



**BDCOM**

**BDCOM S2500PB Series  
Full Gigabit POE Switches**

## BDCOM S2500PB Series

### Product Overview

BDCOM S2500PB Series is a new-generation intelligent POE access switch designed for carrier's IP MAN and enterprise networks. Based on the new-generation high-performance hardware and BDROS platform, it supports functions such as ACL, QinQ and QoS. Its simple management mode and flexible installation can meet the requirement of any complicated scenarios.

BDCOM S2500PB Series POE switches has three models: S2510PB, S2518PB and S2528PB.



S2510PB



S2518PB



S2528PB

- S2510PB: 8 10/100/1000Base-T ports, 2 1000Base-X ports;
- S2518PB: 16 10/100/1000Base-T ports, 2 1000Base-X ports;
- S2528PB: 24 10/100/1000Base-T ports, 4 1000Base-X ports.

### Product Characteristics

#### ➤ Telecom-Level Ethernet Access Switches

- S2500PB Series supports the telecom-level Ethernet-ring protection protocol with a protection shift time of less than 50ms, STP/RSTP, backup of active and standby uplinks, and LACP link aggregation to cater to the requirements of high reliability of carriers;
- S2500PB Series has powerful ACL functions to access and control L2-L7 data based on physical port, providing carriers flexible and various policy control methods;
- S2500PB Series supports In-Service Software Upgrade (ISSU) to ensure the unremitting data forwarding during system upgrade;

- S2500PB Series supports various L2 multicast functions such as IGMP-snooping, user fast-leave mechanism and trans-vlan multicast copy to fully meet the operation requirements of carrier's IPTV;
- **Complete POE Power Supply**
- S2500PB Series supports IEEE 802.3AF/AT standard, built-in large power supply, free of external power supply but with 24-port AF full load power supply;
- S2500PB Series supports hot restart and POE non-stop power supply;
- S2500PB Series supports the configuration of electric port priority when the power is inadequate.
- S2500PB Series supports up to 2KV thunder-proof of the POE port and power supply
- **Varied QoS Policies**
- S2500PB Series supports priority retagging and complicated flow classification based on VLAN, MAC, source address, destination address, IP or priority, better streamlining carrier's services;
- S2500PB Series provides flexible bandwidth control policies, supporting port-/flow-based flow limit, ensuring the line speed forwarding of each port;
- S2500PB Series supports multiple queue schedule algorithms such as SP, WRR and "SP plus WRR";
- **Complete Security Mechanisms**
- Equipment-level security: The advanced hardware infrastructure design realizes the level-based packet schedule and packet protection, prevents DoS-/TCP-related SYN Flood, UDP Flood, Broadcast Storm or large traffic attacks, and supports level-based command line protection, endowing different levels of users with different management permissions;
- Perfect security authentication mechanisms: IEEE 802.1x, Radius and BDTacacs+;
- S2500PB Series supports storm/multicast/unicast limit, ensuring the normal running of equipment in harsh network conditions;

- S2500PB Series supports perfect ring detection mechanism, ensuring the long-term stable running of network;
- S2500PB Series supports port isolation within the same VLAN, DHCP-Snooping, and IP + MAC + Port binding;

### ➤ Easy Management and Maintenance

- S2500PB Series supports many management modes such as the console port, Telnet, SSH;
- S2500PB Series supports the WEB management mode, which is easy and efficient for installing and debugging the device;
- S2500PB Series supports TFTP-patterned file upload/download management;
- S2500PB Series supports ISSU (In-Service Software Upgrade);
- S2500PB Series supports SNMP and BDCOM NMS smart network management platform. The combination realizes automatic equipment discovery, network topology management, equipment configuration management, performance data statistics and analysis and trouble management.

## Product Specifications

Item	S2510PB	S2518PB	S2528PB
Backplane	18Gbps	64Gbps	64Gbps
Forwarding rate	15Mpps	27Mpps	42Mpps
Dimensions(W × D × H)(mm)	280×179×45	440×232×45	440×232×45
Power consumption	<30W	<45W	<45W
POE power	150W	330W	400W
POE/POE+	Support	Support	Support
Power supply	AC: 100V-240V, 50Hz ± 10%		

	DC: -36V~-72V (POE model without DC power supply)
Environment	Operating temperature/humidity: 0°C-50°C, 10%-90% non-condensing Storage temperature/humidity: -20°C-70°C, 5%-95% non-condensing
MAC exchange	Static configuration and dynamic MAC learning MAC browsing and removal Configurable aging time of the MAC address Limited number of learnable MAC addresses MAC filtration
VLAN	4K VLAN GVRP QinQ Private VLAN
STP	802.1D (STP), 802.1W (RSTP) and 802.1S (MSTP) BPDU protection, root protection, and loopback protection
Multicast	IGMP v1/v2/v3 IGMP Snooping IGMP Fast Leave Multicast group strategy and quantity limitation Multicast flow copying over VLANs
IPv4	Static route, RIP v1/v2, OSPF, BGP
QoS	Flow classification based on L2~4 protocols CAR flow limit 802.1P/DSCP priority re-labeling SP, WRR, and "SP+WRR" Congestion avoidance mechanisms like Tail-Drop and WRED Flow monitoring and flow shaping
Security	L2/L3/L4 ACL flow identification and filtration DDoS attack prevention, TCP's SYN Flood attack prevention, UDP

	<p>Flood attack prevention, etc</p> <p>Broadcast/multicast/unknown unicast storm-control</p> <p>Port isolation</p> <p>Port security, and “IP+MAC+port” binding (S2108POE does not support.)</p> <p>DHCP Snooping and DHCP option 82 (S2108POE does not support the function.)</p> <p>IEEE 802.1x authentication</p> <p>Radius, BDTacacs+ authentication</p> <p>Level-based command line protection</p>
Reliability	<p>Static/LACP link aggregation</p> <p>EAPS and ERPS</p> <p>ISSU uninterrupted system upgrade</p>
Management	<p>Console, Telnet, SSH2.0,</p> <p>Web</p> <p>SNMP v1/v2/v3</p> <p>TFTP</p> <p>RMON</p>

## Ordering Information

Item	Description
<b>S2510PB Series POE Switches</b>	
S2510PB	Ethernet POE switch with 8 gigabit Base-T ports and 2 gigabit optical ports (1 console port, 8 gigabit POE ports, 2 gigabit optical ports, the standard AC220V power supply, 150W POE power, the cooling fan, 1U, desktop installation)

S2518PB	Ethernet POE switch with 16 gigabit Base-T ports and 4 gigabit optical ports (1 console port, 16 gigabit POE ports, 2 gigabit SFP ports, the standard AC220V power supply, 330W POE power, the cooling fan, 1U, standard 19-inch rack-mounted installation)
S2528PB	Ethernet POE switch with 24 gigabit Base-T ports and 4 gigabit optical ports (1 console port, 24 gigabit POE ports, 4 gigabit SFP ports, the standard AC220V power supply, 400W POE power, the cooling fan, 1U, standard 19-inch rack-mounted installation)

### Optical Modules

#### 100M Optical Modules

FSFP-SX-1310	100M SFP multi-mode (2Km, 1310nm, LC, DDM)
FSFP-LX-15	100M SFP single-mode (15Km, 1310nm, LC, DDM)
FSFP-LX-40	100M SFP single-mode (40Km, 1310nm, LC, DDM)
FSFP-ZX-80	100M SFP single-mode (80Km, 1550nm, LC, DDM)
FSFP-LX-SM1310-20-BIDI	100M SFP single-mode, single core bidirectional (20Km, TX1310/RX1550, LC, DDM)
FSFP-LX-SM1550-20-BIDI	100M SFP single-mode, single core bidirectional (20Km, TX1550/RX1310, LC, DDM)
FSFP-LX-SM1310-40-BIDI	100M SFP single-mode, single core bidirectional (40Km, TX1310/RX1550, LC, DDM)
FSFP-LX-SM1550-40-BIDI	100M SFP single-mode, single core bidirectional (40Km, TX1550/RX1310, LC, DDM)
FSFP-LX-SM1310-80-BIDI	100M SFP single-mode, single core bidirectional (80Km, TX1310/RX1550, LC, DDM)
FSFP-LX-SM1550-80-BIDI	100M SFP single-mode, single core bidirectional (80Km, TX1550/RX1310, LC, DDM)

### GE Optical Modules

GSFP-TX-B	GE SFP-to- RJ45 module
GSFP-SX-D	GE SFP multi-mode (500m, 850nm, LC, DDM)
GSFP-LX-10-D	GE SFP single-mode (10Km, 1310nm, LC, DDM)
GSFP-LX-20-D	GE SFP single-mode (20Km, 1310nm, LC, DDM)
GSFP-LX-40-D	GE SFP single-mode (40Km, 1310nm, LC, DDM)
GSFP-ZX-80-D	GE SFP single-mode (80Km, 1550nm, LC, DDM)
GSFP-ZX-120-D	GE SFP single-mode (120Km, 1550nm, LC, DDM)
GSFP-LX-SM1310-10-BIDI	GE SFP single-mode, single core bidirectional (10Km, TX1310/RX1550, LC, DDM)
GSFP-LX-SM1550-10-BIDI	GE SFP single-mode, single core bidirectional (10Km, TX1550/RX1310, LC, DDM)
GSFP-LX-SM1310-20-BIDI	GE SFP single-mode, single core bidirectional (20Km, TX1310/RX1550, LC, DDM)
GSFP-LX-SM1550-20-BIDI	GE SFP single-mode, single core bidirectional (20Km, TX1550/RX1310, LC, DDM)
GSFP-LX-SM1310-40-BIDI	GE SFP single-mode, single core bidirectional (40Km, TX1310/RX1550, LC, DDM)
GSFP-LX-SM1550-40-BIDI-1310	GE SFP single-mode, single core bidirectional (40Km, TX1550/RX1310, LC, DDM)
GSFP-LX-SM1490-80-BIDI	GE SFP single-mode, single core bidirectional (80Km, TX1490/RX1550, LC, DDM)
GSFP-LX-SM1550-80-BIDI	GE SFP single-mode, single core bidirectional (80Km, TX1550/RX1490, LC, DDM)
GSFP-LX-SM1490-120	GE SFP single-mode, single core bidirectional (120Km, TX1490/RX1550, LC, DDM)
GSFP-LX-SM1550-120	GE SFP single-mode, single core bidirectional (120Km, TX1550/RX1490, LC, DDM)



### **For More Information**

For more information about [BDCOM S2500PB Series](#), please contact your local BDCOM account representative.

### **Shanghai Baud Data Communication Co., LTD.**

No.123, Juli Road,  
Pudong Zhangjiang High-Tech Park,  
Shanghai 201203, P.R.China  
[www.bdcom.cn](http://www.bdcom.cn)  
Tel: +86-21-50800666



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