

## BDCOM S2448

### —— Hi-performance Gigabit Ethernet Switch

As the newest S2000 Series switch proudly presented by Shanghai Baud Data Communication Co., Ltd. (BDCOM), BDCOM S2448 is the next-generation hi-performance L2 Ethernet switch with 48 Fast Ethernet ports. It has advanced architecture, 32 Gbps switch fabric, and 13.1 Mpps forwarding rate. Its hardware wire-speed switching capability provides a powerful, multi-layer solution not only for enterprises, but also for Internet Service Providers (ISP's) and telecom carriers. BDCOM S2448 has a sub model, BDCOM S2448-DC.



S2448

#### *Application*

- Multi-layer, hi-performance switching platform for enterprises, ISP's and telecom carriers.

#### *Features*

##### **Performance**

- 36Gbps switch fabric, wire-speed forwarding rate: 13.1 Mpps
- High port density. 48 Fast Ethernet ports, 4 Gigabit ports
- 80-km transfer by Gigabit optical fiber, direct connection to WAN

##### **Security and reliability**

- IEEE 802.1x and HTTP user authentication
- Powerful ACL supports L2-L7 data filtering
- Intelligent forwarding, complete defense against viruses like 'Code Red' or 'Blaster'
- RPS power hot standby
- Hardware MPLS solution offers hi-speed, powerful VPN
- QinQ support. Double VLAN security

##### **Easy maintenance**

- Automatic recognition for straight-through or cross-over cables
- Stackable physically and through cluster technology. Central management with unified IP

address saves IP addresses

- Management via CONSOLE port, Web, SNMP, Telnet, etc.
- Support (BDCOM) Broad Director, HP Open View, Cisco Works 2000

**Traffic and broadcast control**

- Auto-detection and restraining of broadcast storm, IGMP snooping, effectively restrict broadcast flooding
- Full- and half- duplex traffic control
- Ethernet port rate limiting with 64 K step size
- IP multicast and QoS support

***Specifications***

Processor	RISC 300 MHz
FLASH	8 MB
Memory	128 MB (up to 512 MB)
Port & Slot	48 * 10/100M RJ-45 MDI/MDI-X Self-adapting Ports 2 * 100/1000M Ethernet Expansion Slots (support up to 4 Gigabit Ports) 1 * Console Port
Switch Fabric	36 Gbps
Forwarding Rate	13.1 Mpps
Switching Mode	Store-and-forward
MAC Address Table Size	16 K
Routing Table Size	30 K
Queuing Buffer	64 MB
802.1Q VLAN	1 ~ 4094, partition at will
Dimensions (L × W × H)	442 mm × 316 mm × 44 mm
Power Consumption	60 W (max.)
Power Input	AC 100 ~ 240 V, 47 ~ 63 Hz, 1A/230V, RPS power hot standby
Stacking	Hardware stack upto 16 , software stack upto 32
LED Indicators	Power, system, link, activity, 10/100M
Temperature	Operating: 0 ~ 50°C, non-operating: -40 ~ 70°C
Humidity	0 ~ 90% (no condensing)

**Functions**

Spanning Tree	IEEE 802.1D STP, IEEE 802.1w RSTP, PVST/PVST+
VLAN	Port-based VLAN, 802.1Q tag VLAN, Super VLAN, Private VLAN, GVRP dynamic VLAN configuration

Traffic Control	Back pressure at half-duplex, 802.3x at full-duplex, CAR support, 64 K step size
Broadcast Control	Stop sending at threshold to restrict broadcast storms
Multicast Control	IGMP snooping
Port Trunking	Up to 8 groups with up to 32 ports per group, dynamic LACP or static aggregation
Port Mirroring	Supported. Can be based on flow classification
Clustering	Up to 256, manageable through single IP
Security	IEEE 802.1x port-based user authentication MPLS Martini QinQ double VLAN security Port Security Hardware support for IP ACL, MAC ACL, VLAN ACL Port-based user authentication by combinations and bandings of port, IP address, and MAC address Web user authentication Remote authentication through RADIUS, TACACS+ User privilege classification and password protection
QoS	Head Of Line (HOL) blocking prevention mechanism 4 dispatching queues per port, mapping the 8 priority queues in 802.1p WRED, WFQ, SP, and FIFO queuing algorithms Best Effort Service Differentiated Service Strict Priority Weighted Round Robin First Come First Serve TOS re-tagging RTS
Network Management	SNMP v1/v2 RMON (Group 1, 2, 3, 9) Telnet Command Line Interface (CLI) Web interface Support BDCOM network management tools suite: Broad Director NTP SSH PDP (compatible with Cisco CDP)
Software Upgrade	TFTP/Z-MODEM
Configuration Upload/download	TFTP/Z-MODEM

### ***Order Information***

BDCOM S2448	Stackable Ethernet switch with 48 10/100M Fast Ethernet ports, 2 expansion
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	slots supporting up to 4 Gigabit ports, 1 CONSOLE, and standard AC power supply
LS-2GE-TX/SFP	2-port 1000-M SFP/RJ45 Ethernet Combo Module (need GSFP module)
GSFP-TX	1-port 1000BaseT SFP module, RJ45 Ethernet
GSFP-SX	1-port 1000BaseSX SFP module, multi-mode, 550 m, 850 nm
GSFP-LX-10	1-port 1000BaseLX SFP module, single-mode, 10 km, 1310 nm
GSFP-LX-40	1-port 1000BaseLX SFP module, single-mode, 40 km, 1310 nm
GSFP-ZX-80	1-port 1000BaseLX SFP module, single-mode, 80 km, 1550 nm
LS-2FE-SFP	2-port 100-M SFP expansion base board (need FSFP module)
FSFP-SX	1-port 100BaseSX SFP module, multi-mode, 2 km, 850 nm
FSFP-SX-1310	1-port 100BaseSX SFP module, multi-mode, 2 km, 1310 nm
FSFP-LX-15	1-port 100BaseFX SFP module, single-mode, 15 km, 1310 nm
FSFP-LX-40	1-port 100BaseFX SFP module, single-mode, 40 km, 1310 nm
FSFP-ZX-80	1-port 100BaseFX SFP module, single-mode, 80km, 1550 nm

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