

### Package Contents

- 1 x AP22 access point
- 1 x Mount bracket
- 1 x Ethernet cable



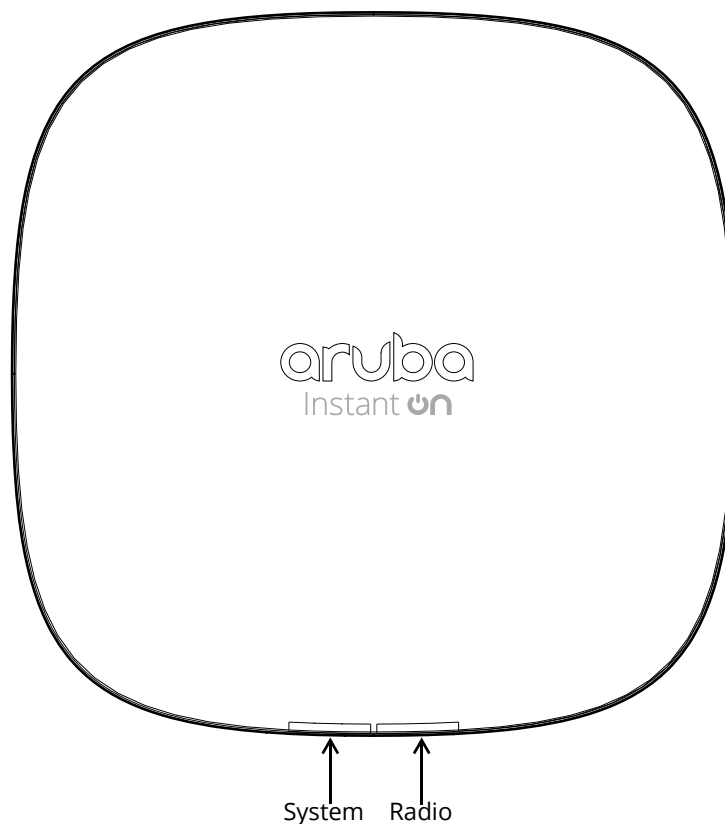
If you have ordered AP22 bundle, the package would also include a power supply unit to power the AP through an electrical power outlet.



Inform your supplier if there are any incorrect, missing, or damaged parts. If possible, retain the carton, including the original packing materials. Use these materials to repack and return the unit to the supplier if needed.

### Hardware Overview

**Figure 1** AP22 Front View



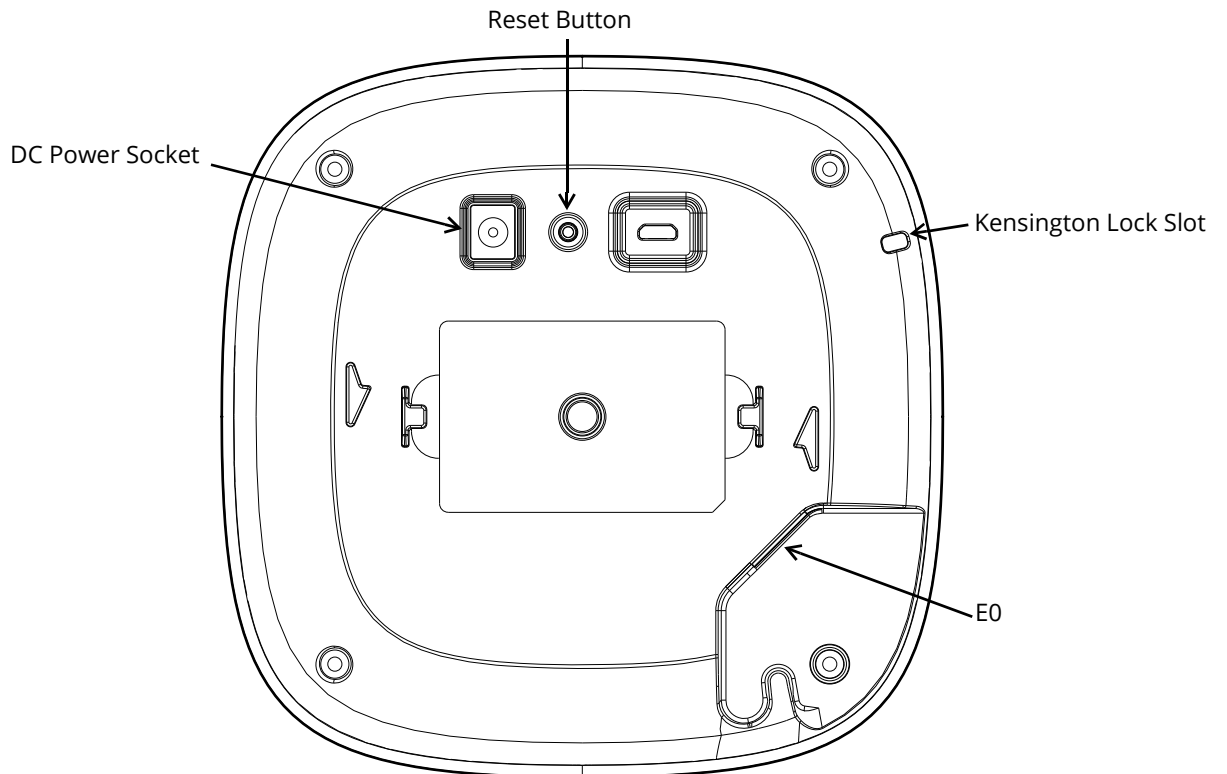
## LEDs

The AP22 access point has two LEDs that indicate the system and radio status of the device.

**Table 1** AP22 Access Point LEDs Status

LED	Color/State	Meaning
System ⓘ	No Lights	Device has no power
	Blinking Green	Device is starting
	Alternating Green/Amber	Device is ready for setup
	Solid Green	Device is ready
	Solid Amber	Device has detected a problem
	Solid Red	Device has an issue- immediate action required
Radio 📶	No Lights	Wi-Fi is not ready, wireless clients cannot connect
	Solid Green	Wi-Fi is ready, wireless clients can connect

**Figure 2** AP22 Rear View



## Ethernet Port

The AP22 is equipped with a 10/100/1000Base-T auto-sensing MDI/MDX Ethernet port (E0). This E0 port supports wired-network connectivity, and Power over Ethernet (PoE) from IEEE 802.3af and 802.3at compliant PoE power sources, such as a PoE midspan injector or a network switch.

## Kensington Lock Slot

The AP22 access point is equipped with a Kensington lock slot for additional security.

## Reset Button

The reset button located on the bottom of the device can be used to reset the access point to factory default settings.

There are two ways to reset the access point to factory default settings:

### Reset the AP during normal operation

Press and hold down the reset button using a small, narrow object such as a paper clip for more than 10 seconds during normal operation.

### Reset the AP while powering up

1. Press and hold down the reset button using a small, narrow object such as a paper clip while the access point is not powered on (either via DC power or PoE).
2. Connect the power supply (DC or PoE) to the access point while the reset button is being held down.
3. Release the reset button on the access point after 15 seconds.

## Power

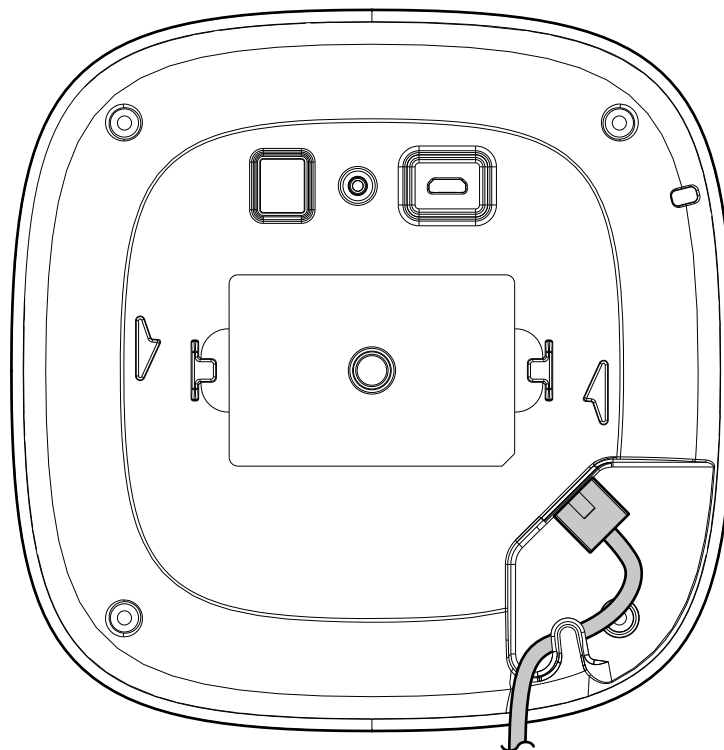
If PoE is not available, a proprietary Aruba power adapter can be used to power the AP22 access point. This power adapter is available in the box if you buy the AP22 and power adapter bundle. For details, refer to the ordering information in the AP22 data sheet at <https://www.ArubaInstantOn.com/resources>.

When both PoE and DC power sources are available, the DC power source takes precedence. The access point simultaneously draws a minimal current from the PoE source. In the event that the DC source fails, the access point switches to the PoE source.

## Cable Clip

The cable clip on the rear of the access point is used to organize Ethernet cable, as shown in [Figure 3](#). The use of the cable clip is optional and does not support all types of cables and plugs.

**Figure 3** Cable Clip



## Before You Begin

Refer to the sections below before beginning the installation process.



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The AP22 access point is designed in compliance with governmental requirements so that only authorized network administrators can change the settings.

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## Identifying Specific Installation Locations

Each location should be as close as possible to the center of the intended coverage area and should be free from obstructions or obvious sources of interference. These RF absorbers/reflectors/interference sources will impact RF propagation and should have been accounted for during the planning phase and adjusted.



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Use of this equipment adjacent to or stacked with other equipment should be avoided because it could result in improper operation. If such use is necessary, this equipment and the other equipment should be observed to verify that they are operating normally.

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## Identifying Known RF Absorbers/Reflectors/Interference Sources

Identifying known RF absorbers, reflectors, and interference sources while in the field during the installation phase is critical. Make sure that these sources are taken into consideration when you attach an access point to its fixed location.

RF absorbers include:

- Cement/concrete—Old concrete has high levels of water dissipation, which dries out the concrete, allowing for potential RF propagation. New concrete has high levels of water concentration in the concrete, blocking RF signals.
- Natural Items—Fish tanks, water fountains, ponds, and trees
- Brick

RF reflectors include:

- Metal Objects—Metal pans between floors, rebar, fire doors, air conditioning/heating ducts, mesh windows, blinds, chain link fences (depending on aperture size), refrigerators, racks, shelves, and filing cabinets.
- Do not place an access point between two air conditioning/heating ducts. Make sure that access points are placed below ducts to avoid RF disturbances.

RF interference sources include:

- Microwave ovens and other 2.4 or 5 GHz objects (such as cordless phones)
- Cordless headset such as those used in call centers or lunch rooms



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Portable RF communications equipment (including peripherals such as antenna cables and external antennas) should be used no closer than 7.87 inches (20 cm) to any part of the access point. Otherwise, degradation of the performance of this equipment could result.

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## Access Point Installation



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The installer is responsible for securing the access point onto the ceiling tile rail in accordance with the steps below. Failure to properly install this product may result in physical injury and/or damage to property.

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Use of accessories, transducers and cables other than those specified or provided by the manufacturer of this equipment could result in increased electromagnetic emissions or decreased electromagnetic immunity of this equipment and result in improper operation.

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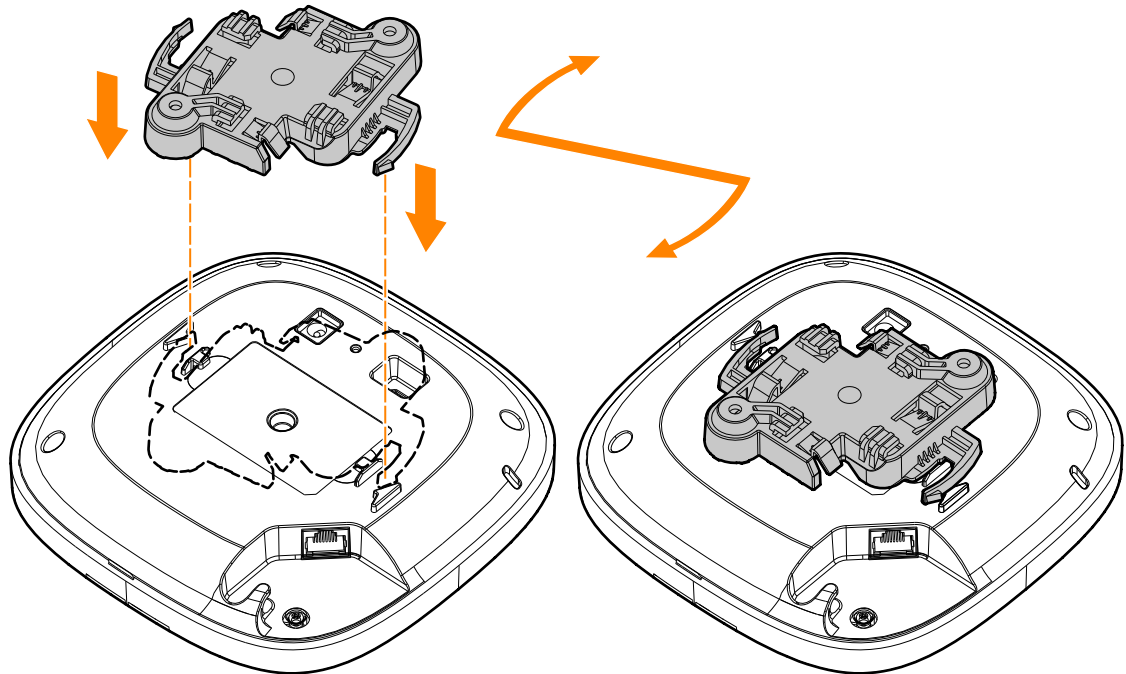
The AP22 access point ships with a mount bracket to install the access point to a 9/16" or 15/16" ceiling tile rail, or on a solid surface, such as a wall or a hard ceiling.

The following sections provide instructions on how to use this mount bracket.

## Installing the Access Point to a Ceiling Tile Rail

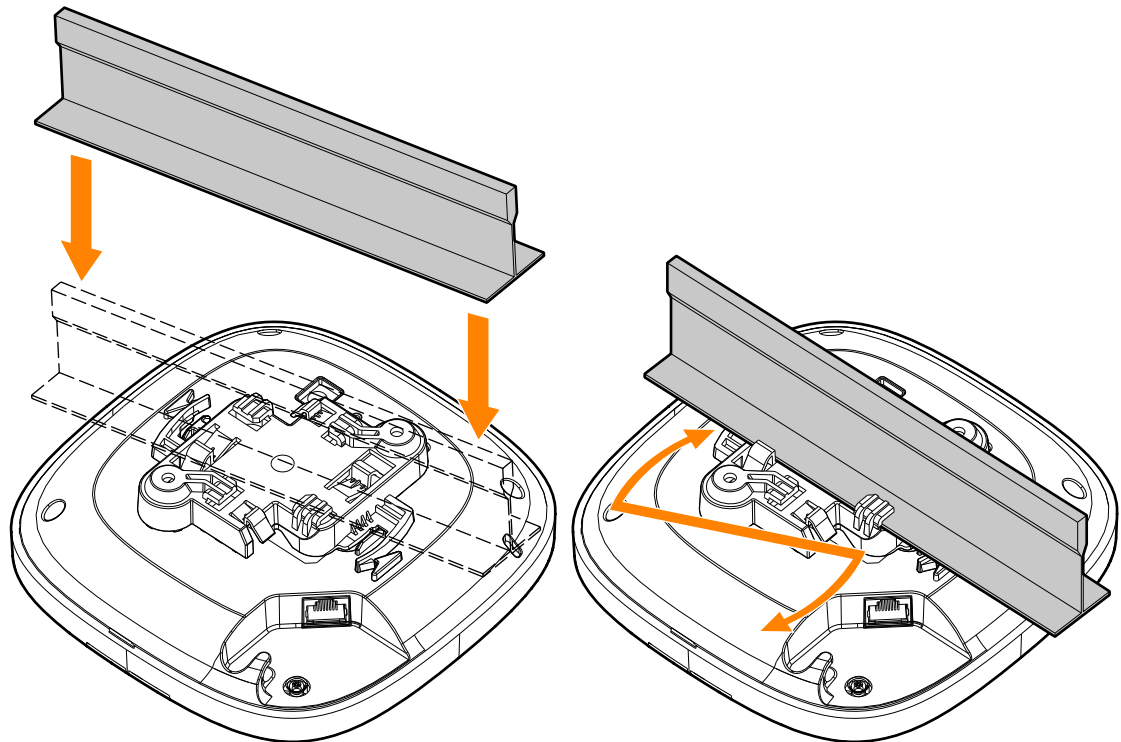
1. Pull the necessary cables through a prepared hole in the ceiling tile near where the access point will be placed.
2. Place the mount bracket against the back of the access point with the mount bracket at an angle of approximately 30 degrees to the tabs (see [Figure 4](#)).
3. Twist the mount bracket clockwise until it snaps into place in the tabs (see [Figure 4](#)).

**Figure 4** Attaching the Mount Bracket to the AP

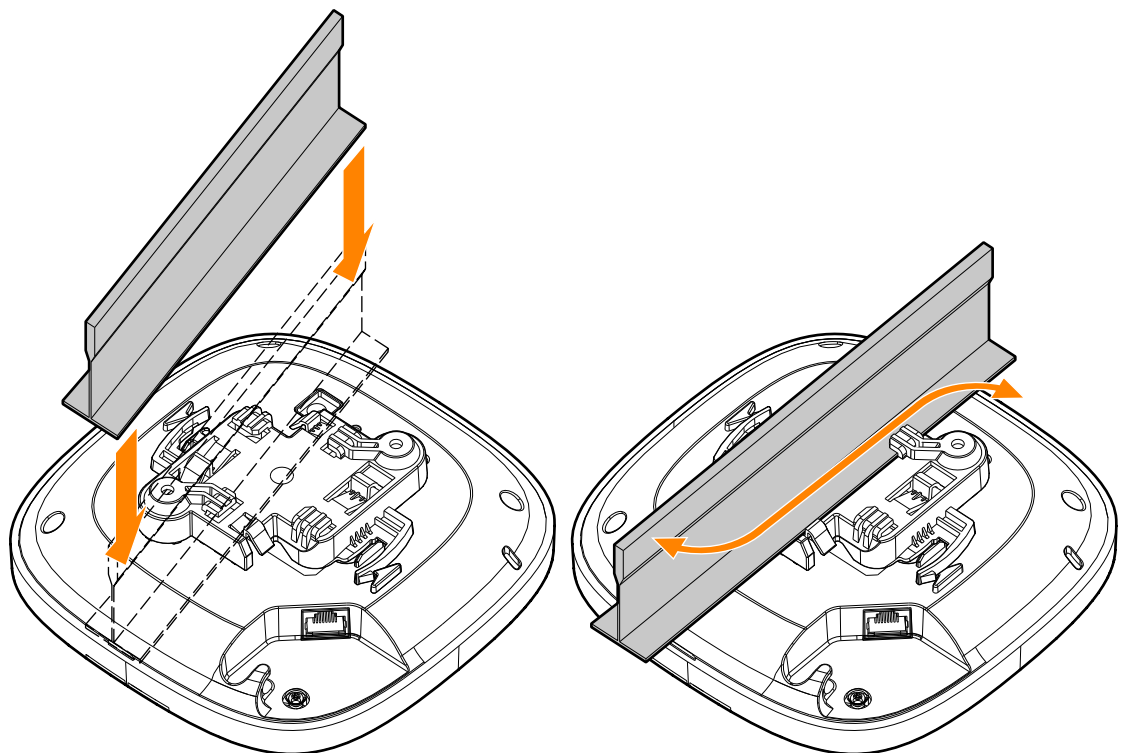


4. Hold the access point next to the ceiling tile rail with the mounting slots at approximately a 30-degree angle to the ceiling tile rail (see [Figure 5](#) and [Figure 6](#)). Make sure that any cable slack is above the ceiling tile.
5. Pushing toward the ceiling tile, rotate the access point clockwise until the device clicks into place on the ceiling tile rail.

**Figure 5** Mounting the AP to a 15/16" Ceiling Rail



**Figure 6** Mounting the AP to a 9/16" Ceiling Rail

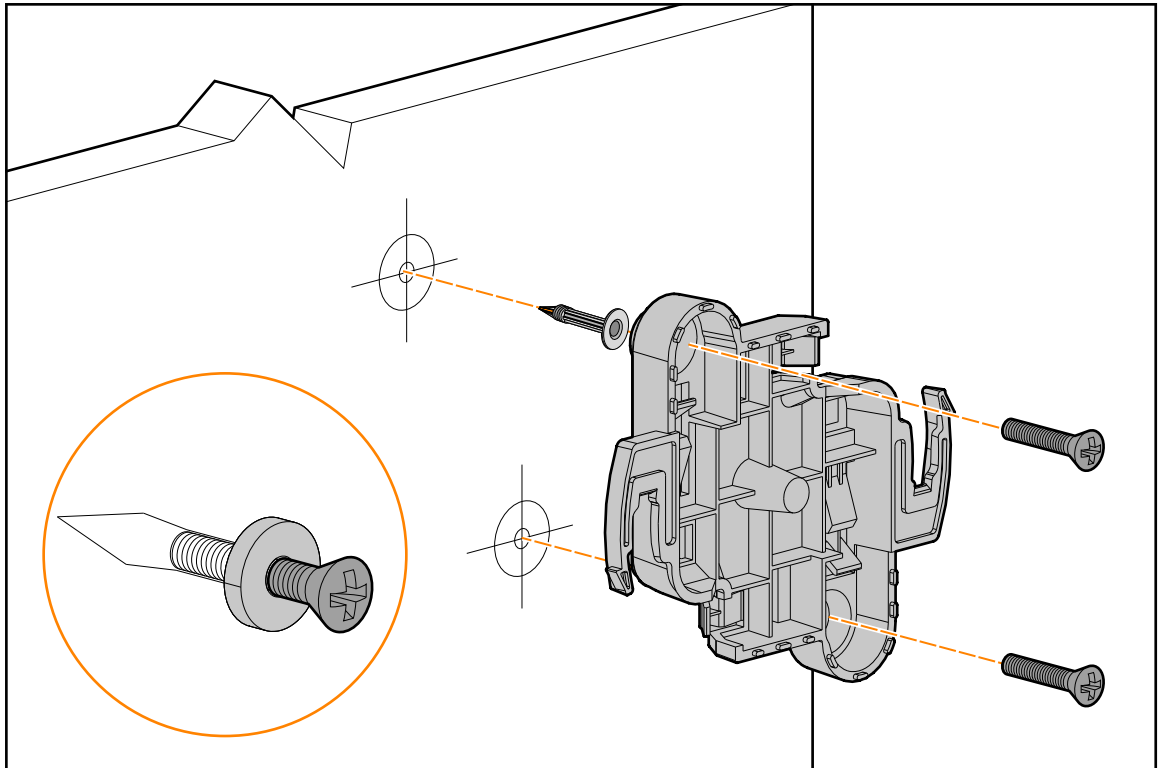


## Installing the Access Point to a Solid Surface

1. Attach the mount bracket to any solid surface, such as a wall or hard ceiling, as shown in [Figure 7](#).
  - a. Install any necessary wall anchors. Wall anchors are not included in the package.
  - b. Align the screw holes in the mount bracket with the previously installed anchors or demarcated screw points.

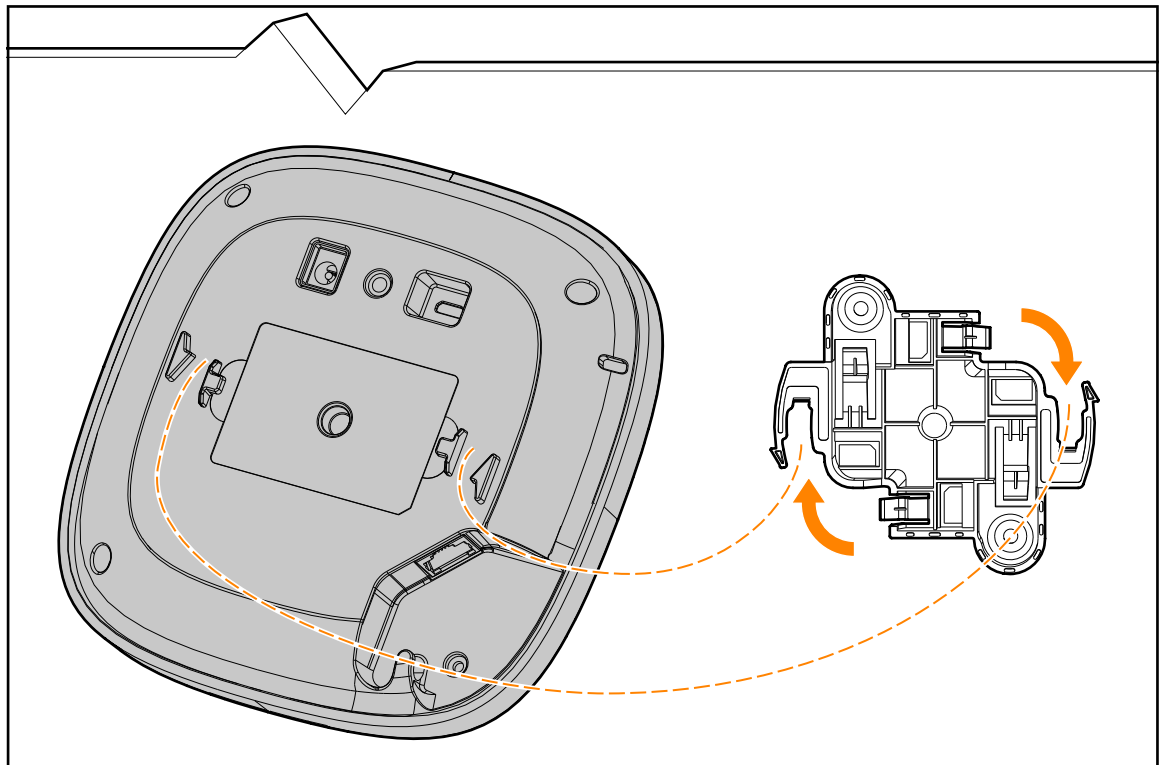
- c. Insert two screws to secure the mount bracket. Screws are not included in the package.

**Figure 7** Attaching the Mount Bracket to a Solid Surface



2. Attach the access point to the secured mount bracket as shown in [Figure 8](#).
  - a. Align the access point with the mount bracket, placing the access point so that its mounting tabs are at an angle of approximately 30 degrees to the mount bracket.
3. Pushing towards the solid surface, rotate the access point clockwise until it clicks into place (see [Figure 8](#)).

**Figure 8** Attaching the Access Point to the Mount Bracket



## Verifying Post-Installation Connectivity

The integrated LEDs on the access point can be used to verify that the access point is receiving power and initializing successfully (see [Table 1](#)).

## Mobile Application Installation

Click the Apple App Store or Google Play badge below to download and install the Aruba Instant On mobile app to your phone. Launch the app and follow the instructions to complete the setup. Alternately, simply search for “Aruba Instant On” app within Apple App Store or Google Play.



## Log in to Instant On Portal

Alternately, you can set up the Aruba Instant On access point from a web browser. Open a web browser and enter <https://portal.ArubaInstantOn.com> in the address bar to access the Aruba Instant On portal login screen. In the login screen, enter your Instant On account credentials to access your site.

**Figure 9** *Instant On Portal Login Screen*

aruba Instant On

## Electrical and Environmental Specifications



All Aruba access points should be professionally installed by an Aruba Certified Mobility Professional (ACMP). The installer is responsible for ensuring that grounding is available and meets applicable national and electrical codes.



Tous les points d'accès Aruba doivent impérativement être installés par un professionnel agréé. Ce dernier doit s'assurer que l'appareil est mis à la terre et que le circuit de mise à la terre est conforme aux codes électriques nationaux en vigueur.

### Electrical

- Ethernet:
  - E0 port: 10/100/1000BaseT auto-sensing MDI/MDX wired RJ45 network connectivity port
- Power:
  - 12V DC power interface, support powering through AC-to-DC power adapter



- Power over Ethernet (PoE): 802.3af or 802.3at compliant source



If a power adapter other than the Aruba-approved adapter is used in the US or Canada, it should be NRTL listed, with an output rated 12Vdc, minimum 2A, marked "LPS" and "Class 2", and suitable for plugging into a standard power receptacle in the US and Canada.

## Environmental

- Operating temperature: 0°C to +40°C (+32°F to +104°F)
- Operating humidity: 5% to 93% non-condensing

## Regulatory Model Number

- AP22 RMN: APIN0505

## Safety and Regulatory Compliance



**RF Radiation Exposure Statement:** This equipment complies with FCC RF radiation exposure limits. This equipment should be installed and operated with a minimum distance of 7.87 inches (20cm) between the radiator and your body for 2.4 GHz and 5 GHz operations. This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.



**Déclaration de la concernant l'exposition aux rayonnements à fréquence radioélectrique (FR):** Cet appareil est conforme aux limites d'exposition aux rayonnements FR établies. Il doit être installé et utilisé à une distance minimale de 20 cm (7.87 pouces) entre le radiateur et votre corps, qu'il opère sur la bande 2,4 GHz ou 5 GHz. Cet émetteur ne doit pas être installé ou utilisé à proximité immédiate d'une autre antenne ni d'un autre transmetteur.



Changes or modifications to this unit not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.



Toute modification effectuée sur cet équipement sans l'autorisation expresse de la partie responsable de la conformité est susceptible d'annuler son droit d'utilisation.

## Federal Communication Commission

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 manufacturer's 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 to an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio or TV technician for help.

## Industry Canada

This Class B digital apparatus meets all of the requirements of the Canadian Interference-Causing Equipment Regulations.

In accordance with Industry Canada regulations, this radio transmitter and receiver may only be used with an antenna, the maximum type and gain of which must be approved by Industry Canada. To reduce potential radio interference, the type of antenna and its gain shall be chosen so that the equivalent isotropic radiated power (EIRP) does not exceed the values necessary for effective communication. This device complies with Industry Canada's license-exempt RSS regulations. Operation of this device 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. When operated in the 5.15 to 5.25 GHz frequency range, this device is restricted to indoor use to reduce the potential for harmful interference with co-channel Mobile Satellite Systems.

### Déclaration d'Industrie Canada

Conformément aux réglementations d'Industrie Canada, cet émetteur-récepteur radio doit être utilisé uniquement avec une antenne dont le type et le gain maximal doivent être approuvés par Industrie Canada. Pour réduire les interférences radio potentielles, le type d'antenne et son gain doivent être choisis de façon à ce que la puissance isotrope rayonnée équivalente (PIRE) ne dépasse pas les valeurs nécessaires à une communication efficace.

Ce périphérique est conforme aux règlements RSS exempts de licence d'Industrie Canada. L'utilisation de ce périphérique est soumise aux deux conditions suivantes : (1) ce périphérique ne doit pas provoquer d'interférences, et (2) ce périphérique doit accepter toute interférence, y compris les interférences susceptibles de provoquer un dysfonctionnement.

En cas d'utilisation dans la plage de fréquences de 5,15 à 5,25 GHz, cet appareil doit uniquement être utilisé en intérieur afin de réduire les risques d'interférence avec les systèmes satellites mobiles partageant le même canal.

### European Union Regulatory Conformance

The Declaration of Conformity made under Radio Equipment Directive 2014/53/EU is available for viewing at: [www.hpe.com/eu/certificates](http://www.hpe.com/eu/certificates). Select the document that corresponds to your device's model number as it is indicated on the product label.

### Wireless Channel Restrictions

5150-5350MHz band is limited to indoor only in the following countries; Austria (AT), Belgium (BE), Bulgaria (BG), Croatia (HR), Cyprus (CY), Czech Republic (CZ), Denmark (DK), Estonia (EE), Finland (FI), France (FR), Germany (DE), Greece (GR), Hungary (HU), Iceland (IS), Ireland (IE), Italy (IT), Latvia (LV), Liechtenstein (LI), Lithuania (LT), Luxembourg (LU), Malta (MT), Netherlands (NL), Norway (NO), Poland (PL), Portugal (PT), Romania (RO), Slovakia (SK), Slovenia (SL), Spain (ES), Sweden (SE), Switzerland (CH), Turkey (TR), United Kingdom (UK).

Radio	Frequency Range MHz	Max EIRP
BLE/Zigbee	2402-2480	9 dBm
Wi-Fi	2412-2472	20 dBm
	5150-5250	23 dBm
	5250-5350	23 dBm
	5470-5725	30 dBm
	5725-5850	14 dBm

### Medical

1. Equipment not suitable for use in the presence of flammable mixtures.
2. Connect to only IEC 60950-1 or IEC 60601-1 certified products and power sources. The end user is responsible for the resulting medical system complies with the requirements of IEC 60601-1.
3. Wipe with a dry cloth, no additional maintenance required.
4. No serviceable parts, the unit must be sent back to the manufacturer for repair.

5. No modifications are allowed without Aruba approval.



NOTE

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This device is intended for indoor use in professional healthcare facilities.

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NOTE

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This device has no IEC/EN60601-1-2 essential performance.

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CAUTION

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Use of this equipment adjacent to or stacked with other equipment should be avoided because it could result in improper operation. If such use is necessary, this equipment and the other equipment should be observed to verify that they are operating normally.

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NOTE

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Compliance is based on the use of Aruba approved accessories.

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CAUTION

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Use of accessories, transducers and cables other than those specified or provided by the manufacturer of this equipment could result in increased electromagnetic emissions or decreased electromagnetic immunity of this equipment and result in improper operation.

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## Brazil

Este equipamento não tem direito à proteção contra interferência prejudicial e não pode causar interferência em sistemas devidamente autorizados.

## Japan

ご使用になっている装置に VCCI マークが付いていましたら、次の説明文をお読み下さい。

この装置は、クラス B 情報技術装置です。この装置は、家庭環境で使用することを目的としていますが、この装置がラジオやテレビジョン受信機に近接して使用されると、受信障害を引き起こすことがあります。取扱説明書に従って正しい取り扱いをして下さい。

VCCI-B

## México

La operación de este equipo está sujeta a las siguientes dos condiciones: (1) es posible que este equipo o dispositivo no cause interferencia perjudicial y (2) este equipo o dispositivo debe aceptar cualquier interferencia, incluyendo la que pueda causar su operación no deseada.

## Morocco



# Нормативные требования Евразийского Экономического Союза

## Russia



HPE Russia: ООО "Хьюлетт Паккард Энтерпрайз" Российская Федерация, 125171, г. Москва, Ленинградское шоссе, 16А, стр.3, Телефон: +7 499 403 4248 Факс: +7 499 403 4677

'HPE Kazakhstan': ТОО «Хьюлетт-Паккард (К)», Республика Казахстан, 050040, г. Алматы, Бостандыкский район, проспект Аль-Фараби, 77/7, Телефон/факс: + 7 727 355 35 50

## Kazakhstan

ЖШС "Хьюлетт Паккард Энтерпрайз" Ресей Федерациясы, 125171, Мәскеу, Ленинград тас жолы, 16А блок 3, Телефон: +7 499 403 4248 Факс: +7 499 403 4677

ЖШС «Хьюлетт-Паккард (К)», Қазақстан Республикасы, 050040, Алматы к., Бостандық ауданы, Әл-Фараби даңғылы, 77/7, Телефон/факс: +7 (727) 355 35 50

## Taiwan

### 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干擾。

1. 應避免影響附近雷達系統之操作。

2. 高增益指向性天線只得應用於固定式點對點系統

3. 電磁波暴露量 MPE 標準值 1 mW/cm<sup>2</sup>，送測產品實測值為：0.18mW/cm<sup>2</sup>

## Ukraine

Hereby, Hewlett Packard Enterprise Company declares that the radio equipment type APIN0505 is in compliance with Ukrainian Technical Regulation on Radio Equipment, approved by resolution of the CABINET OF MINISTERS OF UKRAINE dated May 24, 2017, No. 355. The full text of the UA declaration of conformity is available at the following internet address: <https://certificates.ext.hpe.com/public/certificates.html>

Х'ЮЛЕТТ ПАКАРД ЕНТЕРПРАЗ, 6280 АМЕРИКА ЦЕНТР Д-Р, САН-ХОСЕ, КАЛІФОРНІЯ 95002, США

## Contact Aruba

Main Site	<a href="https://www.ArubaInstantOn.com">https://www.ArubaInstantOn.com</a>
Support Site	<a href="https://www.ArubaInstantOn.com/contact-support/">https://www.ArubaInstantOn.com/contact-support/</a>
Aruba Instant On Community	<a href="https://community.ArubaInstantOn.com">https://community.ArubaInstantOn.com</a>
North America Telephone	1-800-943-4526 1-408-754-1200
International Telephone	<a href="https://www.ArubaInstantOn.com/contact-support/">https://www.ArubaInstantOn.com/contact-support/</a>

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### Open Source Code

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Hewlett Packard Enterprise Company  
Attn: General Counsel  
6280 America Center Drive  
San Jose, CA 95002  
USA

### Warranty

This hardware product is protected by an Aruba warranty. For details, visit <https://www.ArubaInstantOn.com/docs>.