

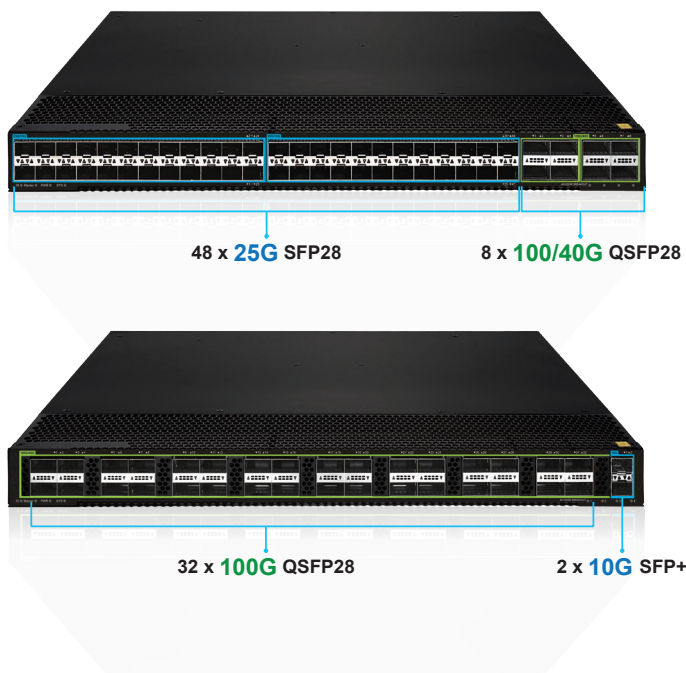
## Layer 3 32-Port 100G/40G QSFP28 + 2-Port 10G SFP+ Managed Data Center Switch

## Layer 3 48-Port 25G SFP28 + 8-Port 100G/40G QSFP28 Managed Data Center Switch



### Meeting Complex Demands of Today's Data Centers

PLANET DCS-7342 Managed Data Center Switch Series, tailored to meet the complex demands and high-performance standards of modern data centers, offers high performance and flexibility. It excels in providing comprehensive Layer 2, Layer 3, and Layer 4 functionalities. The DCS-7342-48Y8C features up to 48 25G and 8 100G/40G QSFP28 ports while the DCS-7342-32C2X comes with up to 32 100G/40G QSFP28 ports and 2 10G SFP+ ports. PLANET data center switch series is equipped with robust Layer 3 routing protocols including OSPF and BGP addressing the complexities of network architectures. This ensures seamless data transmission and high bandwidth, making it ideal for cloud computing environments, large enterprise data centers, high-frequency trading, and large-scale content delivery networks (CDN).



### Physical Ports

- DCS-7342-48Y8C
  - 48-Port 25G SFP28
  - 8-Port 100G/40G QSFP28
  - RJ45 to DB9 console interface for switch basic management and setup
- DCS-7342-32C2X
  - 32-Port 100G/40G QSFP28
  - 2-Port 10GBASE-SR/LR SFP+
  - RJ45 to DB9 console interface for switch basic management and setup

### Stacking Features

- Hardware Stacking
  - Virtualized multiple PLANET data center switches stacked into one logical device
  - Connects with stack member via 100G/40G QSFP28 and 10G SFP+ interfaces
  - Single IP address stack management, supporting up to 2 hardware units stacked together
  - Stacking architecture supports redundant ring mode

### IP Routing Features

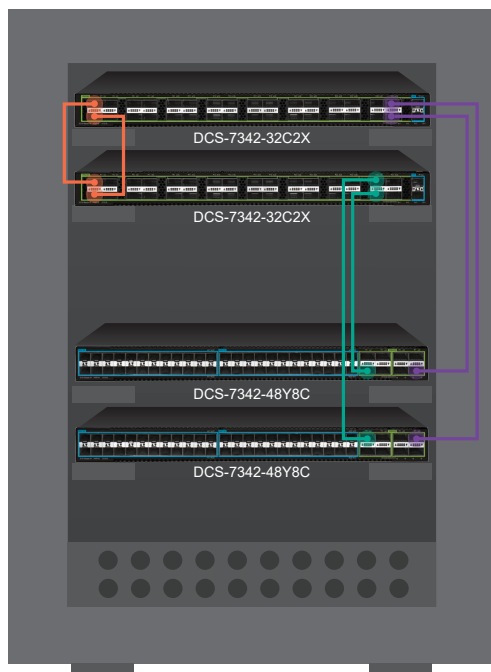
- IPv4 static routing
- IPv4 dynamic routing protocols such as OSPFv2, IS-IS and BGP
- IPv6 dynamic routing protocols such as OSPFv3, RIPng, BGP4 and BGP4+
- DHCP/DHCPv6 snooping VLAN-based
- GRE tunneling
- Equal-cost routing
- Policy-based routing
- Neighbor Discovery (ND)
- Path MTU Discovery (PMTU)
- IPv6 Ping and IPv6 Telnet
- ACL based on source IPv6 address, destination IPv6 address, Layer 4 port, and protocol type
- Dual-stack for IPv4 and IPv6
- Multiple tunneling techniques
- BFD session binding static routes, VRRP, OSPF, IS-IS, and BGP

### Scalable Networks with Robust Performance

Designed for scalability and robust performance, PLANET data center switch series features powerful Layer 3 routing capabilities and supports 100G/40G interfaces. It is built into a durable chassis, allowing administrators to select suitable QSFP transceivers for efficient network expansion and coverage. The series securely handles large data volumes, making it perfect for data center backbone networks and high-capacity servers. It excels in supporting critical applications like VoIP, video streaming, and multicast, ensuring reliable network performance.

### Enhanced Reliability with MLAG

PLANET data center switch series is integrated with MLAG (Multi-chassis Link Aggregation Group) technology to enhance network reliability in critical environments. MLAG allows multiple switches to function as a unified entity, ensuring seamless failover and increased bandwidth utilization. This technology synchronizes configurations and state information between paired switches, minimizing downtime and optimizing network resilience. Ideal for high-demand applications like enterprise data centers and cloud environments, PLANET data center switch series with MLAG supports uninterrupted connectivity and scalability without compromising performance.



### VXLAN Application and Scalability

Support for VXLAN technology, including Layer 2 and Layer 3 switching functionalities and EVPN VXLAN support, It extends IPv6 application capabilities over IPv4 infrastructure. With stacking design, administrators can virtualize multiple switches into a single logical device, simplifying network management and expansion. Stacking enhances network reliability and availability by sharing

### Multicast Routing Features

- Supports PIM-DM (Protocol Independent Multicast – Dense Mode)
- Supports IGMP v1/v2/v3

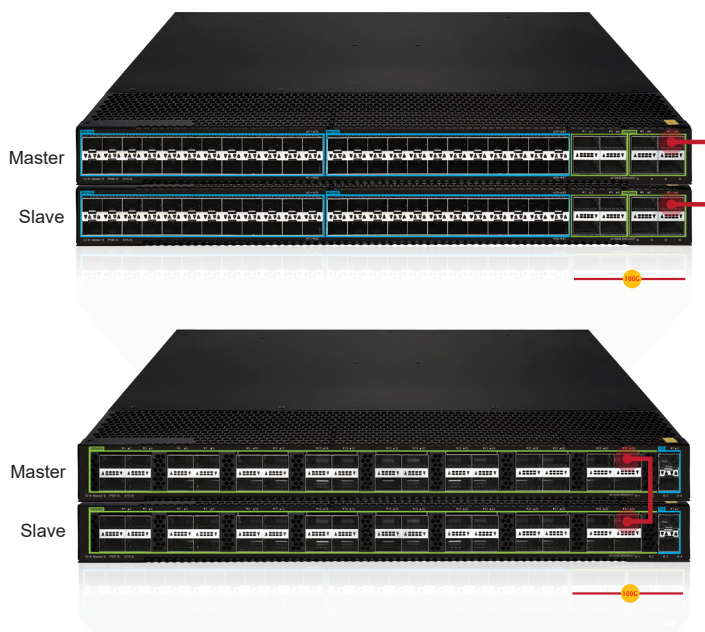
### Layer 2 Features

- Supports VXLAN Layer 2 Switching, Routing Switching, and Layer 3 Gateway
- Supports EVPN VXLAN
- Supports IPv6 VXLAN over IPv4
- Supports Link Aggregation
  - 802.3ad Link Aggregation Control Protocol (LACP)
- Supports Link Aggregation
- Multi-Chassis Link Aggregation (MLAG)
  - 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
  - Black-hole MAC list
  - IEEE 802.1AE MacSec
- Supports up to 4K VLANs
  - 1:1 and N:1 VLAN Mapping based on 802.1p
  - Q-in-Q and enhanced flexible Q-in-Q
- Supports 802.1d STP, 802.1w RSTP and 802.1s MSTP
  - BPDU Protection
  - Root Protection
  - Loop Protection
- Supports IGMP v1/v2c/v3
  - IGMP Snooping
  - MLD snooping
- Supports L2-L4 packet filtering
  - Filters based on MAC, IP, port, protocol, IP ToS, 802.1p priority, VLAN ID, SVLAN ID, VLAN range, etc.
- Supports cross-device link aggregation
- Supports port mirroring and flow mirroring
- Link Layer Discovery Protocol (LLDP)

### Quality of Service

- L2-L4 packet filtering with filters based on MAC, IP, port, protocol, IP ToS, 802.1p priority, VLAN ID, SVLAN ID, VLAN range, etc.
- ACL based on time periods
- DLF (Destination Lookup Failure) storm suppression, multicast storm suppression, and broadcast storm suppression
- Port-based bandwidth limiting

ports and enables intelligent management functions, thereby optimizing resource utilization and facilitating flexible network configurations. This makes PLANET data center switch series an ideal choice for handling large-scale network requirements, meeting enterprises' needs for high performance and scalability.



#### High Availability, Advanced Security and Energy Efficiency

Ensuring high availability, the switch features redundant power supplies and smart fans. Built-in CLI management tools enhance configuration and monitoring convenience, ensuring reliability in various environments. Advanced Security features and an energy-efficient design enhance operational efficiency and environmental sustainability. Layer 4 functionalities refine network management, improving the overall efficiency and responsiveness.



#### High-density Port Configuration and Advanced QoS Data Security

The switch supports high-density port configurations such as 10G, 40G and 100G ports, facilitating large-scale data transmission and high-bandwidth applications. Advanced Quality of Service (QoS) support ensures efficient transmission of critical business data through intelligent traffic management and prioritization. Advanced security features including ACLs, port security, and data encryption protect against unauthorized access and malicious attacks.

- Flow/VLAN-based bandwidth limiting (single-rate two-color, single-rate three-color, dual-rate three-color)
- Priority-based scheduling and priority mapping for flows
- SP/PQ (Strict Priority/Priority Queuing), DRR (Deficit Round Robin), and SP/PQ+DRR scheduling algorithms
- Queue management policies such as tail drop and WRED (Weighted Random Early Detection)
- 8 hardware priority queues per port
- 802.1p, DSCP/ToS priority marking

#### Multicast

- Supports IPv4 IGMP snooping v1, v2 and v3
- Supports IPv6 MLD snooping v1 and v2
- MVR (Multicast VLAN Registration)

#### Security

- User permission classification management and command line classification protection
- Authentication support for 802.1x, RADIUS, and TACACS+
- User level quantity limitation
- User binding (port, source MAC, source IP address access control)
- SNMP login terminal restriction
- SSH v2.0 support
- DDoS attack prevention
- IP Source Guard support
- MAC black hole support
- MAC address quantity limitation
- Static ARP, Gratuitous ARP, ARP inspection

#### Management

- Supports Console, Telnet and SSH terminal services (5 simultaneous Telnet / SSH sessions at least)
- Supports SNMPv1/v2/v3 network management protocols and standard MIB for general features
- Supports NETCONF network management protocol
- Supports file upload and download via FTP and TFTP methods, unified management of logs, alarms and debug information
- Supports user operation logs and RMON (remote monitoring)
- Supports port mirroring and flow mirroring
- Supports BootROM upgrade, remote online upgrade and hot patch
- Supports fan temperature control for automatic adjustment
- Supports temperature and fan monitoring with alerts