Overview

Aruba Instant On 1830 Switch Series

Small businesses continue to face challenges to stay afloat as the world wrestles with this multi-year pandemic. They need day-to-day tasks to be simple to keep operations running smoothly, and with increasing costs making it more expensive than ever to stay in business, they need affordable solutions.

Fast, reliable, and secure network connections play a critical role in helping businesses maintain a competitive advantage. At the same time, with constrained resources and a growing number of interconnected devices, getting the most valuable networking solution for the money has become a basic need for budget-strapped small businesses.

Aruba Instant On 1830 Switch Series is an affordable, easy to deploy, smart-managed switch series for small businesses looking for a cost-effective ways to keep up with evolving network demands. These are entry-level switches offering Layer 2 switching capabilities, Gigabit connectivity along with flexible management modes - all at an affordable price point.



Overview

Key Features

- Smart-managed Layer 2 Ethernet switch series ready to deploy in 8-, 24-, 48-port for non-PoE and Class 4 PoE models.
- Up to 370W of PoE to power APs, IP Phones, surveillance cameras, door locks and other IoT devices
- Two (2) and four (4) dedicated 1G SFP fiber ports on 24- and 48-port models respectively to eliminate traffic bottlenecks across your network
- Cost-effective PoE Support: with half of the ports capable of supporting PoE, these switches are ideal for cost-sensitive environments.
- 8-port non-PoE switch that can be powered by an upstream Power over Ethernet (PoE) switch for environments where no line power is available.
- Convenient mobile app and web-based GUI for set up, management and troubleshooting
- Compact and fan-less 8-port non-PoE and PoE, and 24-port non-PoE model for acoustically sensitive environments

Standard Features

Highlights

Simplicity At Its Best

Plug-and-play switches that work together with Instant On APs right out of the box Mobile app to easily setup, monitor and manage your network

Security You Can Count On

- Protect your network from unauthorized access with Global Storm Control, TPM (Trusted Platform module) based security and VLANs
- Automatic denial-of-service (DOS) monitors and protects the network against malicious attacks

We've Got You Covered

- No extra licensing or subscription fees
- Industry-leading limited lifetime warranty and support

With a flexible management dashboard, Power over Ethernet (PoE) options, and energy-efficient features, these switches deliver a solid business network for small businesses with limited budget.

The Aruba Instant On 1830 Switch Series includes six switches: two (2) 8-port, two (2) 24-port and two (2) 48-port models in PoE and non-PoE configurations. Besides powering up through a power adapter, the 8-port non-PoE model can also be powered from an external PoE switch, offering greater flexibility for space-constrained environments by eliminating the need for additional power outlets and simplifying wiring infrastructure.

With PoE models, up to 30W PoE power delivery is available for Class 4 PoE devices like access points, surveillance cameras and VoIP phones. The 8-port, 24-port and 48-port PoE models come with the power budget of 65W, 195W and 370W respectively to support latest IoT devices.

Using either the Instant On mobile app or the cloud-based web portal, you can quickly set up, monitor and manage the 1830 Switch Series from anywhere at any time.

Easy Set Up and Management

The Aruba Instant On mobile app allows you to set up, manage, and monitor Instant On switches and access points directly from your phone. Within the app, you get guided step-by-step instructions to install Instant On devices to get your network up and running quickly - no technical expertise required. And cloud-based access allows you to access the network from anywhere, at any time.

Better Together

Instant On automatically detects and applies highest (critical) PoE priority to Instant On Access Points for uninterrupted power delivery and wireless network access. Wired and wireless voice traffic is prioritized with high QoS priority end-to-end for optimal voice performance.

Optimized User Experience

The Aruba Instant On mobile app provides common workflows for Instant On switches and access points making it easier to configure, monitor and manage your network remotely without the need for additional hardware like cloud keys or VPN. You can also update firmware on your Instant On devices directly from the cloud whenever you want, from wherever you are.

Site Inventory And Topology View

The site inventory view shows all Instant On switches and access points on a single interface, and the topology view provides an intuitive structure of all Instant On devices deployed on the network - allowing you to quickly identify non-functioning devices and troubleshoot accordingly. Network issues can be easily diagnosed with connectivity tests like Ping and Traceroute.



Two-Factor Authentication (2fa)

As the number of security breaches continues to rise, 2FA has become an essential tool to mitigate risk against compromised login credentials. Two-Factor Authentication (2FA), provides an additional layer of authentication, prevents attackers from remotely accessing the network, and secures sensitive customer information

Built-In Security

Built-in security features protect your network from external threats by blocking malware attacks and keeping unauthorized users off the network. Network traffic can be filtered and access restricted based on MAC and IP address.

No Hidden Fees

All features are included in the price of the hardware - there are no recurring subscription or licensing fees. Expert-level support and industry-leading limited lifetime warranty are also included, along with chat support for the life of the product.

Multi-Site Remote Management

The cloud-hosted web interface and mobile app make it easy to remotely manage multiple sites, multiple networks, distributed and multi-tenant deployments. Each site is logically separated and has its own configuration, statistics, guest portal, and admin read/write privileges. Instant On allows you to create three admin accounts per site, offering the option to lock accounts from accidental deletion.

Management

Cloud-Based Management

The cloud-hosted web interface and mobile app make it easy to manage networks with Instant On APs and switches.

Simple Local Web GUI Management

For management of individual switches, the intuitive Web GUI makes management simple, even for non-technical users. Supports up to five (5) HTTP and HTTP Secure (HTTPS) sessions.

Secure Web-Management Sessions With HTTPS

Encrypts and otherwise protects management sessions through HTTP Secure (HTTPS), which prevents snooping of sensitive management information. Regardless of whether the switch is managed from the local Web GUI or the cloud, data between the switch and the management interface is encrypted and secure.

Firmware Update

Provides notification of the latest firmware with the ability to schedule update at a preferred time through Instant On mobile app and cloud-based web portal.



Configuration File Management

Allows the user to back up and restore the configuration settings in case of a firmware upgrade or to apply them to other switches on the network.

DHCP Client Mode

Allows the switch to be directly connected to a network, enabling plug-and-play operation. In the absence of a DHCP server on the network, the switch falls back to the default static address 192.168.1.1.

Locator LED

Allows users to set the locator LED on a specific switch to either turn on, blink, or turn off; simplifying troubleshooting by making it easy to locate a particular switch within a rack of similar switches.

Comprehensive LED Display

Provides an at-a-glance view of status, activity, speed, and full-duplex operation with per-port indicators.

Management VLAN ID

Provides secure management access to the switch for administrators from within the specified VLAN.

Simple Network Time Protocol (SNTP)

Allows automatic synchronization of the switch date and time for accurate tracking of system events and various schedules set by the administrator.

Quality Of Service (Qos)

Class of Service (CoS)

Provides time-sensitive packets (like VoIP and video) with priority over other traffic based on DSCP or IEEE 802.1p classification; packets are mapped to four hardware queues for more effective throughput.

Connectivity

Auto MDI/MDI-X

Adjusts automatically for straight-through or crossover cables on all 10/100/1000 ports.

Auto-negotiating capability

Supports half/full-duplex auto-negotiating capability on every port that doubles the throughput of every port.



1G fiber connectivity

Provides 1G fiber connections for uplinks and other connections across longer distances than copper cabling can support. SFP ports are in addition to available copper Ethernet ports, providing a higher total number of available ports. Two (2) and four (4) SFP ports available on 24- and 48- port models respectively.

Ethernet Alliance PSE Class 4 PoE Certification

Power Over Ethernet (PoE) functionality is supported on certain 1830 models, known as power source equipment (PSE) ports which provide power to connected devices.

With half of the ports supporting Class 4 PoE, these models provide up to 30 W per port, which allows support of class 4 PoE or IEEE 802.3at capable devices such as video IP phones, wireless access points, as well as any 15.4 W IEEE 802.3af compliant end device, mitigating the cost of additional electrical cabling and circuits that would otherwise be necessary.

Ethernet Alliance PD Class 3 PoE Certification

Devices receiving power through PoE are referred to as powered devices (PDs).

The 8-port non-PoE Gigabit Ethernet model is a powered device that can be powered by an upstream Power over Ethernet (PoE) switch for environments where no line power is available, besides being powered up by an external power adapter. Port 1 supports Class 3 PoE with the capability of receiving IEEE 802.3af PoE power up to a maximum of 13W.

Auto-PoE power configuration

The switch automatically assigns the required power to a port for a PD device based on Link Layer Discovery Protocol (LLDP).

PoE power allocation

Support multiple methods (LLDP-MED automatic, class of PoE, or usage-based) to allocate PoE power for more efficient energy savings.

PoE Scheduling

Allows user to configure a specific day/time of the week (e.g., business hours) for Instant On switches to supply power to connected devices (e.g., surveillance cameras, access points etc.).

Port Scheduling

Allows user to configure up to three (3) schedules to enable or disable individual ports or PoE power delivery on certain switch ports by selecting a particular time of the day or a periodic occurrence.

Switching

Flow control

Provides a flow-throttling mechanism propagated through the network to prevent packet loss at a congested node.

Spanning Tree Protocol (STP)

Standard Features

Supports 802.1D STP, 802.1w Rapid Spanning Tree Protocol (RSTP) for faster convergence. Provides redundant links while preventing network loops.

BPDU filtering

Drops BPDU packets when STP is enabled globally but disabled on a specific port.

Loop protection

Allows loop detection in the network for switches that do not run spanning tree, or on which STP feature is disabled.

IGMP v1, v2 snooping

IGMP snooping allows the switch to forward IPv4 multicast traffic intelligently. With IGMP snooping enabled, the switch forwards traffic only to ports that request the multicast traffic. This prevents the switch from broadcasting traffic to all ports and possibly affecting network performance.

Link aggregation

Groups together multiple ports of up to 16 trunks with a maximum of eight (8) ports per trunk automatically using Link Aggregation Control Protocol (LACP), or manually, to form a high-bandwidth connection to the network backbone that helps prevent traffic bottlenecks.

Link Layer Discovery Protocol (LLDP)

Advertises and receives management information from adjacent devices on a network, facilitating easy mapping by network management applications.

LLDP-MED (Media Endpoint Discovery)

Defines a standard extension of LLDP that stores values for parameters such as QoS and VLAN for automatic configuration of network devices such as IP phones.

VLAN support

Offers some of the benefits of both bridging and routing. VLANs partition the network into logical segments, which provide better administration, security, and multicast traffic management.

Port mirroring

Enables traffic on a port or VLAN to be simultaneously sent to a network analyzer for monitoring.

Auto recovery

Allows ports to be placed in a suspended state when defined error conditions are met. Features supported by Auto Recovery are BPDU Guard, Storm Control, Port Security, Loop Protection and Link Flap Prevention.

Network Security

TPM-based security

Includes a Trusted Platform Module (TPM) for secure hardware-based generation and storage of cryptographic keys used for secure connection to the Instant On cloud portal.

Automatic denial-of-service protection

Manages high-volume traffic and prevents denial-of-service (DoS) attacks against the network.

Global Storm Control

Protects against conditions where incoming packets flood the LAN, causing network performance degradation for unicast traffic with an unknown destination, and for broadcast and multicast traffic.



Performance and Efficiency

Energy Efficient Ethernet (EEE)

Compliant with 802.3az standard requirements to save energy during periods of low data activity.

Auto-port shut down

The switch saves power by automatically shutting down power to inactive ports. Power is restored on a port upon link detection.

Energy-efficient cooling

Includes variable speed fans operating only at the speed necessary to maintain operating temperature to reduce excess noise and power consumption.

Fan-less operation

Fan-less design for 8-port non-PoE, and PoE models as well as 24-port non-PoE model, making the switches ideal for silent operation environments.

Features Accessed Through Local Web-Management Interface

Quick start-up wizard

Includes a quick start-up wizard which enable automatic configuring of the initial settings such as IP address, device information and system time.

Jumbo frame support

Supports up to 9216 bytes frame size to improve the performance of large data transfers.

User account management

Password strength checking and aging feature provides enhanced security to user account administration on the local web management interface. Password management further enhances the security so that only authorized users can access the switch's web interface.

Secure Sockets Layer (SSL)

Encrypts all HTTP traffic and secures access to the local browser-based management of the switch.

SCP and TFTP file transfer

Provides different mechanisms for secure file transfer through SCP (Secure Copy Protocol) or TFTP.

Dual image support

Provide independent primary and secondary software images for backup while upgrading.

SNMPv1, v2c (read only)

Facilitates remote management of the switch as the device can be discovered and monitored from an SNMP management station.

Diagnostics

Event logs

Provides detailed information for problem identification and resolution.

Session logging

Standard Features

Displays the active users connected to the switch, displaying client IP address, duration of the individual session.

Remote syslog

Provides support for a single syslog server allowing the user to redirect and store events to a remote syslog server (supported on local web only).

Cable diagnostic tool

Provides the mechanism to detect and report potential cabling issues, such as cable opens or cable shorts on copper links, in addition to providing distance to the fault and total length of cable (supported on local web only).

Ping IPv4

The switch supports ICMP for sending ping requests to IPv4 addresses.

Support file

Includes summary information for the switch including the current switch configuration, statistics and buffered log messages (supported on local web only).

MAC address table

Also known as the bridge table or the forwarding database, this table enables the switch to forward traffic through the appropriate port and supports up to 16K MAC address entries.

Warranty, Service And Support

Aruba Instant On Limited Lifetime Support provides 24X7 phone support for the first 90 days and chat support for the entire warranty period. Community support is included for the life of the product.

Refer to the Hewlett Packard Enterprise website at hpe.com/ networking/services for details on the service-level descriptions and product numbers. For details about services and response times in your area, please contact your local Hewlett Packard Enterprise sales office.

Configuration Information

BTO N	Models	
	IOn 1830	
Rule #	Description	SKU
1	Aruba Instant On 1830 8G Switch	JL810A
	 8 RJ-45 autosensing 10/100/1000 ports 	
	Desktop Model	
	Aruba Instant On 1830 8G Switch	JL810A
	 No Localized Power Cord Selected 	
1	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch	JL811A
	 4 RJ-45 autosensing 10/100/1000 Class 4 PoE ports 	
	 4 RJ-45 autosensing 10/100/1000 ports 	
	• 1U - Height	
	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch	JL811A
	No Localized Power Cord Selected	
	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch	JL811A
	C15 PDU Jumper Cord (NA/MEX/TW/JP) Andread Cord (NA/MEX/TW/JP)	11 044 A
	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch	JL811A
	C15 PDU Jumper Cord (ROW) Aruba Instant On 1930 9C 4n Closed BoE 65W Switch	JL811A
	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch • NEMA L6-20P Cord (NA/MEX/JP/TW)	JLOTTA
1, 2	Aruba Instant On 1830 24G 2SFP Switch	JL812A
1, 2	• 24 RJ-45 autosensing 10/100/1000 ports	020127
	• 2 SFP 1000 Mbps ports (min=0 \ max=2 SFP Transceivers)	
	• 1U - Height	
	Aruba Instant On 1830 24G 2SFP Switch	JL812A
	 No Localized Power Cord Selected 	
	Aruba Instant On 1830 24G 2SFP Switch	JL812A
	 C15 PDU Jumper Cord (NA/MEX/TW/JP) 	
	Aruba Instant On 1830 24G 2SFP Switch	JL812A
	C15 PDU Jumper Cord (ROW)	
	Aruba Instant On 1830 24G 2SFP Switch	JL812A
4.0	NEMA L6-20P Cord (NA/MEX/JP/TW) And the language Cord (NA/MEX/JP/TW) And the language Cord (NA/MEX/JP/TW)	11 040 4
1, 2	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch	JL813A
	 12 RJ-45 autosensing 10/100/1000 Class 4 PoE ports 13 RJ-45 autosensing 10/100/1000 ports 	
	 12 RJ-45 autosensing 10/100/1000 ports 2 SFP 1000 Mbps ports (min=0 \ max=2 SFP Transceivers) 	
	 1U - Height Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch 	JL813A
	No Localized Power Cord Selected	02010/1
	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch	JL813A
	C15 PDU Jumper Cord (NA/MEX/TW/JP)	
	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch	JL813A
	 C15 PDU Jumper Cord (ROW) 	
	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch	JL813A
	 NEMA L6-20P Cord (NA/MEX/JP/TW) 	
1, 2	Aruba Instant On 1830 48G 4SFP Switch	JL814A
	• 48 RJ-45 autosensing 10/100/1000 ports	
	 4 SFP 1000 Mbps ports (min=0 \ max=4 SFP Transceivers) 	
	1U - Height Aruba Instant On 1930 49C 4SER Switch	11 04 4 4
	Aruba Instant On 1830 48G 4SFP Switch	JL814A

No Localized Power Cord Selected

Config	juration Information	
	Aruba Instant On 1830 48G 4SFP Switch	JL814A
	C15 PDU Jumper Cord (NA/MEX/TW/JP)	11.04.44
	Aruba Instant On 1830 48G 4SFP Switch	JL814A
	 C15 PDU Jumper Cord (ROW) Aruba Instant On 1830 48G 4SFP Switch 	JL814A
	NEMA L6-20P Cord (NA/MEX/JP/TW)	3L014A
1, 2	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch	JL815A
-, -	24 RJ-45 autosensing 10/100/1000 Class 4 PoE ports	0_0.0
	 24 RJ-45 autosensing 10/100/1000 ports 	
	 4 SFP 1000 Mbps ports (min=0 \ max=4 SFP Transceivers) 	
	• 1U - Height	
	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch	JL815A
	No Localized Power Cord Selected	
	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch	JL815A
	C15 PDU Jumper Cord (NA/MEX/TW/JP)	
	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch	JL815A
	C15 PDU Jumper Cord (ROW) And a least of the Annual Condition of the Ann	11.04.5.4
	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch	JL815A
	 NEMA L6-20P Cord (NA/MEX/JP/TW) Configuration Rules 	
Rule #	Description	
1	Localization (Wall Power Cord) required on orders without B2B or B2C (PDU Power	
	Cord). (See HPN Localization Menu)	
2	The following Transceivers install into this switch:	
_	Aruba Instant On 1G SFP LC SX 500m OM2 MMF Transceiver	R9D16A
	Aruba Instant On 1G SFP RJ45 T 100m Cat5e Transceiver	R9D17A
	Aruba 1G SFP LC LX 10km SMF Transceiver	J4859D
Notes	- Drop down under power supply should offer the following options and results:	
:		
	o Switch/Router to PDU Power Cord - B2B in NA, Mexico, Taiwan, and Japan or B2C	
	ROW.	
	o Switch/Router/Power Supply to Wall Power Cord - Localized Option	
	-No Localized Power Cord Selected - AC3 Option	
	OCA Only Model Selection Form - Aruba > Instant On > Switches:Aruba Instant On 1830 Switch Series	

SFP Transceivers	
Rule # Description	SKU
Aruba Instant On 1G SFP LC SX 500m OM2 MMF Transceiver	R9D16A
Aruba Instant On 1G SFP RJ45 T 100m Cat5e Transceiver	R9D17A
Aruba 1G SFP LC LX 10km SMF Transceiver	J4859D

	Aruba Instant On 1830 8G Switch (JL810A)	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch (JL811A)	Aruba Instant On 1830 24G 2SFP Switch (JL812A)	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch (JL813A)	Aruba Instant On 1830 48G 4SFP Switch (JL814A)	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch
I/O ports and	l slots			(JLOISA)		(JLOIJA)
iro porto anu	8 RJ-45 autosensing 10/100/1000 ports IEEE 802.3af Class 3 PD (port 1) (IEEE 802.3 Type 10BASE-T, IEEE 802.3u Type 100BASE-TX, IEEE 802.3ab Type 1000BASE-TX; IEEE 802.3ab Type 1000BASE-TX; IEEE 1000BASE-T/100BASE-T/100BASE-T/100BASE-T/100BASE-TX: half or full; 1000BASE-T: full only	8 RJ-45 autosensing 10/100/1000 ports IEEE 802.3at Class 4 PoE (ports 1-4) (IEEE 802.3 Type 10BASE-T, IEEE 802.3u Type 100BASE- TX, IEEE 802.3ab Type 1000BASE- TY, Duplex: 10BASE- T/100BASE- T/100BASE- TX: half or full; 1000BASE- T: full only	24 RJ-45 autosensing 10/100/1000 ports (IEEE 802.3 Type 10BASE-T, IEEE 802.3u Type 100BASE-TX, IEEE 802.3ab Type 1000BASE-T); Duplex: 10BASE-T/100BASE-TX: half or full; 1000BASE-T: full only 2 SFP 1GbE ports	24 RJ-45 autosensing 10/100/1000 ports IEEE 802.3at Class 4 POE (ports 1-12) (IEEE 802.3 Type 10BASE-T, IEEE 802.3u Type 100BASE- TX, IEEE 802.3ab Type 1000BASE- T); Duplex: 10BASE- T/100BASE- T/100BASE- T/100BASE- T/100BASE- TX: half or full; 1000BASE-T: full only 2 SFP 1GbE	48 RJ-45 autosensing 10/100/1000 ports (IEEE 802.3 Type 10BASE-T, IEEE 802.3u Type 100BASE-TX, IEEE 802.3ab Type 1000BASE-TY, Duplex: 10BASE-T/100BASE-T/100BASE-T/100BASE-T/100BASE-TX: half or full; 1000BASE-T: full only 4 SFP 1GbE ports	48 RJ-45 autosensing 10/100/1000 ports IEEE 802.3at Class 4 PoE (ports 1-24) (IEEE 802.3 Type 10BASE-T, IEEE 802.3u Type 100BASE-TX, IEEE 802.3ab Type 1000BASE-T); Duplex: 10BASE-T/100BASE-T/100BASE-T/100BASE-TX: half or full; 1000BASE-T: full only
				ports		4 SFP 1GbE ports
Physical Char	acteristics					
Dimensions	157.0(d) x 173.0(w) x 39.1(h) mm	195.1(d) x 245.1(w) x 43.9(h) mm	215.9(d) x 443.0(w) x 43.9(h) mm	253.0(d) x 443.0(w) x 43.9(h) mm	253.0(d) x 443.0(w) x 43.9(h) mm	351.0(d) x 443.0(w) x 43.9(h) mm
Weight	1.70 lb (0.77 kg)	3.40 lb (1.54 kg)	5.50 lb (2.49 kg)	7.65 lb (3.47 kg)	7.80 lb (3.54 kg)	10.90 lb (4.94 kg)
Processor and		· ·· y /	· ·· .	<u>y</u> /	· ··3/	, i ng <i>j</i>
	ARM Cortex- A9 @ 800MHz, 512 MB SDRAM, 256 MB flash; packet buffer: 1.5MB	ARM Cortex- A9 @ 800MHz, 512 MB SDRAM, 256 MB flash; packet	ARM Cortex- A9 @ 800MHz, 512 MB SDRAM, 256 MB flash; packet buffer: 1.5MB	ARM Cortex- A9 @ 800MHz, 512 MB SDRAM, 256 MB flash; packet buffer: 1.5MB	"RM Cortex- A9 @ 800MHz, 512 MB SDRAM, 256 MB flash; packet buffer: 1.5MB	ARM Cortex- A9 @ 800MHz, 512 MB SDRAM, 256 MB flash; packet buffer: 1.5MB

	T	T	T	T	Ι	T
	Aruba Instant On 1830 8G Switch (JL810A)	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch (JL811A)	Aruba Instant On 1830 24G 2SFP Switch (JL812A)	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch (JL813A)	Aruba Instant On 1830 48G 4SFP Switch (JL814A)	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch
				(JESTSA)		(JL815A)
Performand	е					
100 Mb latency	< 5.2 uSec	< 5.2 uSec	< 5.2 uSec	< 5.2 uSec	< 5.2 uSec	< 5.2 uSec
1000 Mb latency	< 2.8 uSec	< 2.8 uSec	< 2.8 uSec	< 2.8 uSec	< 2.8 uSec	< 2.8 uSec
10000 Mb latency	n/a	n/a	n/a	n/a	n/a	n/a
Throughp ut (Mpps)	11.90 Mpps	11.90 Mpps	38.68 Mpps	38.68 Mpps	77.37 Mpps	77.37 Mpps
Capacity	16 Gbps	16 Gbps	52 Gbps	52 Gbps	104 Gbps	104 Gbps
MAC address table size (# of entries)	8,000 entries	8,000 entries	16,000 entries	16,000 entries	16,000 entries	16,000 entries
Reliability MTBF (years)	188.2	105.9	203.6	96.6	114.4	83.5
Environme	T T	ı			1	
Operating temperature	32°F to 104°F (0°C to 40°C)	32°F to 104°F (0°C to 40°C)	32°F to 104°F (0°C to 40°C)	32°F to 104°F (0°C to 40°C)	32°F to 104°F (0°C to 40°C)	32°F to 104°F (0°C to 40°C)
Operating relative humidity	15% to 95% @ 104°F (40°C)	15% to 95% @ 104°F (40°C)	15% to 95% @ 104°F (40°C)	15% to 95% @ 104°F (40°C)	15% to 95% @ 104°F (40°C)	15% to 95% @ 104°F (40°C)
Nonopera ting/ storage temperatu re	-40°F to 158°F (-40°C to 70°C)	-40°F to 158°F (-40°C to 70°C)	-40°F to 158°F (-40°C to 70°C)	-40°F to 158°F (-40°C to 70°C)	-40°F to 158°F (-40°C to 70°C)	-40°F to 158°F (-40°C to 70°C)
Nonopera ting/ storage relative humidity	15% to 95% @ 140°F (60°C)	15% to 95% @ 140°F (60°C)	15% to 95% @ 140°F (60°C)	15% to 95% @ 140°F (60°C)	15% to 95% @ 140°F (60°C)	15% to 95% @ 140°F (60°C)
Altitude	up to 10,000 ft (3 km)	up to 10,000 ft (3 km)	up to 10,000 ft (3 km)	up to 10,000 ft (3 km)	up to 10,000 ft (3 km)	up to 10,000 ft (3 km)
Acoustics ¹						
	Fanless	Fanless	Fanless	LWAd = 3.1 Bel LpAm (Bystander) = 17 dB	LWAd = 3.4 Bel LpAm (Bystander) = 19 dB	LWAd = 4.0 Bel LpAm (Bystander) = 25 dB

Technical Specifications

Notes: ¹Acoustics measured in 23°C semi-anechoic chamber with a loading of 100% traffic and (for JL813A and JL815A) 50% PoE on all ports. Measured in accordance with ISO 7779. Declared in accordance with ECMA-109:2010. Values presented are the Declared A-Weighted Sound Power Level (LWAd) and the mean Bystander A-Weighted Sound Pressure Level (LpAm) 100% LWAd = 3.1**Fanless Fanless Fanless** LWAd = 3.4LWAd = 3.5traffic Bel LpAm Bel LpAm Bel LpAm (Bystander) = (Bystander) = (Bystander) = 17 dB 19 dB 20 dB 100% **Fanless Fanless Fanless** LWAd = 3.1LWAd = 3.5traffic / Bel LpAm Bel LpAm (Bystander) = (Bystander) = 0% PoE 17 dB 20 dB 100% **Fanless Fanless Fanless** LWAd = 3.1LWAd = 4.0Bel LpAm Bel LpAm traffic / (Bystander) = (Bystander) = 50% PoE 25 dB 17 dB 100% **Fanless Fanless Fanless** LWAd = 5.1LWAd = 5.7Bel LpAm Bel LpAm traffic / (Bystander) = (Bystander) = 100% PoE 35 dB 41 dB Aruba Aruba Aruba Aruba Aruba Aruba Instant On Instant On Instant On Instant On Instant On Instant On 1830 8G 1830 24G 1830 48G 1830 8G 4p 1830 24G 1830 48G **2SFP Switch 4SFP Switch Switch** Class4 PoE 12p Class4 24p Class4 65W Switch PoE 2SFP PoE 4SFP (JL810A) (JL812A) (JL814A) 195W Switch (JL811A) 370W Switch (JL813A) (JL815A) **Electrical Characteristics** Frequenc 50Hz/60Hz 50Hz/60Hz 50Hz/60Hz 50Hz/60Hz 50Hz/60Hz 50Hz/60Hz У AC 100-127VAC 100-127VAC 100-127VAC 100-127VAC 100-127VAC 100-127VAC / 200-/ 200-/ 200-/ 200-/ 200-/ 200voltage 240VAC 240VAC 240VAC 240VAC 240VAC 240VAC Current 12V -- 1.0A 1.0A/0.5A 0.4A/0.3A 2.7A/1.4A 0.9A/0.6A 5.2A/2.6A Maximum 100-127V: 100-127V: 100-127V: 100-127V: 100-127V: 100-127V: 86.07W 200-19.1W 200-244.6W 200-40.2W 200-462.5W 200power 8.09W 200-220V: 220V: 19W 220V: 220V: 40W 220V: 220V: 8.05W rating 83.67W 237.2W 452.5W Idle 100-127V: 100-127V: 100-127V: 100-127V: 100-127V: 100-127V: 5.8W 200-8.3W 200-7.6W 200-14.5W 200-17.7W 200-25.8W 200power 220V: 5.9W 220V: 8.2W 220V: 7.8W 220V: 13.4W 220V: 17.7W 220V: 25.4W PoE 13W max 65 W Class 4 195 W Class 370 W Class Class 3 PD PoE 4 PoE 4 PoE power External **Power** Internal Internal Internal Internal Internal supply power power supply power supply power supply power supply power supply adapter (included) Safety **EN/IEC EN/IEC EN/IEC EN/IEC EN/IEC EN/IEC** 60950-1:2006 60950-1:2006 60950-1:2006 60950-1:2006 60950-60950-+ A11:2009 + + A11:2009 + + A11:2009 + + A11:2009 + 1:2006 +1:2006 +A1:2010 + A1:2010 + A1:2010 + A1:2010 + A11:2009 + A11:2009 +

Technical Spi	Lenications	1	1	1	1	1
	A12:2011 + A2:2013 EN/IEC 62368-1, 2nd. & 3rd. Ed. UL 62368-1, 2nd. & 3rd. Ed. CAN/CSA C22.2 No. 62368-1, 2nd. & 3rd. Ed. EN/IEC 60825-1:2014 Class 1	A12:2011 + A2:2013 EN/IEC 62368-1, 2nd. & 3rd. Ed. UL 62368-1, 2nd. & 3rd. Ed. CAN/CSA C22.2 No. 62368-1, 2nd. & 3rd. Ed. EN/IEC 60825-1:2014 Class 1	A12:2011 + A2:2013 EN/IEC 62368-1, 2nd. & 3rd. Ed. L 62368-1, 2nd. & 3rd. Ed. CAN/CSA C22.2 No. 62368-1, 2nd. & 3rd. Ed. EN/IEC 60825-1:2014 Class 1	A12:2011 + A2:2013 EN/IEC 62368-1, 2nd. & 3rd. Ed. UL 62368-1, 2nd. & 3rd. Ed. CAN/CSA C22.2 No. 62368-1, 2nd. & 3rd. Ed. EN/IEC 60825-1:2014 Class 1	A1:2010 + A12:2011 + A2:2013 EN/IEC 62368-1, 2nd. & 3rd. Ed. UL 62368-1, 2nd. & 3rd. Ed. CAN/CSA C22.2 No. 62368-1, 2nd. & 3rd. Ed. EN/IEC 60825- 1:2014 Class 1	A1:2010 + A12:2011 + A2:2013 EN/IEC 62368-1, 2nd. & 3rd. Ed. UL 62368-1, 2nd. & 3rd. Ed. CAN/CSA C22.2 No. 62368-1, 2nd. & 3rd. Ed. EN/IEC 60825- 1:2014 Class
Emission	EN 55032:2015/ CISPR 32, Class A FCC CFR 47 Part 15: 2018 Class A ICES-003 Class A VCCI Class A CNS 13438 Class A KN 32 Class A AS/NZS CISPR 32 Class A	EN 55032:2015/ CISPR 32, Class A FCC CFR 47 Part 15: 2018 Class A ICES-003 Class A VCCI Class A CNS 13438 Class A KN 32 Class A AS/NZS CISPR 32 Class A	EN 55032:2015/ CISPR 32, Class A FCC CFR 47 Part 15: 2018 Class A ICES-003 Class A VCCI Class A CNS 13438 Class A KN 32 Class A AS/NZS CISPR 32 Class A	EN 55032:2015/ CISPR 32, Class A FCC CFR 47 Part 15: 2018 Class A ICES-003 Class A VCCI Class A CNS 13438 Class A KN 32 Class A AS/NZS CISPR 32 Class A	EN 55032:2015/ CISPR 32, Class A FCC CFR 47 Part 15: 2018 Class A ICES-003 Class A VCCI Class A CNS 13438 Class A KN 32 Class A AS/NZS CISPR 32 Class A	EN 55032:2015/ CISPR 32, Class A FCC CFR 47 Part 15: 2018 Class A ICES-003 Class A VCCI Class A CNS 13438 Class A KN 32 Class A AS/NZS CISPR 32 Class A
	Aruba Instant On 1830 8G Switch (JL810A)	Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch (JL811A)	Aruba Instant On 1830 24G 2SFP Switch (JL812A)	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch (JL813A)	Aruba Instant On 1830 48G 4SFP Switch (JL814A)	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch (JL815A)
Immunity						
Generic	EN 55035, CISPR 35, KN35	EN 55035, CISPR 35, KN35				
EN	EN 55035, CISPR 35	EN 55035, CISPR 35				
ESD	EN/IEC 61000-4-2	EN/IEC 61000-4-2	EN/IEC 61000-4-2	EN/IEC 61000-4-2	EN/IEC 61000-4-2	EN/IEC 61000-4-2

Radiated	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
	61000-4-3	61000-4-3	61000-4-3	61000-4-3	61000-4-3	61000-4-3
EFT/Burst	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
	61000-4-4	61000-4-4	61000-4-4	61000-4-4	61000-4-4	61000-4-4
Surge	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
	61000-4-5	61000-4-5	61000-4-5	61000-4-5	61000-4-5	61000-4-5
Conducte	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
d	61000-4-6	61000-4-6	61000-4-6	61000-4-6	61000-4-6	61000-4-6
Power	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
frequency	61000-4-8	61000-4-8	61000-4-8	61000-4-8	61000-4-8	61000-4-8
magnetic						
field						
Voltage	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
dips and	61000-4-11	61000-4-11	61000-4-11	61000-4-11	61000-4-11	61000-4-11
interrupti						
ons						
Harmonic	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC	EN/IEC
S	61000-3-2	61000-3-2	61000-3-2	61000-3-2	61000-3-2	61000-3-2
Flicker	EN /IEC	EN /IEC	EN /IEC	EN /IEC	EN /IEC	EN /IEC
. HORGI	61000-3-3	61000-3-3	61000-3-3	61000-3-3	61000-3-3	61000-3-3
Device	Aruba Instant	Aruba Instant	Aruba Instant	Aruba Instant	Aruba Instant	Aruba Instan
Managem	On Cloud;	On Cloud;	On Cloud;	On Cloud;	On Cloud;	On Cloud;
ent	Web	Web browser;	Web browser;	Web	Web	Web
ent	browser;	SNMP	SNMP	browser;	browser;	browser;
	SNMP	Manager	Manager	SNMP	SNMP	SNMP
	Manager	Managor	Managor	Manager	Manager	Manager
Mounting	Managor		I	Managor	Managor	Managor
Mounting	Supports	Mounts in an	Mounts in an	Mounts in an	Mounts in an	Mounts in an
positions	table-top	ElAstandard	ElAstandard	ElAstandard	ElAstandard	ElAstandard
and	mounting	19 in. telco	19 in. telco	19 in. telco	19 in. telco	19 in. telco
supported	Supports	rack or	rack or	rack or	rack or	rack or
racking	wall-mounting	equipment	equipment	equipment	equipment	equipment
Tacking	with ports	cabinet. 2-	cabinet. 2-	cabinet, 2-	cabinet. 2-	cabinet. 2-
	facing either	post rack kit	post rack kit	post rack kit	post rack kit	post rack kit
	up or down	included	included	included	included	included
	Supports	Supports	Supports	Supports	Supports	Supports
	under-table	table-top	table-top	table-top	table-top	table-top
	mounting	mounting	mounting	mounting	mounting	mounting
	using base	Supports	Supports	Supports	Supports	Supports
	surface	rack-	rack-	rack-	rack-	rack-
	mounting	mounting	mounting	mounting	mounting	mounting
	holes	Supports	Supports	Supports	Supports	Supports
	1.0.00	wall-mounting	wall-mounting	wall-mounting	wall-	wall-
			1	_	mounting	mounting
			with ports	WILLI DOLLS		
		with ports	with ports facing either	with ports facing either	_	
		with ports facing either	facing either	facing either	with ports	with ports
		with ports facing either up or down	facing either up or down	facing either up or down	with ports facing either	with ports facing either
		with ports facing either up or down Supports	facing either up or down Supports	facing either up or down Supports	with ports facing either up or down	with ports facing either up or down
		with ports facing either up or down Supports under-table	facing either up or down Supports under-table	facing either up or down Supports under-table	with ports facing either up or down Supports	with ports facing either up or down Suports
		with ports facing either up or down Supports under-table mounting	facing either up or down Supports under-table mounting	facing either up or down Supports under-table mounting	with ports facing either up or down Supports under-table	with ports facing either up or down Suports under-table
		with ports facing either up or down Supports under-table mounting using the	facing either up or down Supports under-table mounting using the	facing either up or down Supports under-table mounting using the	with ports facing either up or down Supports under-table mounting	with ports facing either up or down Suports under-table mounting
		with ports facing either up or down Supports under-table mounting using the brackets	facing either up or down Supports under-table mounting using the brackets	facing either up or down Supports under-table mounting using the brackets	with ports facing either up or down Supports under-table mounting using the	with ports facing either up or down Suports under-table mounting using the
		with ports facing either up or down Supports under-table mounting using the	facing either up or down Supports under-table mounting using the	facing either up or down Supports under-table mounting using the	with ports facing either up or down Supports under-table mounting	with ports facing either up or down Suports under-table mounting

Technical Specifications

	Aruba Instant On 1830 8G Switch (JL810A)	surface up. To prevent possible impact to longterm reliability, product should not be mounted upside-down Aruba Instant On 1830 8G 4p Class4 PoE 65W Switch (JL811A)	surface up. To prevent possible impact to longterm reliability, product should not be mounted upside-down Aruba Instant On 1830 24G 2SFP Switch (JL812A)	Aruba Instant On 1830 24G 12p Class4 PoE 2SFP 195W Switch (JL813A)	Aruba Instant On 1830 48G 4SFP Switch (JL814A)	Aruba Instant On 1830 48G 24p Class4 PoE 4SFP 370W Switch (JL815A)
Transceiv ers			Aruba Instant On 1G SFP LC SX 500m OM2 MMF Transceiver (R9D16A)	Aruba Instant On 1G SFP LC SX 500m OM2 MMF Transceiver (R9D16A)	Aruba Instant On 1G SFP LC SX 500m OM2 MMF Transceiver (R9D16A)	Aruba Instant On 1G SFP LC SX 500m OM2 MMF Transceiver (R9D16A)
			Aruba 1G SFP LC LX 10km SMF Transceiver (J4859D)	Aruba 1G SFP LC LX 10km SMF Transceiver (J4859D)	Aruba 1G SFP LC LX 10km SMF Transceiver (J4859D)	Aruba 1G SFP LC LX 10km SMF Transceiver (J4859D)

Standards and Protocols (applies to all products in series)

IEEE Standards Support				
IEEE 802.3	10 Mbps Ethernet			
IEEE 802.3u	100Base-T Ethernet			
IEEE 802.3z	1000 Mbps Ethernet			
IEEE 802.3ab	1000Base-T			
IEEE 802.3x	Flow Control			
IEEE 802.1Q	VLANs			
IEEE 802.1p	Traffic Prioritization			
IEEE 802.3ad	Link Aggregation Control Protocol (LACP)			
IEEE 802.1D	Spanning Tree Protocol			
IEEE 802.1w	Rapid Spanning Tree Protocol			
IEEE 802.3af	PoE 1 (PoE models only)			
IEEE 802.3at	PoE 1 (PoE models only)			
IEEE 802.3az	Energy-Efficient Ethernet (EEE)			
IEEE 802.1AB	Link Layer Discovery Protocol			
IEEE 802.3ac	Frame extension for VLAN tags			

IETF Standards Support

Technical Specifications

- RFC 768
- RFC 783
- RFC 791
- RFC 792
- RFC 793
- RFC 813
- RFC 879
- RFC 896
- RFC 826
- RFC 894
- RFC 919
- RFC 922
- RFC 950 • RFC 1042
- RFC 1071
- RFC 1123
- RFC 1141
- RFC 1155
- RFC 1157 RFC 1350
- RFC 1533
- RFC 1541
- RFC 1624
- RFC 1700
- RFC 1867
- RFC 2030
- RFC2616
- RFC 2131
- RFC 2132
- RFC 3164
- RFC 5424
- RFC3411
- RFC3412
- RFC3413
- RFC 4330
- RFC 3268
- RFC 4251
- RFC 4252
- RFC 4253
- RFC 4254
- RFC 4716
- RFC 4419
- RFC 4541

IETF Standards Management Support

- RFC 1213
- RFC 1286
- RFC 1493
- RFC 1573
- RFC 1643
- RFC 2011
- RFC 2012 • RFC 2013

- RFC 2233
- RFC 2578
- RFC 2665
- RFC 2666
- RFC 2737
- RFC 2863
- RFC 4022
- DEC 4440
- RFC 4113RFC 1212
- RFC 2271
- RFC 2295
- RFC 2579
- RFC 2580
- RFC 3410
- RFC 3417

Summary of Changes

Date	Version History	Action	Description of Change:
01-Aug-2022	Version 4	Changed	Configuration Information and Technical
_			Specifications sections were updated.
16-May-2022	Version 3	Changed	Configuration Information section was updated.
04-Apr-2022	Version 2	Changed	Technical Specifications section was updated.
24-Jan-2022	Version 1	New	New QuickSpecs

Copyright

Make the right purchase decision. Contact our presales specialists.





© Copyright 2022 Hewlett Packard Enterprise Development LP. The information contained herein is subject to change without notice. The only warranties for Hewlett Packard Enterprise products and services are set forth in the express warranty statements accompanying such products and services. Nothing herein should be construed as constituting an additional warranty. Hewlett Packard Enterprise shall not be liable for technical or editorial errors or omissions contained herein.

To learn more, visit: http://www.hpe.com/networking

a50004271enw - 16875 - Worldwide - V4 - 01-August-2022