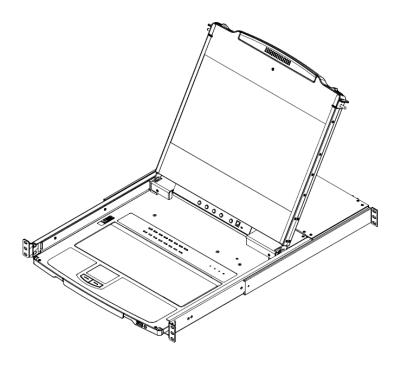
# **Quick Start Guide**

# 8/16-Port NetDirector® DisplayPort Rack-Mount Console KVM Switch

Models: B030-DP08-17D / B030-DP16-17D



#### **WARRANTY REGISTRATION**

Register your product today and be automatically entered to win an ISOBAR® surge protector in our monthly drawing!





tripplite.com/warranty





# **Table of Contents**

1.	Important Safety		3	8.	KVM Operation			18		
	Inst	tructi	ions			8.1	Loca	l Conso	ole	18
	1.1	Gene	eral Safety	3			8.1.1	Local C	onsole Login	18
		Instr	uctions				8.1.2		onsole OSD	18
	1.2	Rack	-Mounting	4				_	Sequence	
			ty Instructions	-			8.1.3		ain Menu	19
2.	FCC		rmation	5				8.1.3.1	OSD Main Menu Headings	19
3.	Use	er Not	tice	5				8.1.3.2	<b>OSD Navigation</b>	19
				6				8.1.3.3	<b>OSD Functions</b>	19
		_	Contents		9.	Wa	rrant	v and l	Product	20
<b>5.</b>	System Requirements		7			gistra				
	<b>5.1</b>	<b>Built</b>	-In LCD Console	7		1108	5.04.0			
	5.2	Optio	onal External Console	7						
	5.3	Com	puters	7						
	5.4	Oper	ating Systems	7						
6.	Fea	tures	3	8						
-			ponents	8						
7		_		11						
4 -	Installation 7.1 Standard Rack Mounting		11							
			•							
			st Rack Mounting	11						
		Grou	•	11						
	7.4	KVM	Switch Installation	12						
	7.5	Open	ing/Closing the	13						
	Console									
		7.5.1	<b>Opening Separately</b>	13						
			Opening Together	15						
			<b>Opening Precautions</b>	15						
		7.5.4	Closing the Console	16						

## 1. Important Safety Instructions

## **1.1 General Safety Instructions**

- Read all of these instructions and save them for future reference.
- Follow all warnings and instructions marked on the device.
- Do not place the device on any unstable surface. If the device falls, serious damage will result.
- · Do not use the device near water.
- Do not place the device near or over, radiators or heat registers.
- The device cabinet is provided with slots and openings to allow for adequate ventilation. To ensure reliable operation and protect against overheating, these openings should never be blocked or covered.
- The device should never be placed on a soft surface such as a bed, sofa of rug. Doing so will block the device's ventilation openings. Moreover, the device should not be placed in a built-in enclosure unless adequate ventilation has been provided.
- Never spill liquid of any type on the device.
- Unplug the device from the wall outlet before cleaning. Use a damp cloth for cleaning. Do not use liquid or aerosol cleaners.
- The device should be operated from the power source indicated on the marking label. If uncertain of the power available, consult your dealer or local power company.
- The device is designed for IT power distribution systems up to 230V phase-to-phase voltage.
- As an added safety feature, the device is equipped with a 3-wire grounding type plug. If unable to insert the plug into the outlet, contact an electrician to replace the obsolete outlet. Do not attempt to plug into a two-prong ungrounded outlet. Always follow local/national wiring codes.
- Do not allow anything to rest on the power cord or cables. Route the power cord and cables to avoid them being stepped on or tripped over.
- If an extension cord is used with this device, ensure the total ampere ratings of all products used on the extension cord
  do not exceed its rated ampere rating. Also ensure all products plugged into the wall outlet does not exceed a total of 15
  amperes.
- Consideration should be given to the connection of equipment and the supply circuit, as well as what effect overloading the supply circuit might have on overcurrent protection and supply wiring.
- To help protect the system from unexpected transient increases and decreases in electrical power, use a Tripp Lite Surge Protector, Line Conditioner, or Uninterruptible Power Supply (UPS).
- Position system cables and power cables carefully so nothing rests on any cables.
- When connecting or disconnecting power to hot pluggable power supplies, observe the following guidelines:
  - o Install the power supply before connecting the power cable to the power supply.
  - o Unplug the power cable before removing the power supply.
  - o If the system has multiple sources of power, disconnect power from the system by unplugging all power cables from the power supplies.
- Never push objects of any kind into or through cabinet slots. They may touch dangerous voltage points or short out parts resulting in a risk of fire or electrical shock.
- Do not attempt to service the device; refer all servicing to qualified service personnel.

## 1. Important Safety Instructions

- If the following conditions occur, unplug the device from the wall outlet and bring it to qualified service personnel for repair:
  - o The power cord or plug has become damaged or frayed.
  - o Liquid has been spilled into the device.
  - o The device has been exposed to rain or water.
  - o The device has been dropped, or the cabinet has been damaged.
  - o The device exhibits a distinct change in performance, indicating a need for service.
  - o The device does not operate normally when the operating instructions are followed.
- Only adjust controls covered in the operating instructions. Improper adjustment of other controls may result in damage that will require extensive work by a qualified technician to repair.
- Use of this equipment in life support applications where failure of this equipment can reasonably be expected to cause the failure of the life support equipment or to significantly affect its safety or effectiveness is not recommended. Do not use this equipment in the presence of a flammable anesthetic mixture with air, oxygen or nitrous oxide.

## 1.2 Rack-Mounting Safety Instructions

- The ambient operating temperature in the rack may be an issue and is dependent upon the rack load and ventilation. When installing in a closed or multi-device rack assembly, ensure the temperature will not exceed the maximum rated ambient temperature.
- Before installing the rack, ensure the stabilizers are secured to the rack, extended to the floor and the full weight of the rack
  rests on the floor. Install front and side stabilizers on a single rack or front stabilizers for joined multiple racks before working
  on the rack.
- Always load the rack from the bottom up with the heaviest item loaded into the rack first.
- When loading the rack, avoid creating a hazardous condition due to uneven loading.
- Ensure the rack is level and stable before extending a device from the rack.
- Use caution when pressing the rail release latches or sliding a device into or out of a rack; slide rails can pinch your fingers.
- After a device is inserted into the rack, carefully extend the rail into a locking position, then slide the device into the rack.
- Do not overload the AC supply branch circuit that provides power to the rack. The total rack load should not exceed 80 percent of the branch circuit rating.
- Ensure that proper airflow is provided to devices in the rack.
- Do not step on or stand on any device when servicing other devices in a rack.
- Do not connect the RJ11 connector marked "Upgrade" to a public telecommunication network.
- Caution! Slide/Rail (LCD KVM) mounted equipment is not to be used as a shelf or work space.

## 2. FCC Information

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 generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense. The user must use shielded cables and connectors with this equipment. Any changes or modifications to this equipment not expressly approved by Tripp Lite could void the user's authority to operate this equipment.

## 3. User Notice

All information, documentation, and specifications contained in this manual are subject to change without prior notification by the manufacturer. The manufacturer makes no representations or warranties, either expressed or implied, with respect to the contents hereof and specifically disclaims any warranties as to merchantability or fitness for any particular purpose. Any of the manufacturer's software described in this manual is sold or licensed "as is." Should the programs prove defective following their purchase, the buyer (and not the manufacturer, its distributor, or its dealer), assumes the entire cost of all necessary servicing, repair and any incidental or consequential damages resulting from any defect in the software.

The manufacturer of this system is not responsible for any radio and/or TV interference caused by unauthorized modifications to this device. It is the responsibility of the user to correct such interference.

The manufacturer is not responsible for any damage incurred in the operation of this system if the correct operational voltage setting was not selected prior to operation. **VERIFY THAT THE VOLTAGE SETTING IS CORRECT BEFORE USE.** 

## 4. Package Contents

- B030-DP08-17D / B030-DP16-17D Console KVM Switch
- (x2) DisplayPort Cables 6 ft.
- (x2) USB 2.0 A/B Cables 6 ft.
- (x1) IEC C13 to NEMA 5-15P Power Cord
- (x1) Grounding Wire
- (x1) Quick Start Guide
- (x1) CD with Owner's Manual

Check to ensure all components are present and in good order. If anything is missing or was damaged in shipping, contact your dealer.

Read this manual thoroughly and follow the installation and operation procedures carefully to prevent damage to the switch or to any other devices on the installation.

## **Optional Accessories**

- N201-Series Cat6 Gigabit Snagless Patch Cables
- P006-Series IEC C13 to NEMA 5-15P Power Cords
- P580-Series DisplayPort Cable with Latches (M/M)

# 5. System Requirements

#### **5.1 Built-In LCD Console**

The integrated LCD monitor's maximum resolution is  $1920 \times 1080 \otimes 60$  Hz. Ensure all resolution settings of the connected computers do not exceed the LCD monitor's maximum resolution.

## **5.2 Optional External Console**

- · DisplayPort monitor
- USB keyboard and mouse.

## **5.3 Computers**

The following equipment must be installed on each computer:

- DisplayPort graphics card.
- USB mouse and keyboard ports.

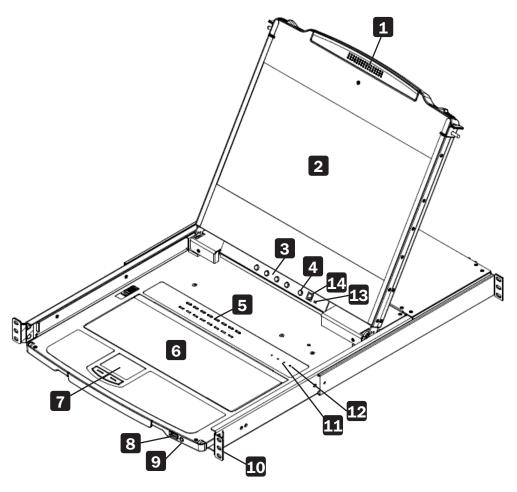
## **5.4 Operating Systems**

os		Version		
Windows		2000 and higher		
Linux	RedHat	9.0 and higher		
	SuSE	10 and higher		
	Debian	3.1 and higher		
	Ubuntu	7.04 and higher		
UNIX	AIX	4.3 and higher		
	FreeBSD	5.5 and higher		
	Sun	Solaris 8 and higher		
Novell	Netware	5.0 and higher		
Mac		OS 9 and higher		

## 6. Features

- DisplayPort Rack-Mount Console KVM Switch in a dual-rail housing with top and bottom clearance for integrated operation in 1U of rack space.
- KVM console combines a 17.3" LCD monitor, keyboard and touchpad.
- Multi-platform support; compatible with Windows®, Mac®, Linux® and Sun.
- A single console controls up to 8 or 16 computers.
- External console ports located on the rear of the device enable management of computers connected to the LCD KVM switch from an external console (USB keyboard, DisplayPort monitor and USB mouse).
- · Console lock enables the console modules to remain securely locked away in position when not in use.
- Graphical OSD and graphical toolbars for convenient, user-friendly operation.
- Broadcast Mode support Keyboard commands can be broadcast to all available computers in the installation.
- HDCP Support on Local Monitor and second Console Port
- Superior video quality 1920 x 1080 @ 60 Hz; DDC, DDC2, DDC2B
- · Auto Scan Mode for monitoring all computers
- · Upgradable firmware
- Mac/Sun keyboard support and emulation
- Multilingual OSD supports English, German, Japanese, Traditional Chinese and Simplified Chinese

## **6.1 Components**



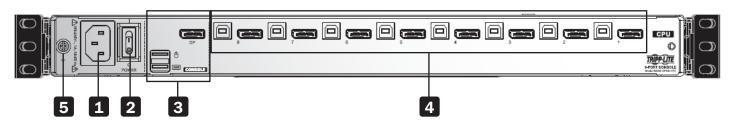
# **6. Features**

No.	Component	Description
1	Handle	Pull to slide the LCD module out; push to slide it in.
2	LCD Module	After sliding the LCD module out, flip up the cover to access the LCD display.
3	LCD Controls	Buttons that control the position and picture settings of the LCD display.
4	LCD On / Off Button	Push this button to turn the LCD monitor on and off. The button illuminates when the LCD monitor is off.
		<b>Note:</b> The light indicates that only the monitor is off, not the attached KVM switch.
5	Port LEDs / Port Switches	An orange ONLINE LED lights to indicate that the computer attached to its corresponding port is up and running. A green Selected LED lights to indicate that the computer attached to the corresponding port is selected for KVM control.
		Press the port pushbuttons to bring the KVM focus to the computer attached to the corresponding port.
6	Keyboard Module	Standard 99-key keyboard.
7	Touchpad	Standard mouse touchpad.
8	USB Port	The USB 1.1 hub port connects a USB peripheral device (flash drive, CD-ROM drive, etc.) to the console or a USB mouse for users who prefer to use an external mouse.
9	Power LED	Lights (green) to indicate that the unit is receiving power.
10	Rack Mounting Tabs	Rack-mounting tabs are located at each corner of the device.
11	Lock LEDs	The Num Lock, Caps Lock, Scroll Lock LEDs are located here.
12	Reset Switch	This switch is located to the right of the Lock LEDs. Press the recessed switch in with a thin object to perform a system reset.
13	Firmware Upgrade Switch	During normal operation and while performing a firmware upgrade, this switch should be in the Normal position. If a firmware upgrade operation does not complete successfully, this switch is used to perform a firmware upgrade recovery.
14	Firmware Upgrade Port	The firmware upgrade cable that transfers the firmware upgrade data from the administrator's computer plugs into this RJ-11 connector.

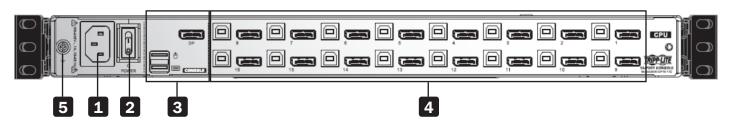
# 6. Features

#### **Rear View**

#### **Model B030-DP08-17D**



#### Model B030-DP16-17D



No.	Component	Description
1	Power Socket	Standard 3-prong AC power socket. The power cord from an AC source plugs in here.
2	Power Switch	Standard rocker switch that powers the device on and off.
3	External Console Section	Supports an independent, external KVM console for flexibility and convenience. The external console's USB keyboard, mouse and DisplayPort monitor plug in here.
4	KVM Port Section	Connects the device's ports to computers/servers using DisplayPort and USB cables.
5	Grounding Terminal	The included grounding wire attaches here.

The B030-DP08-17D / B030-DP16-17D is designed for mounting in a 1U rack system. For convenience, a rack mounting kit is included for quick installation. The various mounting options are explained in the following subsections.

## 7.1 Standard Rack Mounting

The standard rack mounting brackets that come attached to the console KVM switch allow the device to be installed in a standard 1U rack by a single individual.

- 1. Slide out the rear mounting brackets from the console and mount both brackets (separate from the console) to the inside rear of a standard 1U rack system using user-supplied screws.
- 2. Gently slide the console into the two rear-mounted brackets in the rack and secure the console in place with user-supplied screws.

## 7.2 2-Post Rack Mounting

The Console KVM Switch can also be mounted in a 2-post rack installation using the optional 2-Post Rack Mount Kit (Tripp Lite model #: B019-000). The mounting hardware allows the console to be opened with the drawer in any position. Heavy-duty 14-gauge steel provides stability and prevents the console frame from twisting. See the B019-000 instructional manual for detailed mounting instructions.

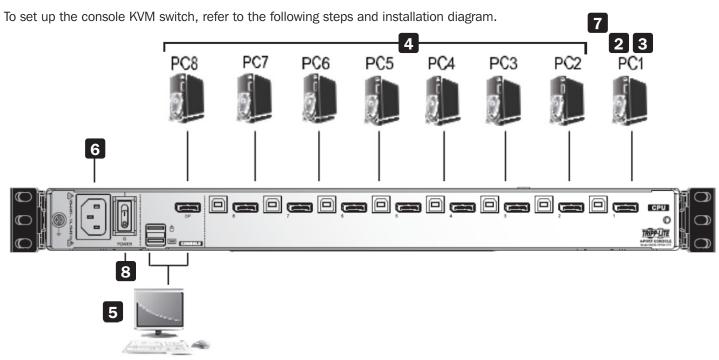
## 7.3 Grounding

To prevent damage to the installation, it is important that all devices are properly grounded. Use the included grounding wire to ground the KVM switch by connecting one end of the wire to the grounding terminal on the device and the other end to a suitably grounded object.

#### **Grounding terminal**



#### 7.4 KVM Switch Installation



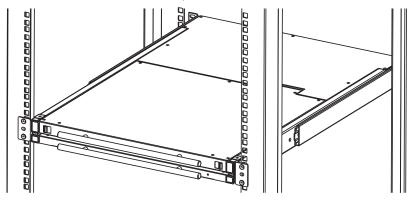
- 1 Power off all computers that will connect to the KVM switch.
- 2 Connect a USB cable from a USB CPU port on the KVM to the USB port on a computer.
- 3 Connect the DisplayPort CPU port on the KVM to the DisplayPort on a computer.
- 4 Repeat steps 2 and 3 for each additional computer you are connecting to the KVM.
- **(Optional)** Add an external console to the KVM by connecting an DisplayPort monitor and USB keyboard and mouse to the console ports on the back of the device.
- 6 Plug the included power cord into a Tripp Lite Surge Protector, Power Distribution Device (PDU), Uninterruptible Power Supply (UPS) or AC wall outlet.
- **7** Power on the connected computers.
- 8 Power on the KVM device.

## 7.5 Opening / Closing the Console

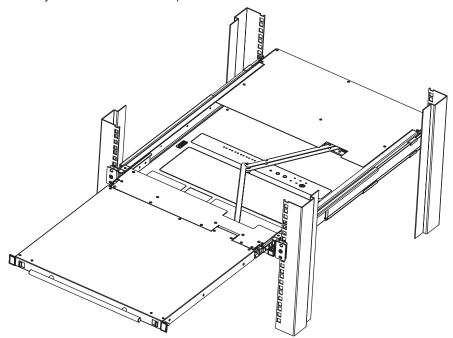
The console consists of two modules: an LCD module located under the top cover and a keyboard / touchpad module below the LCD module. The modules can slide together or independently of one another. This allows the LCD to be available for viewing while the keyboard / touchpad module is not in use.

### 7.5.1 Opening Separately

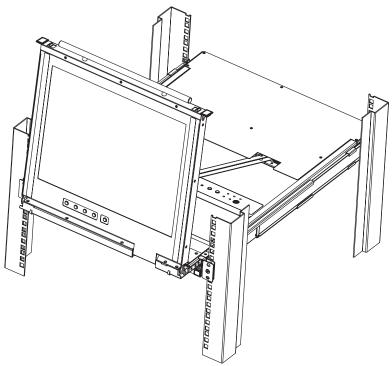
1. Release the console by sliding the front panel toward the center. Then engage the catches and pull the top panel 1-2 inches toward you. Once the console has been released, release the catches.



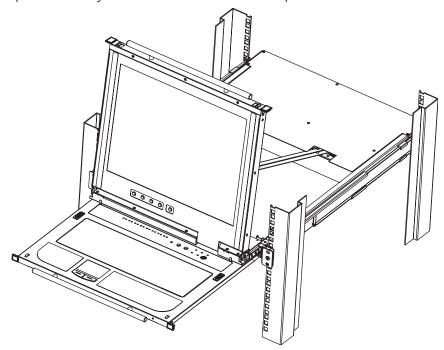
2. Pull the top panel all the way out until it clicks into place.



3. Rotate the top panel all the way back to expose the LCD screen.



4. Reach underneath and pull out the keyboard module until it clicks into place.



#### 7.5.2 Opening Together

Refer to the diagrams in the Opening Separately section as you do the following:

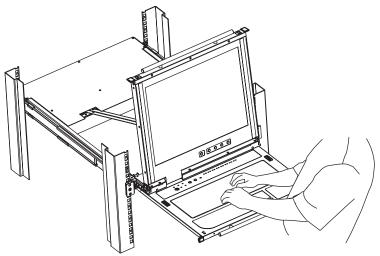
- 1. Engage the release catches and pull the top and bottom panels out until the keyboard module clicks into place. Once the console has been released, release the catches.
- 2. Pull the top panel out until it clicks into place.
- 3. Rotate the top panel all the way back to expose the LCD screen.

## 7.5.3 Opening Precautions

The maximum load bearing capacity of the keyboard module is 65 lb. Failure to heed the instructions below can result in damage to the keyboard module.

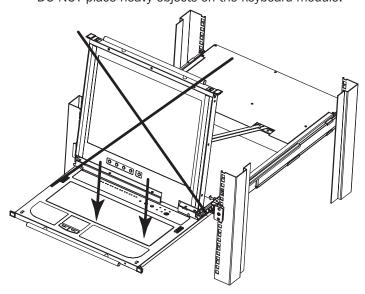
#### **CORRECT**

Rest your hands and arms lightly on the keyboard module as you work.



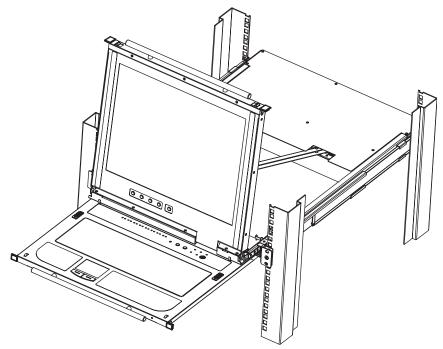
#### **INCORRECT!**

- DO NOT apply body weight on the keyboard module.
- DO NOT place heavy objects on the keyboard module.

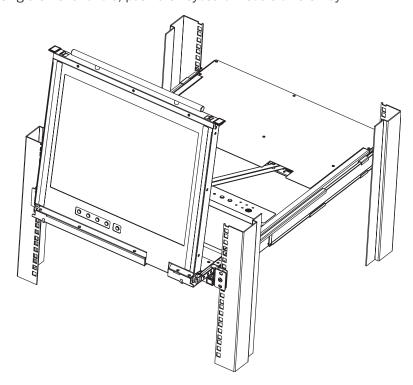


## 7.5.4 Closing the Console

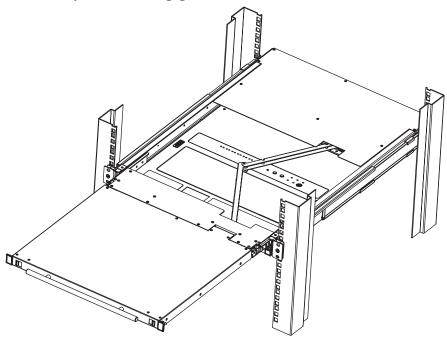
1. Engage the release catches located on either side of the keyboard to release the keyboard module, then slide in the module slightly.



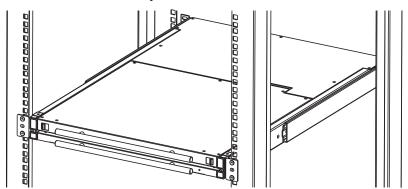
2. Release the catches. Using the front handle, push the keyboard module all the way in.



3. Rotate the LCD module all the way down, then engage the rear catches to release the LCD module.



4. Using the front handle, push the module all the way in.



## 8. KVM Operation

#### **8.1 Local Console**

### **8.1.1 Local Console Login**



When accessing the console KVM switch for the first time, a prompt will appear asking for a username and password. The default username is administrator, and the default password is password. For security purposes, changing the username and password on this account is strongly recommended. Once the KVM has been set up and user accounts have been created, the login prompt will appear only when a user logs out of the KVM. After logging in for the first time using the default username and password, the OSD Main Screen will appear in Administrator mode, with access to all settings and functions.

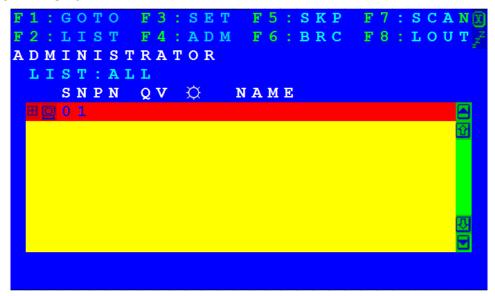
## **8.1.2 Local Console OSD Hotkey Sequence**

Once logged into the KVM switch and a connected computer, use the local console OSD Hotkey sequence to re-open the OSD Main Menu. The default hotkey sequence is [Scroll Lock, Scroll Lock], but other options include [Ctrl, Ctrl].

**Note:** When using the [Scroll Lock, Scroll Lock] OSD Hotkey sequence, hold down the [Fn] key, as the [Scroll Lock] key is part of the [Num Lock] key.

## 8. KVM Operation

#### 8.1.3 OSD Main Menu



#### 8.1.3.1 OSD Main Menu Headings

PN	This column lists the port ID numbers for all the KVM ports on the installation. The simplest method to access a particular computer is move the highlight bar to it, then press Enter.
QV	If a port has been selected for quick-view scanning, an arrowhead displays in this column.
≎	The computers that are powered on and are online have a sun symbol in this column
NAME	If a port has been given a name, its name appears in this column.

#### 8.1.3.2 OSD Navigation

- To dismiss the menu, and deactivate OSD, click the X at the upper right corner of the OSD window or press [Esc].
- To log out, click F8 at the top of the main screen, or press [F8].
- To move up or down through the list one line at a time, click the up and down triangle symbols (▲▼) or use the up and down arrow keys. If there are more list entries than what can appear on the main screen, the screen will scroll.
- To move up or down through the list one screen at a time, click the up and down arrow symbols (♠♦), or use the [Pg Up] and [Pg Dn] keys. If there are more list entries than what can appear on the main screen, the screen will scroll.
- To activate a port, double-click it, or move the highlight bar to it and press [Enter].
- After executing any action, you automatically go back to the menu one level above.

#### 8.1.3.3 OSD Functions

OSD functions are used to configure and control the OSD. For example, you can rapidly switch to any port, scan selected ports, limit the list you wish to view, designate a port as a quick-view port, create or edit a port name, or make OSD setting adjustments.

#### To access an OSD function:

- 1. Click a function key field at the top of the main screen or press a function key on the keyboard.
- 2. In the submenus that appear, either double-click on your selection or move the highlight bar to its location, then press [Enter].
- 3. Press [Esc] to return to the previous menu level.

## 9. Warranty and Product Registration

#### 1-YEAR LIMITED WARRANTY

TRIPP LITE warrants its products to be free from defects in materials and workmanship for a period of one (1) year from the date of initial purchase. TRIPP LITE's obligation under this warranty is limited to repairing or replacing (at its sole option) any such defective products. To obtain service under this warranty, you must obtain a Returned Material Authorization (RMA) number from TRIPP LITE or an authorized TRIPP LITE service center. Products must be returned to TRIPP LITE or an authorized TRIPP LITE service center with transportation charges prepaid and must be accompanied by a brief description of the problem encountered and proof of date and place of purchase. This warranty does not apply to equipment, which has been damaged by accident, negligence or misapplication or has been altered or modified in any way.

EXCEPT AS PROVIDED HEREIN, TRIPP LITE MAKES NO WARRANTIES, EXPRESS OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

Some states do not permit limitation or exclusion of implied warranties; therefore, the aforesaid limitation(s) or exclusion(s) may not apply to the purchaser.

EXCEPT AS PROVIDED ABOVE, IN NO EVENT WILL TRIPP LITE BE LIABLE FOR DIRECT, INDIRECT, SPECIAL, INCIDENTAL OR CONSEQUENTIAL DAMAGES ARISING OUT OF THE USE OF THIS PRODUCT, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE. Specifically, TRIPP LITE is not liable for any costs, such as lost profits or revenue, loss of equipment, loss of use of equipment, loss of software, loss of data, costs of substitutes, claims by third parties, or otherwise.

#### **Product Registration**

Visit tripplite.com/warranty today to register your new Tripp Lite product. You'll be automatically entered into a drawing for a chance to win a FREE Tripp Lite product!\*

\* No purchase necessary. Void where prohibited. Some restrictions apply. See website for details.

#### **FCC Notice, Class A**

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 generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the instruction manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is likely to cause harmful interference in which case the user will be required to correct the interference at his own expense. The user must use shielded cables and connectors with this equipment. Any changes or modifications to this equipment not expressly approved by Tripp Lite could void the user's authority to operate this equipment.

#### WEEE Compliance Information for Tripp Lite Customers and Recyclers (European Union)



' Under the Waste Electrical and Electronic Equipment (WEEE) Directive and implementing regulations, when customers buy new electrical and electronic equipment from Tripp Lite they are entitled to:

- · Send old equipment for recycling on a one-on-one, like-for-like basis (this varies depending on the country)
- · Send the new equipment back for recycling when this ultimately becomes waste.

Use of this equipment in life support applications where failure of this equipment can reasonably be expected to cause the failure of life support equipment or to significantly affect its safety or effectiveness is not recommended.

Tripp Lite has a policy of continuous improvement. Specifications are subject to change without notice. Photos and illustrations may differ slightly from actual products.



