

MAKE SURE YOU HAVE THE FOLLOWING

- 48-Port 10G SFP + and 6-Port QSFP+ Top-of-Rack Switch
- Power Cords – 2
- Rack-mounting kit
(two ears\ two L-brackets\six M4 screws\eight M6 screws)
- Four adhesive foot pads
- RJ-45 to DB-9 serial console cable
- This Quick Installation Guide

Detailed installation instructions are contained in a User Manual available on the Supermicro website at:
<http://www.supermicro.com/products/accessories/Networking/SSE-X3648S.cfm>.

Instructions for rack mounting using either the supplied mounting flanges or the supplied rails are included in the manual and summarized below.

Note: This is a “bare-metal switch which comes without operating software - you will need to obtain the OS from a third party. Make sure the software company has confirmed compatibility with this Supermicro SSE-X3648S/SSE-X3648SR switch and use their instructions for installing their software. Supermicro recommends Cumulus™Linux® from Cumulus Networks™, Inc.

SELECTING A SITE

The SSE-X3648S/SSE-X3648SR can be mounted in a standard 19-inch equipment rack or on a horizontal surface.

MOUNTING

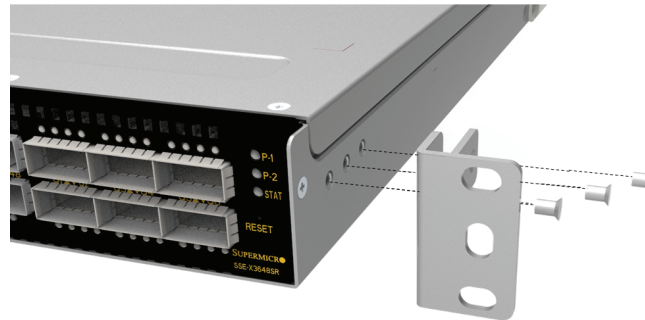
Instructions for different mounting options are shown below:

Rack Mounting

This switch can be mounted in a rack using the supplied mounting flanges or with optional mounting rails.

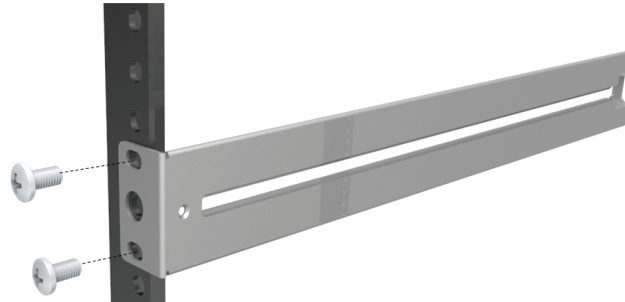
To rack-mount devices using the supplied brackets (flanges):

1. Attach the ears to the device using the screws provided in the Rack-Mounting Kit.



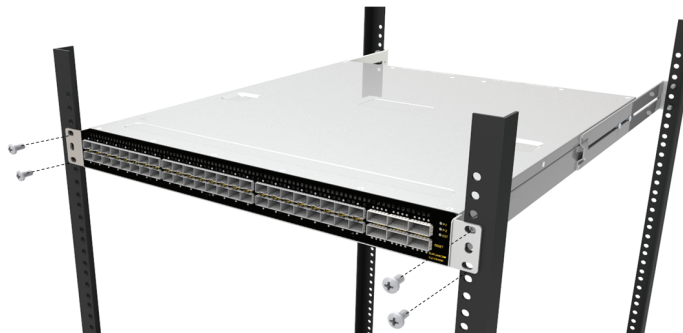
Note: The switch can also be mounted in a rack using a rack shelf or rack “L” brackets.

2. Mount the L-bracket in the rack, using the M6 screws provided in the Rack-Mounting Kit.



3. Mount the device in the rack, using the M6 screws provided in the Rack-Mounting Kit.

Caution: Due to the weight of the switch, installation should be done



4. After installation, go to “Connecting to a Power Source” on this page.
5. If installing multiple switches, mount them in the rack, one on top of the other.

Desktop or Shelf Mounting

1. Attach the four adhesive feet to the bottom of the first switch.



2. Set the device on a flat surface near an AC power source, making sure there are at least two inches of space on all sides for proper air flow.
3. After installation, go to “Connecting to a Power Source”.

ETHERNET CABLING

Connect the required devices with the appropriate cables.

CONNECTING TO A POWER SOURCE

To connect a device to a power source:

1. Insert the Power Supply Unit (PSU) cable plug directly into the AC socket of a PSU located at the back of the switch.



Note: For electrical safety purposes, please pay attention to the following warning notices, printed on the switch unit:

Caution: Disconnect the power cord from all power sources to completely remove power from the device.

Caution: If the installation requires a different power cord than the one supplied with the device, make sure you use a power cord displaying the mark of the safety agency that defines the regulations for power cords in your country. The mark is your assurance that the power cord can be used safely with the device.

- Plug the other end of the cable into a grounded, 3-pin, AC power source.



Note: For use outside North America, you may need to change the AC line cord. You must use a line cord that has been approved for the connector type in your country.

- Repeat steps 1 and 2 when a second PSU module is installed. Two installed PSU modules operate in a load-sharing mode and provide 1+1 redundancy.

QUICK START-UP

To set up your management connection, the following parameters should be observed:

- Console Interface – make sure your console settings are 115200-N-8-1 (baud rate 115,200 bps).

PHYSICAL CHARACTERISTICS

Ports

48 10 Gbps SFP+ transceiver slots
6 40 Gbps QSFP+ transceiver slots

Network Interface

Ports 1~48: SFP+ 10 Gbps SFP+ transceivers: 10GBASE-CR, 10GBASE-LR

Direct Attach Cables can also be used in ports 1~48.

SFP+ Direct Attach cables from any reputable vendor should work.

QSFP+ 40 Gbps transceivers:
40GBASE-CR4, 40GBASE-SR4

Direct Attach Cables (copper) can also be used in ports 49~54.

QSFP+ transceivers from any reputable vendor can be used for attaching fiber cables on these 40G connections.

RJ-45 Port: RJ-45 connector, auto MDI/X 10BASE-T: RJ-45 (100-ohm, UTP cable; Category 3 or better) 100BASE-TX: RJ-45 (100-ohm, UTP cable; Category 5 or better) 1000BASE-T: RJ-45 (100-ohm, UTP or STP cable; Category 5, 5e or 6)

*Maximum Cable Length - 100 m (328 ft)

List of Transceivers and Cables:

Transceivers/Cables	Vendor	Vendor PN
40G QSFP	Supermicro	AOM-TQSFP-79EQDZ-AVG
10G SFP+	Supermicro	AOM-TSFP-709DMZ-AVG
10G AOC*	Supermicro	CBL-SFP+AOC-5M
40G AOC*	Supermicro	CBL-QSFP+AOC-10M

*AOC:Active Optical Cable

For an up-to-date listing of supported transceivers and cables, see the SSE-X3648S website:

<http://www.supermicro.com/products/accessories/Networking/SSE-X3648S.cfm>

Weight: Net weight: 10.13kg (22.29 lb with 2 PSUs)

LEDs

System: Fan

Ports 1~54: Status (Link/Activity)

RJ-45 Port: Status (Link/Activity)

Size (W x D x H): 433.8 x 550 x 44 mm (17.07 x 21.6 x 1.73 inches)

Temperature: Operating 0°C to 40 °C (32°F to 104°F)

Humidity: Operating: 5% to 95% (non-condensing)

AC Input: 100-127/200-240 V, 50/60 Hz

DC Output: 12 VDC @ 45A (SSE-X3648S)
12 VDC @ 38A (SSE-X3648SR)

Power Supply

100-127/200-240 VAC, 50/60 Hz, 550W@ 12V/50 A per module (SSE-X3648S)

100-127/200-240 VAC, 50/60 Hz, 550W@ 12V/38 A per module (SSE-X3648SR)

Power Consumption: 304.96 Watts

COMPLIANCES

CE Mark: EN 55022 Class A, EN 55024: 2010, EN 61000-3-2 Class A, EN 61000-3-3.

Immunity: EN 55024:2010, IEC 61000-4-2/3/4/5/6/8/11

EMI (Class A) : FCC/VCCI/BSMI

Safety: UL (CSA 22.2 No 60950-1 & UL60950-1)/CB (IEC/EN60950-1)

POWER CORD

Caution:

- Installation and removal of the unit must be carried out by qualified personnel only.
- The unit must be connected to an earthed (grounded) outlet to comply with international safety standards.
- Do not connect the unit to an A.C. outlet (power supply) without an earth (ground) connection.
- The appliance coupler (the connector to the unit and not the wall plug) must have a configuration for mating with an EN 60320/IEC 320 appliance inlet.
- The socket outlet must be near to the unit and easily accessible. You can only remove power from the unit by disconnecting the power cord from the outlet.
- This unit operates under SELV (Safety Extra Low Voltage) conditions according to IEC 60950. The conditions are only maintained if the equipment to which it is connected also operates under SELV conditions.

CAUTIONARY MESSAGES

Caution:

- CLASS 1
LASER DEVICE

Fiber Optic Port Safety. When using a fiber optic port, never look at the transmit laser while it is powered on. Also, never look directly at the fiber TX port and fiber cable ends when they are powered on.
- This product does not contain any serviceable user parts.
- Installation and removal of the unit must be carried out by qualified personnel only.
- When connecting this device to a power outlet, connect the field ground lead on the tri-pole power plug to a valid earth ground line to prevent electrical hazards.
- This switch uses lasers to transmit signals over fiber optic cable. The lasers are compliant with the requirements of a Class 1 Laser Product and are inherently eye safe in normal operation. However, you should never look directly at a transmit port when it is powered on.
- Wear an anti-static wrist strap or take other suitable measures to prevent electrostatic discharge when handling this equipment.
- Do not plug a phone jack connector in the RJ-45 port. This may damage this device.
- Use only twisted-pair cables with RJ-45 connectors that conform to FCC standards.

For more information and safety instruction go to:
<http://www.supermicro.com/products/accessories/Networking/SSE-X3648S.cfm>