# **548-APOE** | DATASHEET





# ULTIMATE PERFORMANCE

Alta Labs newest switch offering, the S48-APOE, is designed to deliver maximum performance in enterprise, commercial, corporate, hotels, restaurants, resorts, entertainment venues, Pro AV, MDU (Multi-Dwelling Units), and any environment requiring high-performance connectivity and PoE+ flexibility. The S48-APOE features full PoE+ Power over Ethernet connectivity on all 48 ports as requested by our customers. A powerful 740 W PoE budget to allow you the flexibility to power a multitude of network devices. It includes (16) 2.5 Gbps and (32) 1 Gbps Ethernet ports. 4 SFP+ ports provide up to 10 Gbps connectivity. The S48-APoE is a fully managed rackmountable switch and includes Bluetooth functionality for seamless device setup.

	S8-POE	516-POE	524-POE	S48-APOE
Total Ports	8	16	24	48
1 Gbps Ports	8	16	24	32
2.5 Gbps Ports	-	-	-	16
PoE+ Ports	4	8	16	48
PoE Budget	60 W	120 W	240 W	740 W
SFP/SFP+	-	Up to 1 Gbps	Up to 10 Gbps	Up to 10 Gbps
Bluetooth	<b>v</b>	<b>v</b>	<b>`</b>	<b>v</b>

#### FEATURES

- Full Power Over Ethernet
- 740W PoE Budget
- (4) SFP+ Ports
- (16) 2.5 Gbps Ethernet Ports
- (32) 1 Gbps Ethernet Port
- Bluetooth Setup
- Mobile App
- Scalable Cloud-Based Management
- VLAN Stacking
- Egress and Ingress Rate Limiting
- IGMP Snooping
- 802.1X Authentication
- Network Loop Detection
- Customizable Dashboard
- Status Snapshots
- Device Cards
- Site Manager
- Mounting Flexibility (Rack and Wall)
- More Features to Come with Automatic Firmware Updates

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#### **Power Over Ethernet**

The Alta Labs S48-APOE features full PoE+ connectivity on all ports. The switch has a PoE budget of 740 Watts and is capable of providing up to 30 Watts of power per port. It supports the 802.3at PoE+ standard and is backwards compatible with the 802.3af PoE standard. Power your Alta Labs Access Points and other devices that support 802.3at or 802.3af standards.



#### **High Performance Connectivity**

The S48-APOE switch provides four SFP+ ports for high-capacity fiber or copper connections of 1 Gbps, 2.5 Gbps, 5 Gbps, or 10 Gbps. The first 32 Ethernet ports support up to 1 Gbps connections and the last 16 Ethernet ports support up to 2.5 Gbps connections.



#### **Bluetooth Setup**

Alta Labs switches include Bluetooth functionality allowing for seamless setup using the Alta Labs mobile app.



#### **Mobile App**

Monitor and manage your networks from the convenience of your mobile device. The management interface is easily accessible via mobile app or web browser. Sign up for an Alta Labs account using just your name, email, and password or sign in using your Google or Apple account.



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### Scalable Cloud-Based Management

Alta Labs provides an intuitive and easy-to-use cloud-based management interface for Alta Labs devices. Designed for optimum scalability using a high-availability architecture for the ultimate in convenience and worldwide accessibility. Built on a worldwide content delivery network to optimize response and latency, our global cloud infrastructure ensures geographically optimized connectivity through our redundant network.

Deploy and manage multiple sites quickly and easily. Add, delete, or rename sites instantly. Toggle between sites from a site selection drop-down. Each site contains its own data set.



# **Advanced Features**

Join our community of users at <u>forum.alta.inc</u> to brainstorm innovative uses of advanced features via our command line interface.

## **VLAN Stacking**

As one of our advanced features, the S48-APOE supports VLAN stacking, or Q-in-Q, to provide your customers (and their customers) with their own subsets of VLANs.

## Egress and Ingress Rate Limiting

Alta Labs switches offer egress and ingress rate limiting. This allows inbound and outbound traffic to be limited to a portion of the available bandwidth per connection.

For example, a hotel may want to provide guests with free 5 Mbps internet download (egress) connections but require guests pay an extra fee for 100+ Mbps speeds. The upload (ingress) speeds from the guests devices can also be limited.



## **IGMP Snooping**

IGMP Snooping functionality is incorporated into Alta Labs switches to optimize network performance by reducing unnecessary traffic. This is particularly helpful for IPTV or multicast video streams.

### 802.1X Authentication

Alta Labs switches support 802.1x Authentication to allow for more dynamic methods of network authentication. VoIP phones and other 802.1x-compliant hardware can authenticate themselves on to the network, helping with deployment on larger networks.

### **Network Loop Detection**

Network loops can deteriorate performance or even cause network failure. Our built-in network loop detection functionality is designed to help you eliminate any potential network loops.

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### **Alta Labs Cloud Management Platform**

The Alta Labs Cloud Management Platform provides many features that can be utilized on your Alta Labs Switches.

#### **Customizable Dashboard**

Customize your dashboard with the information you want to see: IP address, Load, number of devices, MAC address, firmware version, network color assignment, and real-time status details. Details are sortable by column.

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bcb927895241		• • •	~ 0 b/s ~ 108 kb/s	Û
bcb923218939			~7.08 kb/s ~290 kb/s	Ū

#### **Status Snapshots**

View upload and download throughput with a visual timeline on the dashboard for each device displayed along with the number of connected devices, average processor load, channel load, and average connected devices. Select a snapshot of the last minute, last hour, last two days, or last two months.

#### **Device Cards**

Easily view connection details and configure your ports by clicking the device icon.

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#### Site Manager

The Alta Site Manager provides an overview of all sites, displays the number of devices for each site, and shows when updates are needed. New sites can be added and current sites can be duplicated or removed. Use the search option to look for a specific site.



# **548-APOE** | SPECIFICATIONS

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MECHANICAL	
Dimensions	440 x 310 x 44 mm (17.32 x 12.20 x 1.73")
Weight	4.99 kg (11 lbs)
Material Type	SGCC
Material Finish	Powder coat - Matte
Color	Metalic gray
PORTS	
Interface ports	(36) 10/100/1000 Mbps, (16) 10/100/1000/2500 Mbps
SFP/SFP+	(4) SFP+
Switching Capacity	88 Gbps
Non-blocking Throughput	44 Gbps
Forwarding Rate	65.5 Gbps
PoE Budget/Max	740 Watts
PoE Supply	30 Watts per port
Per Port PoE	(48) 802.3at PoE+
Non-PoE Ports	None

LEDS	
PoE	Orange
Network	Blue: 10/100/1000 Mbps, White: 2.5 Gbps
SFP/SFP+	Blue: 10/100/1000 Mbps White: 2.5/ 5/10 Gbps

HARDWARE	
Packet Buffer	12 Mbit
Mac Table Size	32K
Energy Efficient Ethernet	Yes
Management	Factory reset button
Band	2.4 GHz (For Bluetooth Setup)
Bluetooth Version	BLE
Total Power	7 dBm EIRP
Gain	2 dBi

POWER	
Idle Power Consumption	X Watts
Max Power Consumption w/o PoE	X3 Watts
Max Power Consumption Full PoE	X Watts
Output	PoE+, 54VDC, 0.6A Max.
Power Supply	Universal AC, 100 - 240VAC 50-60Hz Internal
RJ45 Port Surge Protection	12kV for ESD - contact, 25kV for ESD - Air

ENVIRONMENTAL	
Mounting	Rackmount, Wallmount
Operating Temperature	-5 to 50° C (23 to 122° F)
Operating Humidity	10 to 90% Noncondensing
IP Rating	None
EMI Rating	
Cooling Fan	Yes
Certifications	CE, FCC, IC

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#### **Mounting Flexibility**

The S48-APOE include rack ears that can be connected to the switches for rack installation or mounting on a wall.

The S48-APOE includes the Rackstud<sup>™</sup> DUO toolless rackmount system.





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