



## **Quick Start Guide**

### **OSD2524P**

**Layer Managed 26-port Ethernet Switch  
With 4 x Combo & 2 x Gb SFP Ports  
With IEEE802.3bt PoE**



## INDEX 1

<b>1</b>	<b>TECHNICAL SUMMARY .....</b>	<b>4</b>
1.1	BRIEF DESCRIPTION .....	4
1.1.1	OVERVIEW .....	4
1.1.2	FEATURES AND BENEFITS .....	4
1.2	TYPICAL SYSTEM DESIGN .....	5
1.3	TECHNICAL SPECIFICATIONS .....	5
1.4	PORT ALLOCATION .....	8
<b>2</b>	<b>INSTALLATION AND OPERATION .....</b>	<b>9</b>
2.1	INTRODUCTION .....	9
2.2	INSTALLATION .....	9
2.2.1	WARNING AND PRECAUTIONS .....	9
2.2.2	DRAWINGS AND DIMENSIONS .....	10
2.2.3	LOCATION .....	11
2.2.4	POWER SUPPLY CONNECTIONS .....	11
2.2.5	USB CONNECTOR .....	12
2.2.6	LED INDICATORS .....	13
2.2.7	FITTING SFP CONNECTORS .....	15
2.3	OPERATION .....	16
2.3.1	CONNECTIONS .....	16
2.4	COMMAND LINE INTERFACE .....	17
2.4.1	CLI COMMANDS (TOP LEVEL) .....	18
2.4.2	RESET CONFIGURATION TO FACTORY DEFAULT .....	19
2.4.3	SET HOSTNAME AND ADMIN USER PASSWORD .....	19
2.4.4	SET VLAN 1 IP ADDRESS .....	20
2.4.5	SAVE CONFIGURATION TO FLASH .....	20
<b>3</b>	<b>WEB GUI .....</b>	<b>21</b>
3.1.1	DEFAULT SETTING .....	21
3.1.2	LOG INTO THE SWITCH .....	21
3.1.3	IP CONFIGURATION .....	22
3.1.4	USERS AUTHENTICATION .....	23
3.1.5	SAVE CONFIGURATION TO START-UP .....	24
3.1.6	CONFIGURE POE .....	24
<b>4</b>	<b>MAINTENANCE .....</b>	<b>25</b>
4.1	INTRODUCTION .....	25
4.2	EXTERNAL INSPECTION .....	25
4.3	ROUTINE MAINTENANCE .....	25
<b>5</b>	<b>WARRANTY .....</b>	<b>26</b>
5.1	WARRANTY PERIOD .....	26
5.2	REPAIRS .....	26
5.2.1	WARRANTY REPAIRS .....	26
5.2.2	OUT-OF-WARRANTY REPAIRS .....	26
5.2.3	SITE REPAIRS .....	26
5.2.4	EXCLUSIONS .....	26
	FIGURE 1: TYPICAL SYSTEM DESIGN .....	5
	FIGURE 2: FRONT/REAR PANEL .....	8
	FIGURE 3: MOUNTING DIMENSIONS .....	10
	FIGURE 4: POWER SUPPLY CONNECTIONS .....	11
	FIGURE 5: USB TYPE B CLI PORT .....	12
	FIGURE 6: CLI INSTALLATION .....	12
	FIGURE 7: PORT/LED .....	13
	FIGURE 8: FITTING/REMOVING SFP CONNECTORS .....	15
	TABLE 1: TECHNICAL SPECIFICATIONS .....	6
	TABLE 2: POWER CONNECTION .....	11
	TABLE 3: LED FUNCTION .....	14

# 1 TECHNICAL SUMMARY

## 1.1 BRIEF DESCRIPTION

### 1.1.1 OVERVIEW

The OSD2524P is a Layer 2 managed 26-port industrial ethernet switch offering Power over Ethernet meeting the latest IEEE802.3bt PoE specification with continued support for devices requiring IEEE802.3af/at. Eight RJ45 are each capable of supplying up to 90W of power to support the latest PoE devices with a total power budget of 720W. All 24 RJ45 ports can support up to 30W per port concurrently. For increased flexibility there are four RJ45/SFP combo ports along with two Gigabit SFP uplink ports which can be used as standard ports or as an ITU-TG 8032 redundant ring. With support for VLAN, IGMP snooping, industry standard RSTP or MSTP and IEEE802.1x port security, it is suitable for use in critical networks. A rugged, fan-less 1RU high, IP30 19" rack mounting enclosure and an operating temperature range from -20 to +70°C make it suitable for use in a wide range of harsh industrial environments.

### 1.1.2 FEATURES AND BENEFITS

#### ▲ Security

With increasing demand for security on distribution and edge switches, the OSD2524P supports 802.1x Port based and MAC based access authentication. Private connections are guaranteed with SSH, Radius and TACACS+ options whilst the latest SNMPv3 protocol is supported.

#### ▲ Redundancy

To guarantee performance in critical applications, the OSD2524P comes with a dual redundant DC power input. In case of a break in the fiber network the OSD2524P supports ITU-TG 8032 Ethernet Ring Protection Switching to ensure the system reliability. Loop protection is prevented by MSTP/RSTP/STP protocols.

#### ▲ Management

The OSD2524P supports industry standard SNMP v1, v2c and V3 for use with third party NMS. Standard MIB's and OSD private MIBs provide a wide range of parameters that can be monitored or configured remotely. Each OSD2524P has a built in Web browser GUI where detailed information about the individual unit can be accessed and configuration, settings and logs can be viewed and changed. SNMP traps can be set to alert the user in case of some faults such as a problem with the network or a connected device failure.

#### ▲ IEEE802.3bt Compliant

With an overall PoE power budget of 720W the OSD2524P can be deployed in a wide range of communication networks. 8 ports are IEEE802.3bt compliant with each providing up to 90W per port to support the latest IP PTZ cameras, Wireless Access Points, Thin Clients, PoE lighting and other powered devices.

## 1.2 TYPICAL SYSTEM DESIGN

Figure 1 below indicates a possible set-up for an OSD2524P system.

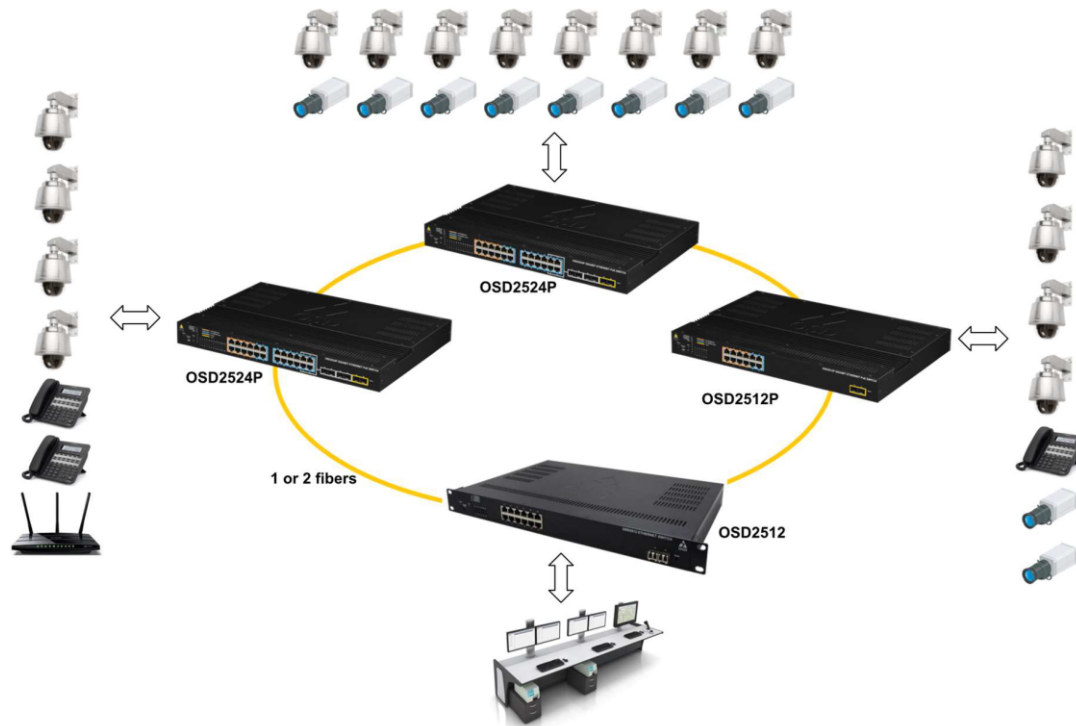


FIGURE 1: TYPICAL SYSTEM DESIGN

## 1.3 TECHNICAL SPECIFICATIONS

TABLE 1: TECHNICAL SPECIFICATIONS

Hardware	
Ethernet	24 x 10/100/1000Base-T RJ45, IEEE802.3i/802.3u/802.3ab
Data Rate	10, 100, 1000Mbps with energy detect, auto negotiate, auto MDIX
Jumbo Frame Support	9.6KB
SFP	4 x SFP Combo ports, 2 x Gigabit SFP trunk ports
Optical Data Interface	IEEE802.3z 1000Base-Lx/Sx
PoE (user configurable via GUI)	IEEE802.3af/at, IEEE802.3bt (Ports1-8), Legacy PoE (DC capacitance)
CPU Memory	128Mb
Switching Speed	27Gbps switching backplane
Enclosure Protection Class	IP30
Installation	Desktop or 19" rack mount
Mode Selection Switch (push)	Link/Speed, Link/Duplex, Link/Status, PoE status
Reset Button (recessed push)	Reset unit
Power Requirements	48 to 57VDC @ 40VA maximum (no PoE in use) to 800VA maximum (PoE of 720W) ≥52VDC recommended for PD meeting IEEE802.3at & IEEE802.3bt ≥55VDC recommended for total PoE power requirement >600W
Output PoE Vdrop per port	PoE voltage drop per port <0.5V @ 30W, <1V @ 60W
Power Connector	8 way 5.08mm terminal block for dual redundant DC powering
Indicators	24 x Mode selectable LEDs (amber/green) for RJ45 ports 6 x Speed/Activity/Link LEDs on each SFP 1 x Status 2 x Power (rear panel)
Environmental	-20 to +70°C
Relative Humidity	0 to 95% non-condensing
Dimensions	440W x 295D x 44H mm (desktop mount)
Weight	5400g
Management	
Interfaces	Command Line Interface (CLI mini USB) Web browser based Graphical User Interface (GUI) SNMP v1, v2c, v3
Port Status	Speed, duplex mode, link status, auto negotiation status
PoE Status	GUI controlled for each individual port
Managements	Configuration download or upload. Dot3-OAM-MIB RFC 1213 MIB LLDP-MED power MIB Bridge MIB MSTP MIB LLDP MIB Private MIB Framework Contact OSD for full list of MIBs

## Layer 2 / Layer 3

Port Configuration	Port enable/disable, Auto negotiation, Flow control enable/disable
Port Status	Speed, duplex mode, link status, auto negotiation status
VLAN	802.1Q VLAN. Private VLAN, Voice VLAN Protocol based VLAN GVRP, MVRP, MRP
QoS	Traffic Classes, Port policers, Port egress shaper, QoS Control List, DiffServ, Scheduler priority, Storm Control
Multicast Protocol	RFC 2236 IGMP snooping v2, v3 MLD snooping v1, v2
IPv4/IPv6	IPv4 and IPv6 dual stack for data & management DHCPv6 relay, DHCPv6 client. NTP
Security	ACLs, DHCP snooping, BPDU Guard RADIUS, TACACS+, SSL, SSH, HTTPS, SSLv3, Port Mirroring, sflow, Dynamic ARP Inspection, IP source guard, UDLD/equivalent, RMON IEEE802.1x Port Access Authentication, MAC based authentication
Ethernet Redundancy	IEEE802.1D Spanning Tree Protocol IEEE802.1w Rapid Spanning Tree Protocol IEEE802.1s Multiple Spanning Tree Protocol ITU-TG.8032 Ethernet Ring Protection
Link Aggregation	Static and LACP link aggregation
Universal plug and Play	UPnP
L3 Routing	IPv4/IPv6 static routing

## PoE Options

Ports 1-8	Disable, Standard mode (802.3bt, 802.3af/at), Legacy support
Ports 9-24	Disable, Standard mode (802.3af/at), Legacy support

## Environmental

Operating Temperature	-20 to +70°C
Relative Humidity	5 to 95% non-condensing

## Warranty

Warranty Period	5 years
MTBF (Ground Benign Environment, 30°C)	160,000 hours (360W power consumption @ 30°C)

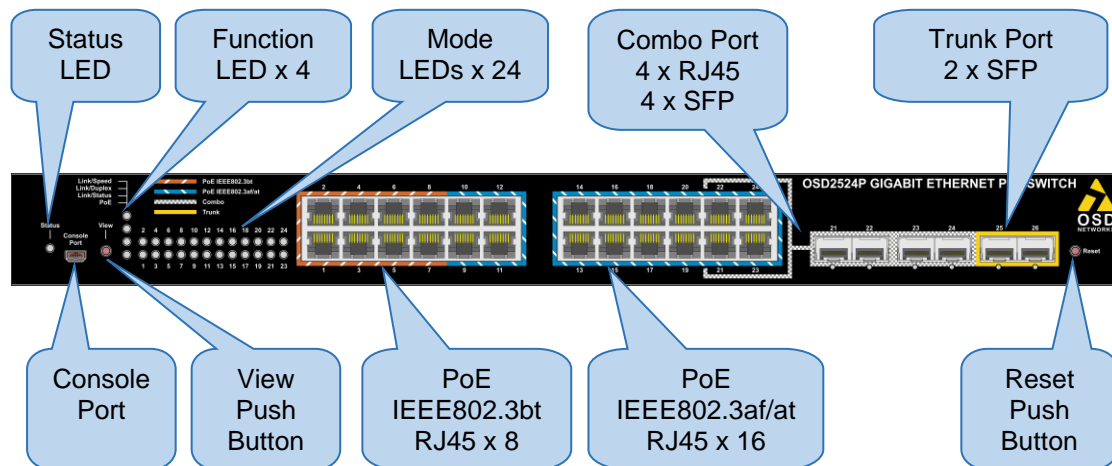
## 1.4 PORT ALLOCATION

**Front Panel:** There are 24 fixed copper ports: 8 x IEEE802.3bt, 16 x IEEE802.3af/at, 4 x RJ45/SFP combo ports and two Gigabit SFP uplink trunk ports. There is also a CLI Console port (mini USB)

**Rear Panel:** 8-Way 5.08mm terminal block for dual redundant DC powering.

Each section will be described further throughout this manual.

### Front Panel



### Rear Panel



FIGURE 2: FRONT/REAR PANEL



## 2 INSTALLATION AND OPERATION

### 2.1 INTRODUCTION

This section outlines the methods required to install and operate the OSD2524P successfully. It should be studied carefully if damage to the equipment or poor results are to be avoided.

This equipment has been fully tested prior to dispatch and is ready for immediate operation. However, it is advisable to check for external transportation damage before operation. If damage is evident, return the unit with the packaging to your supplier immediately.

### 2.2 INSTALLATION

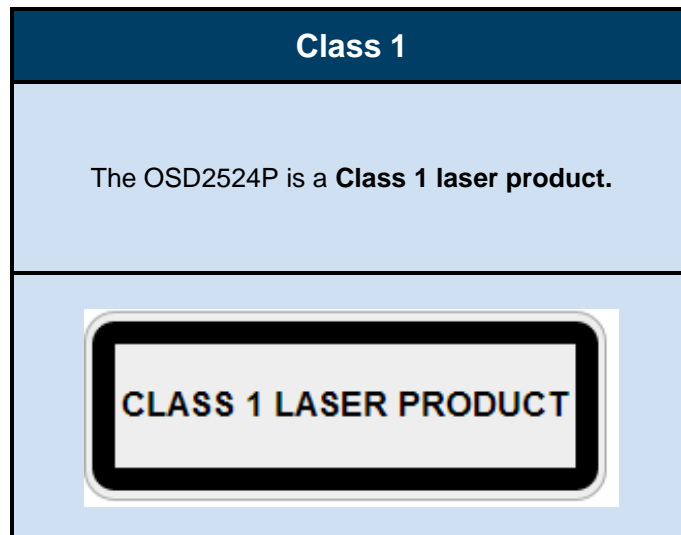
#### 2.2.1 WARNING AND PRECAUTIONS

##### ▲ ELECTROMAGNETIC COMPATIBILITY

**WARNING:** 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.

##### ▲ OPTICAL OUTPUT OPERATION

**WARNING: Laser Safety:** Class 1 Laser Product per IEC/EN 60825-1:2014 standard.



#### PRECAUTIONS

- ▲ All service personnel should be provided training as to the hazards of direct viewing of laser radiation and of the precautionary measures during servicing of equipment
- ▲ Areas where laser products are installed should be restricted in access to trained service personnel only and appropriate warning signs posted in the work area.
- ▲ All laser apertures should be covered by protective covers when not connected to optical fibers. Never leave outputs uncovered.
- ▲ Laser equipment should be positioned above or below eye level where possible. Apertures should be positioned away from personnel.
- ▲ Protective eyewear should be worn in the vicinity of laser equipment.

## 2.2.2 DRAWINGS AND DIMENSIONS

The OSD2524P is designed to be desk mounted or 19" rack mountable. The unit dimensions (excluding connectors, SFPs, etc) is shown in Figure 3 below.

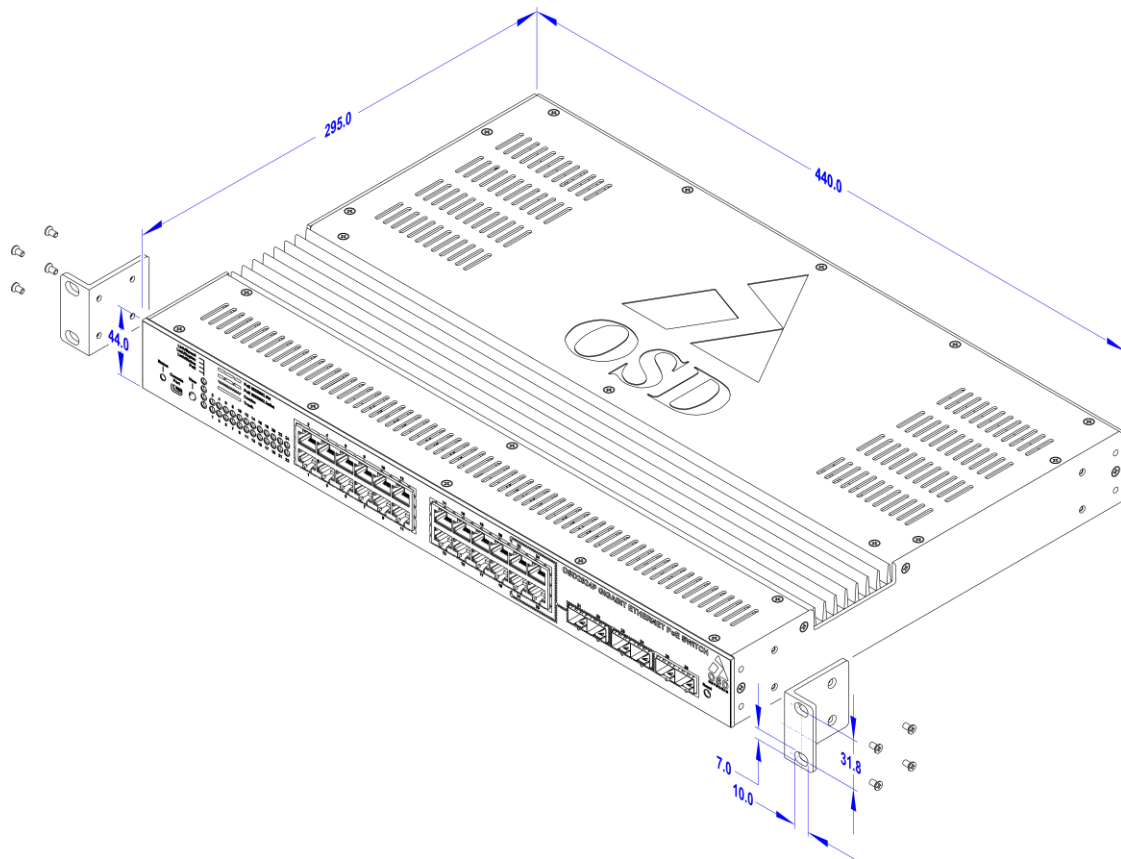


FIGURE 3: MOUNTING DIMENSIONS

### 2.2.3 LOCATION

As with any electrical device, the OSD2524P should be placed where the switch will not be subjected to extreme temperatures, humidity, or electromagnetic interference. Specifically, the site selected should meet the following requirements:

- The ambient temperature should be between -20°C to 70°C.
- The relative humidity should be less than 95 percent, non-condensing.
- Surrounding electrical devices should not exceed the electromagnetic field (RFC) standards.
- Make sure that the switch receives adequate ventilation. Do not block the ventilation holes on any side of the switch.

Note: Without proper cooling and control (lowering) of ambient temperature, the components within the OSD2524P can be subject to increased heat shortening the longevity and reliability. It is thus good engineering practice to ensure the unit is installed in a well ventilated area.

### 2.2.4 POWER SUPPLY CONNECTIONS

The OSD2524P requires external power to the Redundant DC Terminal Block Power Connector located at the rear of the unit. Always ensure that the power is off before any installation.


#### Redundant DC Terminal Block Power Inputs

There are two pairs of power inputs for use with redundant power sources. Only one power input is required to be connected to run the switch.

Step 1: Connect the DC power to the appropriate power source, connect the plug-able terminal block on the OSD2524P switch and then turn power on.

Step 2: Disconnect the power if you want to shut down the switch.

TABLE 2: POWER CONNECTION

External Power Pin	Specification
Power 1 +	48V <sub>DC</sub> to 57V <sub>DC</sub> *
Power 1 0V	Ground – 0V
Power 2 +	48V <sub>DC</sub> to 57V <sub>DC</sub> *
Power 2 0V	Ground – 0V
	Earth Ground Connection

\*48 to 57VDC @ 40VA maximum (no PoE in use) to 800VA maximum (PoE of 720W)  
 ≥52VDC recommended for PD meeting IEEE802.3at & IEEE802.3bt  
 ≥55VDC recommended for total PoE power requirement >600W

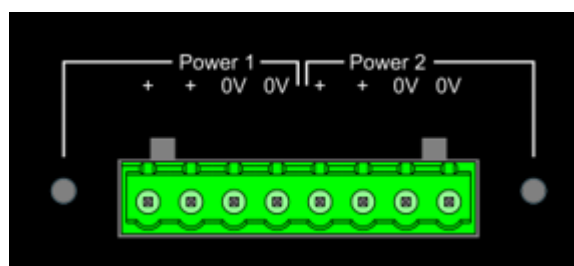


FIGURE 4: POWER SUPPLY CONNECTIONS

## 2.2.5 USB CONNECTOR

The OSD2524P has a mini USB connector located on the front of the unit that is used for Command Line Interface (CLI) from the PC to the OSD2524P via the PC's USB connector. See section 2.4 for further CLI information.



Mini USB - CLI Port



FIGURE 5: USB TYPE B CLI PORT

To operate and control the OSD2524P using the CLI, a proprietary driver will be required to be installed onto the PC being used. The driver can be found and downloaded via the following site: [www.silabs.com](http://www.silabs.com) and searching for the CP210x driver. Download the relevant driver for your operating system, install and follow the installation instructions from your PC.


### Download for Windows 10 Universal (v10.1.7)

Platform	Software	Release Notes
 Windows 10 Universal	<a href="#">Download VCP (2.1 MB)</a>	<a href="#">Download VCP Revision History</a>

### Download for Windows 7/8/8.1 (v6.7.6)

Platform	Software	Release Notes
 Windows 7/8/8.1	<a href="#">Download VCP (5.3 MB) (Default)</a>	<a href="#">Download VCP Revision History</a>
 Windows 7/8/8.1	<a href="#">Download VCP with Serial Enumeration (5.3 MB)</a> <a href="#">Learn More »</a>	<a href="#">Download VCP Revision History</a>

### Download for Windows XP/Server 2003/Vista/7/8/8.1 (v6.7)

Platform	Software	Release Notes
 Windows XP/Server 2003/Vista/7/8/8.1	<a href="#">Download VCP (3.66 MB)</a>	<a href="#">Download VCP Revision History</a>

### Download for Windows 2K (v6.3a)

Platform	Software	Release Notes
 Windows 2K	<a href="#">Download VCP (4.79 MB)</a>	<a href="#">Download Win2K VCP Revision History</a>

### Download for WinCE

Platform	Software	Release Notes
 WinCE 6.0 (2.1)	<a href="#">Download VCP (276 KB)</a>	<a href="#">Download WinCE 6.0 Revision History</a>
 WinCE 5.0 (2.1)	<a href="#">Download VCP (271 KB)</a>	<a href="#">Download WinCE 5.0 Revision History</a>

### Download for Macintosh OSX (v5.1.0)

Platform	Software	Release Notes
 Mac OSX	<a href="#">Download VCP (852 KB)</a>	<a href="#">Download Mac VCP Revision History</a>

### Download for Linux

Platform	Software	Release Notes
 Linux 3.x.x and 4.x.x	<a href="#">Download VCP (110.0 KB)</a>	<a href="#">Download Linux 3.x.x and 4.x.x VCP Revision History</a>
 Linux 2.6.x	<a href="#">Download VCP (110.2 KB)</a>	<a href="#">Download Linux 2.6.x VCP Revision History</a>

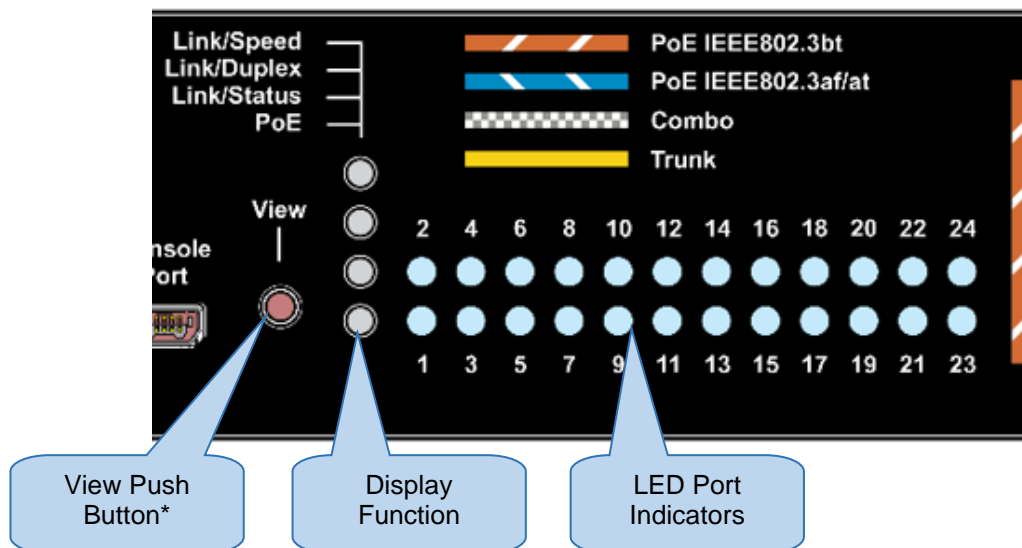
\*Note: The Linux 3.x.x and 4.x.x version of the driver is maintained in the current Linux 3.x.x and 4.x.x tree at [www.kernel.org](http://www.kernel.org).

### Download for Android

Platform	Application Note
 Android 4.2	<a href="#">AN809: Integrating the CP210x Virtual COM Port Driver into the Android Platform</a>

FIGURE 6: CLI INSTALLATION

## 2.2.6 LED INDICATORS



\*The View Push Button when pressed will cycle through Link/Speed, Link/Duplex, Link/Status, PoE. This will indicate the Port LED (1-24) function.

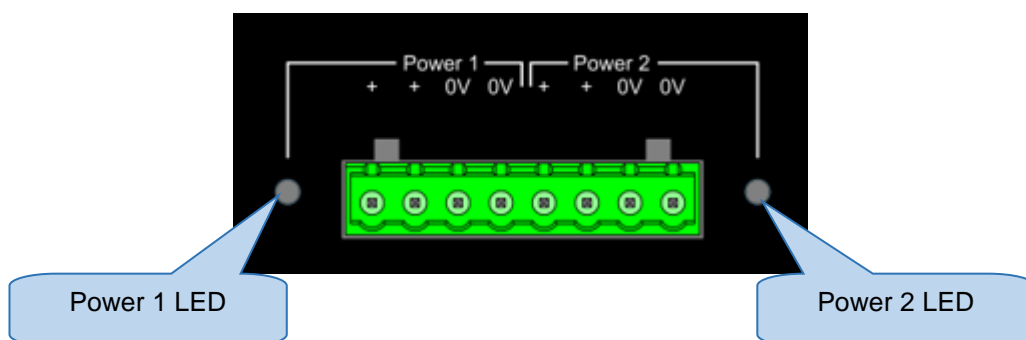
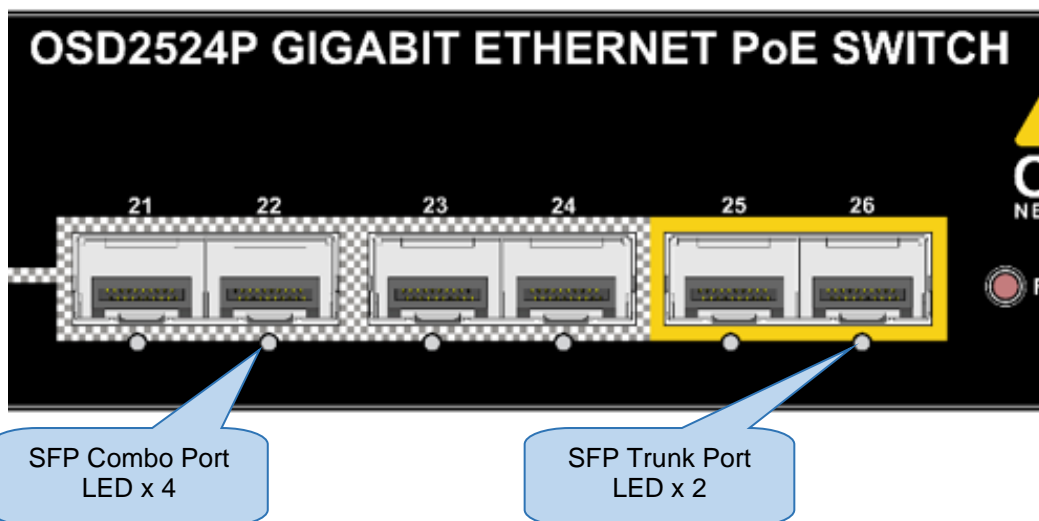


FIGURE 7: PORT/LED

TABLE 3: LED FUNCTION

LED	Function	
Board Status	Green	Normal Operation
	Red (Blink)	Internal Warning
Display Function	The View Push Button when pressed will cycle through Link/Speed, Link/Duplex, Link/Status, PoE. This will indicate the Port LED (1-24) function	
Port Indicators (x 24) – Link/Speed Mode	Green	1Gbps
	Amber	10/100Mbps
	Off	No Connection
	Blinking	Traffic
Port Indicators (x 24) – Link/Duplex Mode	Green	Full Duplex
	Amber	Half Duplex
	Off	No Connection
	Blinking	Traffic
Port Indicators (x 24) – Link/Status Mode	Green	Connection Established
	Off	No Connection
Port Indicators (x 24) – PoE Mode	Green	Dual Signature PD
	Amber	Single Signature PD
	Off	No PoE Detected
Trunk Port	Green	1Gbps
	Amber	100Mbps
	Off	No Connection
Power 1 / Power 2	Green	Power Connected
	Off	No Power connected

Note: Ports 21-24 are Combo ports, Either the fixed RJ45 port or the SFP ports are operational at one time.

### 2.2.7 FITTING SFP CONNECTORS

Care should be taken when inserting/removing the SFP connectors from SFP port 9 and 10 as SFP modules are Electrostatic (ES) sensitive and Electrostatic Discharge (ESD) precautions should be taken when installing. Ensure that the SFP is fully engaged and latched into position.

**Inserting SFP** – Ensure that the SFP lever is in the locked position and insert into appropriate SFP port. Gently push the SFP until it locks into place. Remove plastic/rubber dust cap and fit fiber cable or RJ45 plug.

**Removing SFP** – Remove fiber connector or RJ45 plug. Pull the SFP lever down to unlock SFP from housing. Using the lever, gently pull the SFP out.

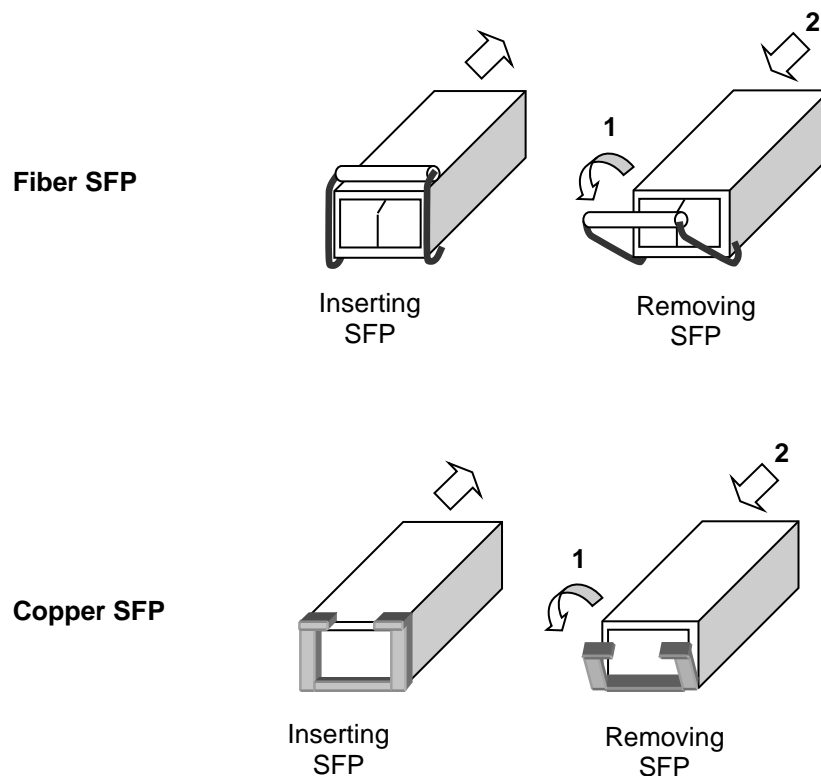


FIGURE 8: FITTING/REMOVING SFP CONNECTORS

## **2.3 OPERATION**

When using the OSD2524P for the first time, check that the unit is in good condition with no visible damage.

Upon power up check that the indicators illuminate accordingly on power up (see Table 3).

### **2.3.1 CONNECTIONS**

For RJ45 connection use Category 5 (CAT5) or higher. Length should be no more than 100 meters.

For singlemode fiber connections, fiber used must be 9/125µm singlemode fiber.

For multimode fiber connections, fiber used must be 50/125µm or 62/125µm multimode fiber.

Plug in the appropriate connectors for system configuration;

- RJ45 cable to fixed copper ports and copper SFP modules
- LC or SC fiber cable to fiber SFP modules.



## 2.4 COMMAND LINE INTERFACE

The Command Line Interface (CLI) is a useful tool for checking link status and debugging link connections. To enable the use of CLI the OSD2524P must be connected to a PC with a serial port and an appropriate cable as specified in section 2.2.5. Using a terminal emulation program such as Hyperterminal, a number of command lines specific to the OSD2524P can be implemented to check link/node status, ring/bus topology and enable/disable float backup.

Note: Screen shots may vary due to terminal emulation programs and minor software updates. The screen shots are for illustrative purpose only.

1. Connect the Console Port on OSD2524P (Mini USB) to PC with USB cable.
2. Using HyperTerminal, SecureCRT, etc to set up the following parameters.
  - Baud Rate: 115200
  - Data Bits: 8
  - Parity: None
  - Stop Bits: 1
  - Flow Control: None
3. Check the link by pressing <ENTER>. The line should jump to the next line.
4. Using the Username and password to login the switch

```
Username: admin
Password:
#
```

5. If there is no user input for a period of time, the user will be locked out and will require to re-enter by pressing ENTER.

```
Username: admin
Password:
#
Press ENTER to get started
```

6. The admin username is operating at the highest privilege level (level 15) and has full control over the OSD2524SFP and its configuration. On this level, the admin can reset the OSD2524SFP configuration to factory default.

### 2.4.1 CLI COMMANDS (TOP LEVEL)

By entering “?” a list of CLI commands available with a brief description will be displayed

```
# ?
clear          Reset functions
configure      Enter configuration mode
copy           Copy from source to destination
delete         Delete one file in flash: file system
dir            Directory of all files in flash: file system
disable        Turn off privileged commands
do             To run exec commands in the configuration mode
dot1x          IEEE Standard for port-based Network Access Control
enable         Turn on privileged commands
erps           Ethernet Ring Protection Switching
exit           Exit from EXEC mode
firmware       Firmware upgrade/swap
help           Description of the interactive help system
ip             IPv4 commands
ipv6           IPv6 configuration commands
link-oam       Link OAM configuration
logout         Exit from EXEC mode
more           Display file
no             Negate a command or set its defaults
ping           Send ICMP echo messages
platform       Platform configuration
ptp            Misc non persistent 1588 settings
reload         Reload system.
send           Send a message to other tty lines
show           Show running system information
terminal       Set terminal line parameters
verify        VeriPHY keyword
```

Some terminal emulators like SecureCRT support the “Tab” key. At the # prompt pressing the “Tab” key will also produce a list of available commands within the command level. Partially typing a command and hitting “Tab” key will autocomplete the command.

```
#
clear      configure  copy      delete    dir        disable   do
dot1x      enable     erps      exit      firmware  help      ip
ipv6       link-oam  logout    more      no         ping      platform
ptp        reload    send      show      terminal   verify
#
```

Help may be requested at any point in a command by entering a question mark “?”. If there are no command arguments available, the help list will be empty and the user must backup (backspace) until entering a “?” shows the available options. There are two types of help provided;

1. Full help is available when the user is ready to enter a command argument (eg. “show”) and describes each possible argument.
2. Partial help is provided when an abbreviated argument is entered and user wants to know what arguments match the input (eg “show pr?”)

Note that there are sub-commands for every 1<sup>st</sup> level commands eg. # **clear** ? will display all sub command arguments associated with the **clear** command. The CLI will then display # clear and wait for the sub command.

```
# clear ?
access          Access management
access-list     Access list
dot1x           IEEE Standard for port-based Network Access Control
eps            Ethernet Protection Switching.
erps           Ethernet Ring Protection Switching
evc            Ethernet Virtual Connections
ip             Interface Internet Protocol configuration commands
ipv6           IPv6 configuration commands
lACP           Clear LACP statistics
link-oam        Clear Link OAM statistics
lldp           Clears LLDP statistics.
logging         System logging message
mac            MAC Address Table
mep            Maintenance Entity Point
mvr            Multicast VLAN Registration configuration
network-clock   Clear active WTR timer.
ptp
sflow          Statistics flow.
spanning-tree   STP Bridge
statistics      Clear statistics for one or more given interfaces
# clear
```

### 2.4.2 RESET CONFIGURATION TO FACTORY DEFAULT

To reset the configuration to factory defaults;

#### # reload defaults

When the prompt returns, the unit has reverted to factory defaults

### 2.4.3 SET HOSTNAME AND ADMIN USER PASSWORD

The CLI has several different modes. When entering the CLI through the admin entry, the mode is in exec mode. This allows the user to modify configuration files, reload defaults, system information etc. When the unit is in configuration mode, the user can change detailed configurations.

To set the OSD2524P host name, the unit needs to be first set to configuration mode then enter the hostname command, then a chosen hostname. After this is entered, the unit requires an 'exit' from configuration mode.

```
# configure terminal
(config)# hostname OSD2512-Sec1
OSD2512-Sec1(config)# exit
OSD2512-Sec1#
```

The host name has now changed to "OSD2524P-Sec1" and can be seen on the prompt.

A new password for the 'admin' user is recommended to be set.

```
OSD2512-Sec1#
OSD2512-Sec1#
OSD2512-Sec1# configure terminal
OSD2512-Sec1(config)# username admin privilege 15 password unencrypted OSD
OSD2512-Sec1(config)# exit
OSD2512-Sec1#
```

In the example above the password was changed to "OSD". Other users can be added using the above method.

#### 2.4.4 SET VLAN 1 IP ADDRESS

To display current IP address and subnet mask details;

**# show ip interface brief**

To configure a new IP address the unit needs to be first set to configuration mode then enter the interface VLAN number, then a chosen IP address. An 'exit' from configuration mode is also required when changes are made. Note that the chosen input arguments (IP address/Subnet mask) are not in bold shown in the example below.

**Switch# configure terminal**

**Switch(config)# interface vlan 1**

**Switch(config-if-vlan)# ip address** 192.168.0.99 255.255.0.0

**Switch(config-if-vlan)# end**

Note: IP addresses can only be assigned to VLAN interfaces.

After configuration the IP address is completed, the newly allocated IP address can be checked again by typing in;

**# show ip interface brief**

If the DHCP negotiation failed, the fallback IP is assigned (192.168.0.99)

#### 2.4.5 SAVE CONFIGURATION TO FLASH

It is necessary to save any changes to FLASH storage in the 'startup-config' otherwise the changes will not take effect when the unit is powered off. To save the changes the configuration needs to be copied to the startup configuration.

**# copy running-config startup-config**

### 3 WEB GUI

The OSD2524P provides a web-based browser interface for configuring and monitoring the unit. This interface allows you to access the switch using any preferred web browser.

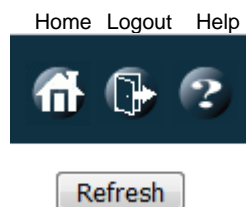
This section describes how to configure the switch using its web-based browser interface.

The Quick Start Guide section will only show a few main or important features to get the user started and running the OSD2524P successfully. On the top right hand of the GUI screen there are three icons available to quickly navigate or obtain help for each GUI menu item. The Quick Start Guide also assumes user knowledge for complex switch settings.

*Notes:*

*Some screen captures will not display the full port channel count for the product. Port Number screen captures are indicative only!*

*Screen captures/Pictures are indicative only. There may be minor changes due to software updates.*



**HOME:** Clicking the Home button will exit any GUI current screen and display the panel status.

**LOGOUT:** Clicking the Logout button will logout the current user.

**HELP:** Clicking the Help button will open a help window for the current open menu window and display all functions and input arguments for that page.

#### 3.1.1 DEFAULT SETTING

- IP Address: 192.168.0.99
- Subnet Mask: 255.255.255.0
- Gateway: 192.168.0.1
- User Name: admin
- Password: (None)

#### 3.1.2 LOG INTO THE SWITCH

- Connect a switch port to a PC, Change the PC's network IP address to connect to the switch (i.e.: 192.168.0.2).
- In a web browser, enter the URL 192.168.0.99.
- Enter the username and password.

### 3.1.3 IP CONFIGURATION

In the treemap on the left, expand the **Configuration** → **System** → **IP**.

**▼ Configuration**

- ▼ System
  - Information
  - IP**
  - NTP
  - Time
  - Log

**IP Configuration**

Mode	Host ▼	
DNS Server 0	No DNS server ▼	
DNS Server 1	No DNS server ▼	
DNS Server 2	No DNS server ▼	
DNS Server 3	No DNS server ▼	
DNS Proxy	<input type="checkbox"/>	

**IP Interfaces**

Delete	VLAN	DHCPv4			IPv4		DHCPv6			IPv6	
		Enable	Fallback	Current Lease	Address	Mask Length	Enable	Rapid Commit	Current Lease	Address	Mask Length
<input type="checkbox"/>	1	<input type="checkbox"/>	0		192.168.0.99	24	<input type="checkbox"/>	<input type="checkbox"/>			

[Add Interface](#)

**IP Routes**

Delete	Network	Mask Length	Gateway	Next Hop	VLAN
<a href="#">Add Route</a>					

[Save](#) [Reset](#)

Enter the **IPv4 address** and **Mask Length** in the table.

Choose the management VLAN ID to access that IP in **VLAN** table if VLAN function is required.

If the multiple IP addresses are required, click **Add Interface** to add more IP interface.

Click **Save** to save the configuration.

Use new IP address to access the switch.

**PS: All configuration changes must be saved otherwise all the changes will be lost after rebooting! See section 3.1.5.**

### 3.1.4 USERS AUTHENTICATION

In the tree map on the left, expand the **Configuration** → **Security** → **Switch** → **Users**



#### Users Configuration

User Name	Privilege Level
<u>admin</u>	15

Add New User

Click **admin** to change the current admin account setting.

#### Edit User

User Settings	
User Name	admin
Password	
Password (again)	
Privilege Level	15 ▼

Save Reset Cancel

If multiple users are required, click **Add New User**

#### Add User

User Settings	
User Name	
Password	
Password (again)	
Privilege Level	0 ▼

Save Reset Cancel

**PS: All configuration changes must be saved otherwise all the changes will be lost after rebooting!**

### 3.1.5 SAVE CONFIGURATION TO START-UP

In the treemap below, expand the **Maintenance** and expand **Configuration**, then select Save startup-config



#### Save Running Configuration to startup-config

Please note: The generation of the configuration file may be time consuming, depending on the amount of non-default configuration.

[Save Configuration](#)

Click **Save Configuration** to save the configuration on start-up.

### 3.1.6 CONFIGURE POE

#### Power over Ethernet Configuration

##### System Configuration

Power Supply	720 W
Capacitor Detection	Disabled

Sets the Max PoE output Power for the whole unit.

##### Port Configuration

Port	Mode	Priority
*	<>	<>
1	standard	low
2	standard	low
3	standard	low

Power Supply: When the PoE power used is more than the set Max. output power, the PoE of the last port will be turned off if all the ports are set to have the same priority.

Port Configuration: Standard. PoE Enabled.

Disable: No PoE output.

Port Configuration\Priority: Changes the priority according to the setting.

#### Factory Default

Configuration\PoE Set as PoE Max. PoE output Power. Capacitor Detection: Enable.

PoE\Standard.

Ports set as Auto for all Ports.



## **4 MAINTENANCE**

### **4.1 INTRODUCTION**

The following section outlines the fault-finding procedure for the OSD2524P modems. Please take note of the following:

- ▲ Personnel without appropriate training should not attempt any maintenance except that outlined below.
- ▲ If further maintenance is attempted you are warned that every care should be taken to ensure that internal measurements made while the equipment is operational are taken carefully as some components within the unit are expensive and may be damaged by failure of any portion of their support circuitry.
- ▲ Some components within the unit are Electrostatic (ES) sensitive and Electrostatic Discharge (ESD) precautions should be taken when performing maintenance upon the unit.

### **4.2 EXTERNAL INSPECTION**

Visually check for the following:

- ▲ Check that the correct power source is connected to the power socket.
- ▲ Check that the Ethernet cables are connected to the modem correctly and that the distant OSD2524P modem has been connected correctly to any external equipment.
- ▲ Inspect the optical connectors (for fiber SFP option) for any contamination and clean using isopropyl alcohol and a lint free tissue if any contamination is detected.

### **4.3 ROUTINE MAINTENANCE**

- ▲ There is no routine maintenance required with the OSD2524P.

## **5 WARRANTY**

Thank you for purchasing equipment designed, manufactured and serviced by Optical Systems Design (OSD). OSD warrants that at the time of shipment, its products are free from defects in material and workmanship and conforms to specifications. Our Warranty conditions are outlined below:

### **5.1 WARRANTY PERIOD**

For warranty period, please contact your local OSD distributor.

### **5.2 REPAIRS**

Optical Systems Design reserves the right to repair or replace faulty modules/units. Please obtain a "Return Material Authorisation" (RMA) form and number before returning goods. Goods must be returned in adequate packing material to Optical Systems Design, Warriewood or its nominated authorised representative, for all repairs.

#### **5.2.1 WARRANTY REPAIRS**

Return shipments to OSD shall be at customer's expense and freight back to the customer will be at OSD expense.

#### **5.2.2 OUT-OF-WARRANTY REPAIRS**

OSD reserves the right to repair or replace any faulty goods. Freight costs and insurance for both journeys are met by the user. All equipment repaired by OSD will have a 3-Month Warranty from the date of dispatch.

#### **5.2.3 SITE REPAIRS**

By agreement site repairs may be undertaken for which out of pocket, hotel and travel expenses will be charged.

#### **5.2.4 EXCLUSIONS**

This warranty does not apply to defects caused by unauthorized modifications, misuse, abuse or transport damage to the equipment. All modifications to OSD's standard product will need written authorization and will be charged at normal repair rates. All modifications are to be carried out by OSD Technicians. Warranty is void if unauthorized removal and/or tampering with serial number and/or repair labels is evident.





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