# AP122

**Enterprise-grade 2x2, 2-stream 802.11ac access point designed for medium density environments at a competitive price point.**

**AP122 provides the full breadth of Aerohive's enterprise-grade feature set and IOT readiness in medium density environments. It achieves 802.11ac performance with data rates up to 867 Mbps along with built-in BLE and USB port using existing 802.3af POE infrastructure.**

Running powerful HiveOS coupled with innovative distributed Cooperative Control architecture, AP122 brings the best of end user connectivity and Wi-Fi coverage. In addition, the integrated BLE radio and a USB interface in the access point opens up a multitude of deployment use-cases in IoT and prox-imity/location-oriented services.

AP122 is a key component of the Aerohive Connect solution. Connect provides cloud-managed connectivity built on Aerohive's industry-first cooperative con-trol Wi-Fi focused on optimizing speed and resilience. Connect is centrally man-aged from the cloud, allowing for simple, fast, and powerful management.

*Aerohive Connect*

## *AEROHIVE CONNECT COMPONENTS*

### ENTERPRISE CONNECTIVITY

- Optimized for medium density general purpose deployments

- Built-in Bluetooth Low Energy for iBeacon/ other beacon technologies

- IoT readiness with USB port

- Trusted Platform Module *(TPM)* – Hardware-based key storage and encryption

- Encryption: AES/CCMP, TKIP, and RC4 (WEP only)

### CLOUD MANAGEMENT

- Network Device and Client Monitoring

- Global Search and Filter function

- Auto-Provisioning Tools for quick and easy deployment

- Network Health View

- Versatile RF Planning

- Guided Network Configuration Setup

- 802.1X and PSK Secured Networks

- Guest Access functionality with configurable Captive Web Portal

### HIVECARE SUPPORT

- HiveCare Community Support: forum-based interactive support

- HiveCare Connect CallBack service: optional

- Wide array of online resources and tools

## *PRODUCT SKUs*

| SKU | DESCRIPTION |
| --- | --- |
| AH-AP-122-AC-FCC | AP122, 2 radio 2x2:2 802.11a/b/g/n/ac AP, 1 10/100/1000 Ethernet port, FCC regulatory domain, w/o power supply (Internal Antenna only). Includes HiveManager Connect & HiveCare Connect Support |
| AH-AP-122-AC-W | AP122, 2 radio 2x2:2 802.11a/b/g/n/ac AP, 1 10/100/1000 Ethernet port, World regulatory domain, w/o power supply (Internal Antenna only). Includes HiveManager Connect & HiveCare Connect Support. |
| AH-AP-122-AC-CAN | AP122, 2 radio 2x2:2 802.11a/b/g/n/ac AP, 1 10/100/1000 Ethernet port, Canada regulatory domain, w/o power supply (Internal Antenna only). Includes HiveManager Connect & HiveCare Connect Support. |

**Radio Specifications—802.11a**
• 5.150–5.850 GHz Operating Frequency
• Orthogonal Frequency Division Multiplexing (OFDM) Modulation
• Rates (Mbps): 54, 48, 36, 24, 18, 12, 9, 6 w/ auto fallback

**Radio Specifications—802.11b**
• 2.4–2.5GHz Operating Frequency
• Direct-Sequence Spread-Spectrum (DSSS) Modulation
• Rates (Mbps): 11, 5.5, 2, 1 w/auto fallback

**Radio Specifications—802.11g**
• 2.4–2.5 GHz Operating Frequency
• Orthogonal Frequency Division Multiplexing (OFDM) Modulation
• 20 dBm (100 mW) Transmit Power
• Rates (Mbps): 54, 48, 36, 24, 18, 12, 9, 6 w/ auto fallback

**Radio Specifications—802.11n**
• 2.4–2.5 GHz & 5.150–5.850 GHz Operating Frequency
• 802.11n Modulation
• Rates (Mbps): MCS0 - MCS15 (6.5Mbps - 300Mbps)
• 2x2 Multiple-In, Multiple-Out (MIMO) Radio
• HT20 High-Throughput (HT) Support
  (for both 2.4 GHz and 5 GHz)
• HT40 High-Throughput (HT) Support for 5 GHz

**Radio Specifications—802.11ac**
• 5.150–5.850 GHz Operating Frequency
• 802.11ac Modulation (256-QAM)
• Rates (Mbps): MCS0–MCS9 (6.5Mbps – 867Mbps), NSS = 1-2.
• 2x2:2 Stream Multiple-In, Multiple-Out (MIMO) Radio
• VHT20/VHT40/VHT80 support
• TxBF ( Transmit Beamforming)

**Antennas**
• 2x Integrated single band, 2.4-2.5 GHz Omnidirectional antennas
• 2x Integrated single band, 5.1-5.8 GHz Omnidirectional antennas
• 1 x BLE internal antenna

**Interfaces**
• Autosensing 10/100/1000 Base-T Ethernet PoE *(Power over Ethernet 802.3af)* Port
• RJ-45 console port
• Standard USB port

**Physical**
• LxWxH 171X171X44.5 mm (6.75x6.75x1.75in). w/o mounting brackets
• Weight: 1.13 lb (0.51 kg)

**Environmental**
• Operating: 0 to +40°C, Storage: -40 to +70°C
• Humidity: 95%

**Power Specifications**
• IEEE 802.3af PoE Power

**Power Options**
• Power Draw: Typical 10.5W, Max 12.9W
• 802.3af / 802.3at (PoE/PoE+)

**Mounting**
• Desktop
• Ceiling Tile Recessed 15/16", 3/8", 9/16" sold as an accessory
• Ceiling Tile Flush 3/8", 9/16" sold as an accessory
• Suspend Mount sold as an accessory

**Included Mounting Options**
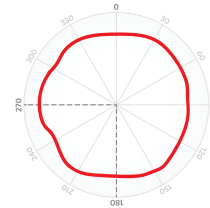• Wall Mount
• Ceiling Tile flush 15/16"

## TRANSMIT POWER TABLE

| 2.4 GHZ | DATA RATE | POWER (dBm) |
|---|---|---|
| 11b | 1-11 Mbps | 18 |
| 11g | 6-54 Mbps | 17-16 |
| 11n HT20 | MCS0,8,16 | 17 |
| | MCS7,15,23 | 16 |

| 5 GHZ | DATA RATE | POWER (dBm) |
|---|---|---|
| 11a | 6-54 Mbps | 17-16 |
| 11n HT20 | MCS0,8,16 | 17 |
| | MCS7,15,23 | 16 |
| 11n HT40 | MCS0,8,16 | 17 |
| | MCS7,15,23 | 14 |
| 11ac VHT20 | MCS0 | 17 |
| | MCS9 | 16 |
| 11ac VHT40 | MCS0 | 17 |
| | MCS9 | 14 |
| 11ac VHT80 | MCS0 | 16 |
| | MCS9 | 12 |

*Note: Power shown is the power per chain and is the maximum power that the radio is capable of. Power limits will be limited by local radio regulations.*
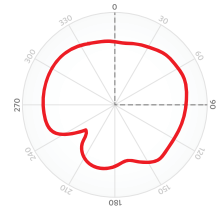
## RECEIVE SENSITIVITY TABLE

| 2.4 GHZ | DATA RATE | SENSITIVITY |
|---|---|---|
| 11b | 1-11 Mbps | -99 |
| 11g | 6 Mbps | -94 |
| | 54 Mbps | -77 |
| 11n HT20 | MCS0,8,16 | -94 |
| | MCS7,15,23 | -75 |

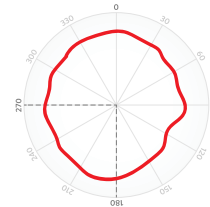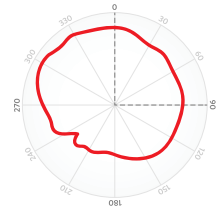| 5 GHZ | DATA RATE | SENSITIVITY |
|---|---|---|
| 11a | 6 Mbps | -93 |
| | 54 Mbps | -75 |
| 11n HT20 | MCS0,8,16 | -93 |
| | MCS7,15,23 | -75 |
| 11n HT40 | MCS0,8,16 | -90 |
| | MCS7,15,23 | -72 |
| 11ac VHT20 | MCS0 | -93 |
| | MCS9 | -70 |
| 11ac VHT40 | MCS0 | -90 |
| | MCS9 | -64 |
| 11ac VHT80 | MCS0 | -87 |
| | MCS9 | -61 |

## RADIATION PATTERNS



**2.4GHZ DUAL-BAND HORIZONTAL**



**2.4GHZ DUAL-BAND VERTICAL**



**5GHZ DUAL-BAND HORIZONTAL**



**5GHZ DUAL-BAND VERTICAL**

## WARRANTY & SUPPORT

This Aerohive Networks device is backed by a limited lifetime hardware warranty. HiveCare Community Support is included with the Connect Access Point. Optional HiveCare Callback service may also be purchased.

For complete support terms go to **www.aerohive.com/support**.

**Contact us today** to learn how your organization can benefit from an Aerohive wireless LAN architecture.