HPE Aruba Networking 550 Series Campus Access Points

HPE Aruba Networking AP-555 (RW) Dual Radio 8x8/4x4 802.11ax Internal Antennas Unified Campus AP (JZ356A)

What's new

- High-performance Wi-Fi 6 access points (APs)provide up to 5.37 Gbps combined aggregate data rate
- Optional tri-radio mode with two 5 GHz and one 2.4 GHz radio (4x4 MIMO).
- Protects with encryption and authentication, secure credentials/keys storage, and user and IoT access policy enforcement firewalls (PEF).

Overview

The HPE Aruba Networking 550 Series Campus Access Points provide high-performance Wi-Fi 6 connectivity to mobile and IoT devices in high density environments. Providing up to 5.37 Gbps combined aggregate data rate with dual radios and optional tri-radio mode, this series is built on Wi-Fi 6 standards (IEEE 802.11ax) and includes features such as OFDMA, bidirectional MU-MIMO, and target wait time (TWT) for better multi-user performance and improved efficiency.

This series can be deployed using Zero Touch Provisioning, without onsite technical expertise, for ease of implementation in branch offices and for remote work. HPE Aruba Networking Central provides a single pane of

- IoT-ready with support for [1] Bluetooth 5 and Zigbee.
- Two 5 Gbps ports for fast wired connectivity.

glass for overseeing wired and wireless LANs, WANs, and VPNs. AIpowered analytics, endtoend orchestration and automation, and advanced security features are built natively into the solution. The 550 series includes a limited lifetime warranty.

Features

Top Wi-Fi 6 Performance

The HPE Aruba Networking 550 Series Campus Access Points are designed to simultaneously serve multiple clients and traffic types with dual radio and optional tri-radio mode, boosting overall network performance and providing up to 5,37 Gbps combined aggregate data rate

Optional tri-radio mode supports two 5 GHz radios and one 2.4 GHz radio (4x4 MIMO).

The AP includes features such as OFDMA, bidirectional MU-MIMO, and target wait time (TWT) for better multi-user performance and improved efficiency.

Enhanced wireless experience with HPE Aruba Networking ClientMatch technology removes sticky client issues by steering a client to the AP where it receives one of the best radio signals.

Two 5 Gbps ports provide flexibility to support speeds of 1, 2.5, or 5 Gbps (or 100 Mbps).

Enhanced Security

The HPE Aruba Networking 550 Series Campus Access Points offer enhanced security with Dynamic Segmentation to remove the time-consuming and error-prone task of managing complex and static VLANs, ACLs, and subnets by dynamically assigning policies and keeping traffic protected and separated.

It offers stronger encryption and authentication with WPA3, protected credentials/keys storage for guest access with Enhanced Open, and user and IoT access policy enforcement firewalls (PEF).

The AP simplifies policy enforcement by using the PEF to encapsulate all traffic from the AP to the gateway (or mobility controller) for end-to-end encryption and inspection.

For enhanced device assurance, the 550 series include an installed Trusted Platform Module (TPM) for protected storage of credentials and keys, and boot code.

IoT Ready

The HPE Aruba Networking 550 Series Campus Access Points can serve as IoT platforms that bolster network security and provide coverage for a range of IoT devices without the need for network overlays.

The AP supports an integrated Bluetooth 5 and 802.15.4 radio (for Zigbee support), as well as a USB port for increased flexibility, providing better security and reliable connectivity for IoT devices.

HPE Aruba Networking Central Client Insights uses deep packet inspection to provide additional context and behavioral information that help verify devices are receiving proper policy enforcement and continuously monitor for rogue devices.

Sustainability

The 550 series support AI-powered Dynamic Power Save mode, it enables APs to automatically wake up at a schedule when connectivity demand arises, reducing power demands and lowering the energy footprint to align with the organization sustainability initiatives.

The Intelligent Power Monitoring (IPM) feature provides the ability to enable or disable capabilities based on available PoE power.

The target wake time (TWT) establishes a schedule for when clients need to communicate with an AP to help improve client power savings and reduce

airtime contention.

Technical specifications

HPE Aruba Networking AP-555 (RW) Dual Radio 8x8/4x4 802.11ax Internal Antennas Unified Campus AP

Product Number	JZ356A
Differentiator	Available everywhere except US, Israel, Japan and Egypt
Certifications	UL2043 plenum rating Bluetooth SIG WI-FI Alliance: Wi-Fi CERTIFIED a, b, g, n, ac, ax WPA, WPA2 and WPA3 Enterprise with CNSA option, Personal (SAE), Enhanced Open (OWE) WMM, WMM-PS, W-Fi Agile Multiband Passpoint (Release 2) Wi-Fi CERTIFIED Location™
Regulatory	FCC/ISED CE Marked RED Directive 2014/53/EU EMC Directive 2014/30/EU Low Voltage Directive 2014/35/EU UL/IEC/EN 62368-1 EN 60601-1-1, EN60601-1-2 For more country-specific regulatory information and approvals, contact your HPE representative
Wi-Fi antenna	Integrated downtilt omni-directional antennas for 4x4 MIMO in 2.4 GHz with peak antenna gain of 4.3 dBi, and 8x8 MIMO in 5 GHz with peak antenna gain of 5.8 dBi in 5 GHz. In tri-radio mode, the peak gain of the antennas for each of the 4x4 5 GHz radios is 5.5 dBi (radio 0L, lower half of 5GHz) and 5.6 dBi (radio 0U, upper half of 5 GHz). Built-in antennas are optimized for horizontal ceiling mounted orientation of the AP. The downtilt angle for maximum gain is roughly 30 degrees.
Ports	E0, E1: HPE Smart Rate port (RJ-45, maximum negotiated speed 5 Gbps) Serial console interface (proprietary, micro-B USB physical jack) USB 2.0 host interface (Type A connector)
Mounting	Optional mounting kits: AP-OUT-MNT-V1A: Outdoor Pole/Wall Long Mount Kit AP-270-MNT-V2: Outdoor Pole/Wall Short Mount Kit AP-270-MNT-H1: Outdoor AP Hanging or Tilt Install Mount Kit AP-270-MNT-H2: Outdoor Flush Wall or Ceiling Mount AP-270-MNT-H3: Outdoor AP Hanging or Dual-Tilt Install Mount Kit
Power consumption	Maximum (worst-case) power consumption (dual-radio operation): DC powered: 32.6W PoE powered (802.3bt or dual 802.3at): 38.2W PoE powered (802.3at, IPM disabled): 25.1W All numbers above are without an external USB device connected. When sourcing the full 5W power budget to such a device, the incremental (worst-case) power consumption for the AP is up to 6.0W (PoE powered) or 5.4W (DC powered). Maximum (worst-case) power consumption in idle mode (dual-radio operation): 15.0W (PoE) or 15.1W (DC) Maximum (worst-case) power consumption in deep-sleep mode: 3.8W(PoE) or 3.6W (DC)
Radio coverage	AP type: Indoor, dual/tri-radio, 5 GHz and 2.4 GHz 802.11ax 4x4 MIMO 5 GHz radio (dual-radio operation): Eight spatial stream HE80 (or 4SS HE160) MIMO for up to 4.8 Gbps wireless data rate 5 GHz radio (tri-radio operation): Four spatial stream HE80 (or 2SS HE160) MIMO for up to 2.4 Gbps wireless data rate 2.4 GHz radio: Four spatial stream HE40 (HE20) MIMO for up to 1,147 Mbps (574Mbps)

Warranty	Limited lifetime warranty
Product dimensions (metric)	58 x 260 x 260 mm
Weight	1.57 kg

[1] Bluetooth is a trademark owned by its proprietor and used by Hewlett Packard Enterprise under license. All third-party marks are property of their respective owners.

For additional technical information, available models and options, please reference the QuickSpecs

HPE Aruba Networking Services

HPE Aruba Networking services simplify and accelerate the network technology lifecycle, enabling your network to scale with better predictability and cost-effectiveness. Whether you operate your own network and need to improve your IT efficiencies, or you want to offload some of the burden, we have the services you need to reach your goals.

Learn more about what HPE Services - Aruba Networking has to offer at: arubanetworks.com/services/

Support Services

Our support portfolio provides the essential support elements as well as proactive and preventive features to help you improve your team's productivity and get the most from your network. Our support customers benefit from faster issue resolution, simplified operations and efficiencies, and reduced network issues.

Professional Services

With deep intellectual capital and purpose-built tools, our team delivers a range of standard and custom professional services designed to accelerate your value from HPE Aruba Networking technology.

Project based services include:

- Planning, audit, and assessment
- Architecture review and design
- Deployment, migration, and knowledge transfer

Annual subscription services include:

- Network optimization
- Intelligent Operations
- Customer Experience Management

Our Education Services allow your team to come up to speed quickly.

HPE GreenLake for Networking

Our NaaS solution, HPE Aruba Networking Managed Connectivity services, part of the HPE GreenLake services family, simplifies network operations, accelerates equipment handling, and increases the value of your HPE Aruba Networking network. If you need expert guidance and automation-based operations for your team, please explore the NaaS approach from HPE Aruba Networking here.

Make the right purchase decision.
Contact our presales specialists.

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