EC-AS5812-54T

Edge-Core 48x 10G RJ-45, 6 x 40G QSFP, ONIE, Redundant PSU

Product Overview

Edge-Core 48x 10G RJ-45, 6 x 40G QSFP, ONIE, Redundant PSU,The AS5812-54T provides full line-rate switching at Layer 2 or Layer 3 across 48 x 10GbE ports and 6 x 40GbE uplinks.



Specifications

Overview:

The Edge-core AS5812-54T switch meets the high-performance, availability, and network-scaling requirements of enterprise and cloud data centers. The AS5812-54T provides full line-rate switching at Layer 2 or Layer 3 across 48 x 10GbE ports and 6 x 40GbE uplinks. The switch can be deployed either as a Top-of-Rack switch, or as part of a 10GbE or 40GbE distributed spine, forming a non-blocking folded-CLOS data center fabric. The switch is rack mountable in either a standard 19 inch rack, or with the Open Rack Switch Adapter in the 21 inch Open Rack.The AS5812-54T hardware provides the high-availability features required for data center operation, including; redundant, hot-swappable AC power input, 4+1 redundant fan modules, and port-to-power or power-to-port airflow options. The AS5812-54T is an ideal Top-of-Rack switch for virtualized data centers, with its support of VXLAN and NVGRE tunneling functions in hardware, leveraging existing Cat 5e/Cat 6/Cat 6A/Cat 7 cabling infrastructure that saves further investment.

Features:

- Cost-effective, bare-metal switch infrastructure for data center fabric.
- 48 x RJ-45 Copper, supporting 10GBASE-T, 1000BASE-T and 100BASE-TX Ethernet on Cat 6, Cat 6 A and Cat 7twisted-pair cable.
- 48 x RJ-45 Copper, supporting 1000BASE-T and 100BASE-TX on Cat 5e UTP, Cat 6, Cat 6A and Cat 7 twisted-pair cable.
- 6 x 40 QSFP switch ports, each supporting 40GbE (DAC, 40GBASE-SR4/LR4) or 4 x 10GbE (DAC or fiber breakout cable).
- Hot-swappable, load sharing, redundant AC PSUs power input option.
- Full line-rate Layer 2 or Layer 3 forwarding of 720 Gbps.
- VXLAN and NVGRE tunneling support in hardware for network virtualization.
- Rack mountable in standard 19" racks. Mountable in 21" Open Rack with the Open Rack Switch Adapter.
- Supports hot/cold aisle with port-to-power and power-to-port airflow SKUs.

- All ports on front; PSUs, fan tray on rear.
- Hot swappable 4+1 redundant fan modules.
- Management: Ethernet and console RJ-45 ports; USB storage port.
- Hardware switch pre-loaded with Open Network Install Environment (ONIE) for automated loading of compatible NOS software.
- Compatible with Open Network Linux, the open-source, OCP-approved reference NOS.
- AS5812-54T SKU compatible with Cumulus® Linux® feature release version.

Specifications:

© 2016 Respective owners and brand holders. This table has been carefully researched and generated by ComXpert International CC (http://www.comx.co.za), however, errors and omissions may occur. Only references to South Africa apply. All products are sourced in South Africa from the official suppliers and the warranty is that of the local supplier. E&OE. This table and our site's content may be used on condition that this notice and link remains intact and unaltered.

Specifications	
Product Code	EC-AS5812-54T
Ports	
Switch Ports	48 x SFP+ each supporting 10GbE or 1GbE
	6 x QSFP each supporting 40GbE or 4 x 10GbE
Management Ports on Front Panel	1 x RJ-45 serial console
	1 x RJ-45 100/1000BASE-T management
	1 x USB Type A storage port
Key Components	
Switch Silicon	Broadcom BCM56854 Trident II 720Gbps
CPU Modules	
AS5812-54T	Intel Atom C2538 quad-core 2.4GHz x86 proces
	8 GB SO-DIMM DDR3 RAM with ECC
	16 MB SP
	8 GB NAND flash
	8GB SD Card
Performance	
Wire Speed Forwarding	L2 and L3
Switching Capacity	720 Gbps
Forwarding Rate	1 Bpps
MAC Addresses	320 K
VLAN IDs	4 K
	Jumbo frames (9216 Bytes)
L3 Routes	IPv4 64K, IPv6 20K
Packet Buffer Size	12MB shared buffer pool
Latency (RFC2544)	720 ns (L2/L3, cut thru, full line rate)
Supported Optics and Cables	

RJ45 Copper ports	10GBASE-T on Cat 6, Cat 6A and Cat 7 twisted-pair cable
	1000BASE-T and 100BASE-TX on Cat 5e UTP, Cat 6, Cat 6A
	and Cat 7 twisted-pair cable.
QSFP Ports	40GBASE-CR4 DAC; 0.5 m to 7 m; passive and active
	40GBASE-CR4 DAC to 4 x SFP+ 10GBASE-CR DAC; up to 5m
	passive; up to 10m active
40GBASE-SR4	Up to 100 m over OM3 MMF, 150 m over OM4 MMF
	40GBASE-SR4 to 6 x 10GBASE-SR: 100 m over OM3, 150 m OM4
40GBASE-LR4	Up to 10km over SMF
Physical and Environmental	
Dimensions (WxDxH)	47.3 x 44.25 x 4.39 cm (18.6 x 17.4 x 1.71+ in) Weight: 8.5 kg (18.74 lb), with two installed PSU modules
Fans	hot-swappable 4+1 redundant fans
Operating Temperature	0 degreesC to 40 degreesC (32 degreesF to 104 degreesF)
Storage Temperature	-40 degreesC to 70 degreesC (-40 degreesF to 158 degreesF)
Operating Humidity	5% to 95% non-condensing
LEDs	
10G SFP+ Port LEDs	Link Speed, Link Status, Activity
40G QSFP Port LEDs	Link Status, Activity for 40G status
40G QSFP Breakout LEDs	set of 24 LEDs, 4 per QSFP port
	show Link, Status, Activity 10G links with 4x10G breakout
Ethernet Management Port LED	Link Status, Activity
Console Port LED	Link Status
System LEDs	PSU1, PSU2, Diagnostic, Fans, Locator
Software	Open Network Install Environment (ONIE) software installer
Compatible with the following NOS software	Open Network Linux, the open-source, OCP reference NOS Cumulus Linux
Compatible with the following NOS options	
AS5710-54X	Open Network Linux, the open-source, OCP reference NOS
	Switch Light OS from Big Switch Networks, and their Big Tap
	Monitoring Fabric and Big Cloud Fabric applications
Power	
PSUs	2 redundant, load-sharing, hot-swappable AC or -48 VDC
Input Voltage	90 to 264 VAC at 50-60 Hz. -48 to -72 VDC.
Input Current	Max 6 A@100/120VAC, 3 A@ 200/240VAC
	10 A@ -72 VDC

PSU Efficiency	Up to 93% for AC PSUs
	12 VDC power input option
Max Power	282 W, without pluggable optics
Regulatory	EMI
	CE Mark (EN55022 Class A)
	FCC Part 15 Class A
	VCCI
	Safety
	CB, EN 60950
	UL/CUL
Environmental	Temperature: IEC 68-2-14
Drop	ISTA 2A
	RoHS-6 Compliant
Country of Origin	Taiwan (TAA Compliant)

Product Information Online

For the latest product information, availability and purchasing details, please visit the product page:

Product page:
https://www.comx-computers.co.za/EC-AS5812-54T-Edge-Core-48x-10G-RJ-45-6-x-40G-QSFP-ONIE-Redundant-PSU-p-150938.php

Images and specifications are provided for reference and are subject to change without notice. E&OE.

Terms of Use: https://www.comx-computers.co.za/terms-of-use.php
Terms of Sale: https://www.comx-computers.co.za/terms-of-sale.php

PDF generated: 2026-11-14 00:36:26.

This PDF was generated automatically and may include content prepared or assisted by automated or AI-based systems. While reasonable care is taken to ensure accuracy, errors or omissions may occur.

For the most current and accurate product information, please refer to the product information available on our website. If any specification or other information differs from information published elsewhere, please confirm the details with us before relying on the information or making a purchasing decision.

If you identify an error or discrepancy, please report it to us so that we may investigate and correct it where necessary.