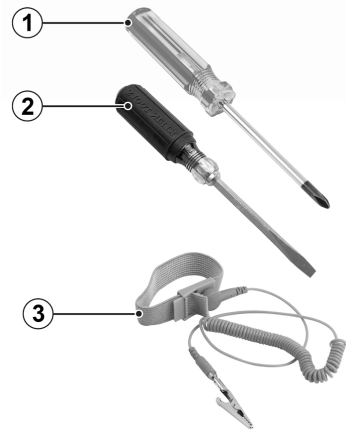# V400 Virtual Port Extender Quick Reference

Follow these steps to get your port extender up and running.

For complete installation instructions see the *ExtremeSwitching and Summit Switches: Hardware Installation Guide* at www.extremenetworks.com/documentation

Tools You'll Need

1 #1 Phillips screwdriver (magnetic screwdriver recommended)
2 Flat-head screwdriver
3 ESD (Electrostatic Discharge) wrist strap

1 Prepare the Site

The installation site must meet the following requirements:

- Appropriate grounded power receptacles located within 1.8 m (6 ft.)
- A readily accessible device for disconnecting power, such as a breaker or master switch
- Network cabling within reach
- At least of 7.6 cm (3.0 in.) on all sides, for proper ventilation
- Temperature between 0°C (32°F) and 45°C (113°F) for PoE models or between 0°C (32°F) and 50°C (122°F) for non-PoE models, with fluctuations of less than 10°C (18°F) per hour

45°C
0°C
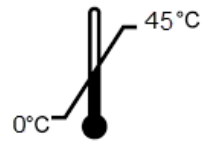
2 Unpack the Box

Remove the packing material. Break the tape seal on the non-conductive bag and remove the port extender.
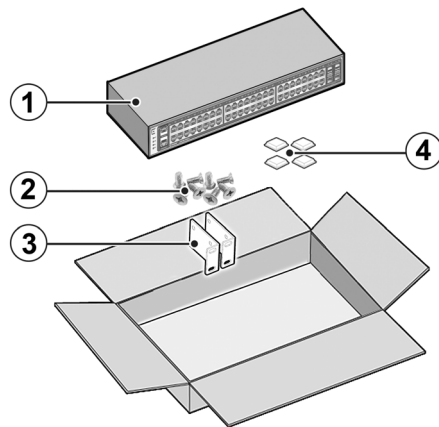
1 V400 Virtual Port Extender
2 Screws for attaching brackets
3 Mounting brackets
4 Rubber feet

If the port extender appears to be damaged, contact Extreme Networks. See "Getting Help" for more information.

Extreme Networks does not include power input cords with this product. To purchase the correct power cord for your country, refer to www.extremenetworks.com/product/powercords/. This page lists details for purchasing a power cord from Extreme Networks or from your local supplier.
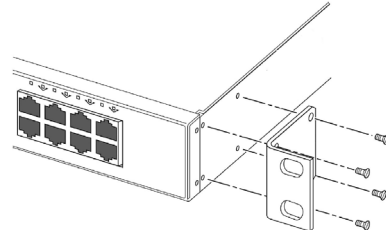
3 Install the Equipment

You can install the V400 Virtual Port Extender in a standard 19-inch equipment rack.
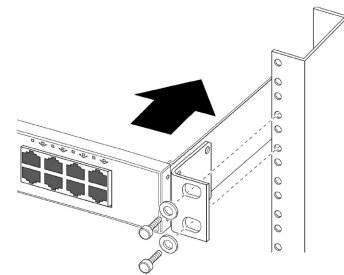
The V400 Virtual Port Extender can be mounted flush with the rack posts or mid-mounted.
To attach the port extender to a rack:

1 Attach the mounting brackets to the sides of the port extender using four screws (included) for each bracket.

2 Align the holes in the brackets with the rack post holes.
3 Secure the port extender to each post with rack-mounting screws.

4 Install Transceivers

(**Optional**) Transceivers can send and receive data over optical fiber rather than through electrical wires. This installation procedure applies to all transceivers.

Note: Transceivers are Class 1 laser devices.

1 Attach the ESD wrist strap to your wrist and connect the metal end to an appropriate ground point on the rack.
2 Remove the transceiver from its packaging.
3 If applicable, remove the protective dust cover from the connector.
4 Hold the transceiver so that the connector will seat properly.
5 Carefully align the transceiver with the port slot.
6 Push the transceiver into the port slot until it clicks into place.

5 Connect Power

The V400 Virtual Port Extender can receive electrical power from a standard AC power outlet. Optionally, PoE models can receive power from an external VX-RPS-1000 redundant power supply (part no. 18202).

Installing the system as described in this guide meets the protective earth grounding requirements of the National Electrical Code (NEC), UL/CSA/IEC/EN 60950-1 standards. However, in some cases, it may be necessary to use an alternative grounding method. In these cases, a 14 AWG wire can be connected between the grounding lug on the chassis and a nearby building ground point.

Connecting to Standard AC Power
1 Connect an AC power cord to the AC power input socket on the port extender and to an AC power outlet.
2 When power is connected, verify that the PWR LED on the port extender turns green. If the PWR LED does not turn green, refer to the *Hardware Installation Guide* for troubleshooting information.

Connecting to a Redundant Power Supply
To attach your port extender (PoE models only) to the VX-RPS-1000 redundant power supply:
1 Install the power supply according to the instructions that are included with it.
2 Connect a power cable (included with the power supply) to the output socket on the power supply and the RPS input connector on the rear of the port extender.
3 Connect the power supply to an AC power source, using the instructions that are included with the power supply.
4 When power is connected, verify that the PWR LED on the port extender turns green.

6 Activate the Port Extender

To activate your port extender:

1 Enable VPEX on a supported switch. Refer to the *ExtremeXOS User Guide* for details.
2 Attach the port extender to a 10 Gb SFP+ port on the switch.

Safety Notices

Electrical Hazard: Only qualified personnel should perform installation procedures.
Risques d'électrocution: Seul un personnel qualifié doit effectuer les procédures d'installation.

Warning: Extreme Networks power supplies do not have switches for turning the unit on and off. Before servicing, disconnect all power cords to remove power from the device. Make sure that these connections are easily accessible.
Avertissement: Extreme Networks alimentations ne sont pas des interrupteurs pour allumer l'appareil et en dehors. Avant l'entretien, débranchez tous les cordons d'alimentation pour couper l'alimentation de l'appareil. Assurez-vous que ces connexions sont facilement accessibles.

Warning: A dedicated Listed circuit breaker rated at 15A is to be used for each power supply connection.
Avertissement: Un disjoncteur cotée dédiée évalué à 15A doit être utilisée pour chaque connexion d'alimentation.

Caution: Before mounting the device, ensure that the rack can support it without compromising stability. Otherwise, personal injury and/or equipment damage may result.

Caution: Follow appropriate ESD procedures when unpacking and handling the device. These include unpacking the device in an ESD-safe environment and wearing appropriate ESD protective gear, such as ESD-safe footwear and ESD wrist straps where appropriate.

Caution: Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.

Warning: LASER RADIATION
Fiber-optic ports use Class 1 lasers.
DO NOT EXPOSE USERS OF TELESCOPIC OPTICS
Do not use optical instruments to view the laser output. The use of optical instruments to view laser output increases eye hazard. Use only UL/CSA, IEC/EN60825-1/-2 recognized pluggable modules.

**Avertissement:** RAYONNEMENT LASER
Ports de fibres optiques utilisent des lasers de classe 1.
NE PAS exposer les utilisateurs de télescopique OPTIQUE.
Ne pas utiliser d'instruments optiques pour voir la sortie du laser. L'utilisation de instruments optiques pour afficher la sortie laser augmente les risques oculaires. Utilisez uniquement UL / CSA, IEC/EN60825-1 /-2 reconnu modules enfichables.
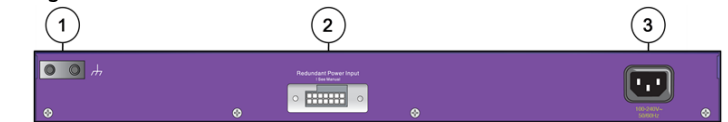
Hardware Components

Figure 1 V400 Virtual Port Extender: Front Panel (48 Port Model Shown)
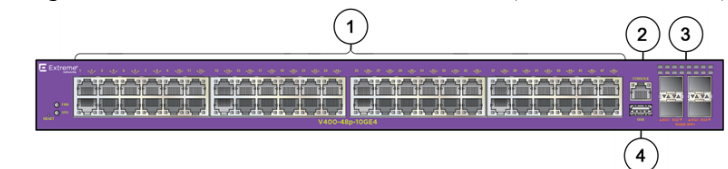
1 10/100/1000BASE-T ports
2 Console/management port
3 10Gb SFP+ ports
4 USB port

Figure 2 V400 Virtual Port Extender: Rear Panel

1 Grounding lug
2 RPS connector (some models)
3 AC power input connector

For component details, see the *Hardware Installation Guide*.

Operating Conditions

Operating Temperature:
0°C (32°F) to 45°C (113°F) for PoE models
0°C (32°F) to 50°C (122°F) for non-PoE models
Storage Temperature:
-40°C to 70°C (-40°F to 158°F)
Operating Relative Humidity:
5% to 95% (non-condensing)
Operating Altitude:
0 to 3,000 meters

Interfaces

Each V400 Virtual Port Extender has a console port and a USB port. The following table lists the specific interfaces for each port extender.

V400-24t-10GE2 (Part no. 18101)	V400 base unit with 24 10/100/1000BASE-T ports, 2 1000/10GBaseX unpoulated SFP+ ports, fixed power supply and fan
V400-24p-10GE2 (Part no. 18102)	V400 base unit with 24 10/100/1000BASE-T PoE+ ports, 2 1000/10GBaseX unpoulated SFP+ ports, fixed power supply and fan
V400-48t-10GE4 (Part no. 18103)	V400 base unit with 48 10/100/1000BASE-T ports, 4 1000/10GBaseX unpoulated SFP+ ports, fixed power supply and fan
V400-48p-10GE4 (Part no. 18104)	V400 base unit with 48 10/100/1000BASE-T PoE+ ports, 4 1000/10GBaseX unpoulated SFP+ ports, fixed power supply and fan

Power Specifications

V400-24t-10GE2 (Part no. 18101)	AC Input: 100-240 VAC, 50/60Hz, 0.6 A max
V400-24p-10GE2 (Part no. 18102)	AC Input: 100-240 VAC, 50/60Hz, 5.4-2.2 A max DC RPS Input: 54 VDC, 18.52 A max • PoE ports load to 382W for AC input only. • PoE ports load to 720W for DC input only. • PoE ports load to 720W for AC+DC input.
V400-48t-10GE4 (Part no. 18103)	AC Input: 100-240VAC, 50/60Hz, 1.0 A max
V400-48p-10GE4 (Part no. 18104)	AC Input: 100-240 VAC, 50/60Hz, 12.0-6.0 A max DC RPS Input: 54 VDC, 18.52 A max • PoE ports load to 740W for AC input only. • PoE ports load to 900W for DC input only. • PoE ports load to 1440W for AC+DC input.

Redundant Power Supply (Optional)

For V400 PoE Models	
VX-RPS-1000 (Part no. 18202)	AC Input: 100-120 VAC, 50-60Hz, 12A max or AC Input: 200-240 VAC, 50-60Hz, 6A max DC Output: +54.0 VDC, 18.52A max

Getting Help

For additional support related to the V400 Virtual Port Extender or to this document, contact Extreme Networks using one of the following methods:

Product Documentation	https://www.extremenetworks.com/documentation/
Global Technical Assistance Center (GTAC)	Phone: 1-800-998-2408 (toll-free in U.S. and Canada) or +1-408-579-2826. For the support phone number in your country, visit: http://www.extremenetworks.com/support/contact/
GTAC Knowledge	Get on-demand and tested resolutions from the GTAC Knowledgebase, or create a help case if you need more guidance. Visit: https://gtacknowledge.extremenetworks.com/
The Hub	A forum for Extreme customers to connect with one another, get questions answered, share ideas and feedback, and get problems solved. The community is monitored by Extreme Networks employees, but is not intended to replace specific guidance from GTAC. Visit: https://community.extremenetworks.com
Support Portal	Manage cases, downloads, service contracts, product licensing, and training and certifications. Visit: http://support.extremenetworks.com/

Regulatory and Compliance Information

Federal Communications Commission (FCC) Notice

This device complies with Part 15 of the FCC rules. Operation is subject to the following two conditions: (1) this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

NOTE: This equipment has been tested and found to comply with the limits for a class A digital device, pursuant to Part 15 of the FCC rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment uses, generates, and can radiate radio frequency energy and if not installed in accordance with the operator's manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause interference in which case the user will be required to correct the interference at his own expense.

WARNING: Changes or modifications made to this device which are not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.

Industry Canada Notice
CAN ICES-3 (A)/NMB-3(A)

This digital apparatus does not exceed the class A limits for radio noise emissions from digital apparatus set out in the Radio Interference Regulations of the Canadian Department of Communications.

Le présent appareil numérique n'émet pas de bruits radioélectriques dépassant les limites applicables aux appareils numériques de la classe A prescrites dans le Règlement sur le brouillage radioélectrique édicté par le ministère des Communications du Canada.

Class A ITE Notice

WARNING: This equipment is compliant with Class A of CISPR 32. In a residential environment this equipment may cause radio interference.

Product Safety

This product complies with the following international safety standards:

- UL 60950-1 2nd edition, A2:2014
- CAN/CSA-C22.2 No.60950-1-07 2nd Ed. 2014-10
- IEC 60950-1:2005 2nd+A1:2009+A2:2013
- EN 60950-1:2006+A11+A1+A12+A2
- 2014/35/EU
- CNS 14336-1

Optical Module Compliance

Extreme Networks pluggable optical modules and direct-attach cables meet the following regulatory requirements:

- UL and/or CSA registered component for North America
- Class 1 Laser Product
- FCC 21 CFR Chapter 1, Sub-chapter J in accordance with FDA & CDRH requirements
- IEC/EN 60825-1:2007, IEC/EN 60825-2:2004+A1+A2 or later, European Standard
- Application of CE Mark in accordance with 2014/30/EU EMC Directive and 2014/35/EU Low Voltage Directive
- 47 CFR Part 15, Class A when installed into Extreme products

Korea EMC Statement

이 기기는 업무용 환경에서 사용할 목적으로 적합성평가를 받은 기기로서 가정용 환경에서 사용하는 경우 전파간섭의 우려가 있습니다.

Australia (RCM)

WARNING: This equipment is compliant with Class A of CISPR 32. In a residential environment this equipment may cause radio interference.

Electromagnetic Compatibility (EMC)

This product complies with the following: FCC 47 CFR Part 15 Subpart B Class A (US), ICES-003 (Canada), EN 55032 (ITE Emissions), EN 55024 (ITE Immunity), EN 61000-3-2 (Harmonics), EN 61000-3-3 (Flicker), 2014/30/EU (EMC Directive), EN 300 386 (Telecom), RCM (Australia), VCCI (Japan), MSIP KCC (Korea), BSMI (Taiwan), ANATEL (Brazil), CCC (China).

VCCI Notice

This is a Class A product based on the standard of the Voluntary Control Council for Interference by Information Technology Equipment (VCCI). If this equipment is used in a domestic environment, radio disturbance may arise. When such trouble occurs, the user may be required to take corrective actions.

この装置は、クラスA機器です。この装置を住宅環境で使用すると電波妨害を引き起こすことがあります。この場合には使用者が適切な対策を講ずるよう要求されることがあります。　　　　　　VCCI－A

BSMI EMC Statement — Taiwan

This is a Class A product. In a domestic environment this product may cause radio interference in which case the user may be required to take adequate measures.

警告使用者:

此為甲類資訊技術設備，於居住環境中使用時，可能會造成射頻擾動，在此種情況下，使用者會被要求採取某些適當的對策。

Taiwan BSMI 報關義務人

申請人: 香港商極進網路有限公司台灣分公司

地址: 臺北市松山區復勢里南京東路 4 段 126 號 5 樓

警告使用者:

此为A级产品，在生活环境中，该产品可能会造成无线电干扰。

在这种情况下，可能需要用户对干扰采取切实可行的措施。

Hazardous Substances- China and Taiwan BSMI RoHS

Guidance concerning the China and Taiwan BSMI RoHS (Restriction of Hazardous Substances) directive for this Extreme Networks® product can be found on the following web page:

www.extremenetworks.com/support/documentation/restriction-hazardous-substances/

The page contains tables detailing the presence of 10 substances defined by the RoHS directive.

Hazardous Substances- EU

This product complies with the requirements of Directive 2011/65/EU of the European Parliament and of the Council of 8 June 2011 on the restriction of the use of certain hazardous substances in electrical and electronic equipment.

European Waste Electrical and Electronic Equipment (WEEE) Notice

In accordance with Directive 2012/19/EU of the European Parliament on waste electrical and electronic equipment (WEEE):

1. The symbol above indicates that separate collection of electrical and electronic equipment is required.
2. When this product has reached the end of its serviceable life, it cannot be disposed of as unsorted municipal waste. It must be collected and treated separately.
3. It has been determined by the European Parliament that there are potential negative effects on the environment and human health as a result of the presence of hazardous substances in electrical and electronic equipment.
4. It is the users' responsibility to utilize the available collection system to ensure WEEE is properly treated.
   For information about the available collection system, please contact Extreme Customer Support at +353 61 705500 (Ireland).

Extreme Networks

ExtremeSwitching V400 Virtual Port Extender

Quick Reference

**V400-24t-10GE2
V400-24p-10GE2
V400-48t-10GE4
V400-48p-10GE4**

Extreme®