

Dell PowerConnect 6200 Series

Dell[™] PowerConnect[™] 6200 offers advanced switching capabilities including Power Over Ethernet (PoE), high-density, high-performance stacking and 10 Gigabit Ethernet capabilities scalable from the small business to the Enterprise Edge.

With 24 or 48 built-in copper Gigabit Ethernet ports in a 1U form factor, as well as a 24 port Fiber GbE version for backbone or long-haul connectivity, the PowerConnect 6200 series gives users the flexibility to maximize server and workstation connectivity in a 1U form factor. The switches also offer support up to four 10 Gigabit Ethernet uplinks for connectivity directly to 10GbE servers, enterprise backbones and distributed campus wiring closets (IDF and MDF).

High-performance stacking with 10GbE

The PowerConnect 6200 series supports highperformance resilient stacking for up to twelve systems and almost 2 Terabits of capacity in a single stack (each switch supports up to 184 Gbps in switch capacity). The unique modular design allows you to upgrade to advanced stacking or 10 Gigabit Ethernet only when you need it. Plus the 6200 series offers further flexibility with optional modules that allow for either 10 Gigabit copper interfaces, or both. The optional stacking interfaces allow for high availability stacking with sub-100ms failover times, even in the event of a master unit failure.

Advanced switching features with robust security

The PowerConnect 6200 series supports advanced Layer 3 routing and multicast protocols to help reduce congestion and manage traffic in the network. The PowerConnect 6200 series supports frequently used LAN routing protocols such as RIPv1/v2, OSPFv2/v3, VRRP, IGMP v1/v2/v3, DVMRP, PIM and LLDP-MED. The PowerConnect 6200 offers flexibility in Quality of Service (QoS) by giving network administrators the ability to prioritize time-critical Layer 2 or Layer 3 network traffic. Support for L2-L4 Access Control Lists (ACLs) on the switch allows the user to perform deep packet inspection. 802.1x port authentication offers both single and multiple host access. Further security is provided through Denial of Service (DoS) Attack Prevention, whereby the switch can protect against common network attacks. PowerConnect 6200 switches are IPv6 ready.

Power Over Ethernet (PoE) support

The PowerConnect 6200 series PoE switches offer PoE-per-port support for power-dependent network applications including WLAN Access Points (WAPs), Voice over IP (VoIP) handsets, video conferencing and badge reading. The 6224P and 6248P switches can provide up to 15.4 watts of power for networkattached devices.

Lifetime Warranty*

Select PowerConnect switches are backed by an industry-leading, lifetime warranty which guarantees Basic



Hardware Service (repair or replacement) for life. PowerConnect switches not only provide the quality, reliability and capability you expect from Dell, but also the peace of mind that comes with a true lifetime warranty.

Details at Dell.com/LifetimeWarranty

| Product | Dell™ PowerConnect™ 6224 & 6224P | Dell ™ PowerConnect ™ 6224F | Dell ™ PowerConnect ™ 6248 & 6248P |
|------------------------------|---|--|--|
| Port types | 24 10/100/1000BASE-T auto-sensing Gigabit Ethernet switching ports; 4 SFP combo ports for fiber media support; 10 Gigabit Ether- net uplink modules (optional). 6224P: Up to 15.4 watts per port (with optional external power supply) on all 24 ports | 24 1000-SX or 1000-LX GigabitEthernet ports; 4 Combo (SFP or 10/100/1000) Gigabit Ethernet ports; Up to 4 10-Gigabit Ethernet Ports; Distances: 1000BASE-SX: Up to 500m 1000BASE-LX: Up to 2 km | 48 10/100/1000BASE-T auto-sensing Gigabit Ethernet switching ports;4 SFP combo ports for fiber media support; 10 Gigabit Ethernet uplink modules (optional) 6248P: Up to 15.4 watts per port (with optional external power supply) on all 48 ports |
| Port configuration | Resilient stacking up to 12 systems (with optional module); Auto-negotiation for speed, duplex mode and flow control; Auto MDI/MDIX; Port mirroring; Flow-based port mirroring; Broadcast storm control | | |
| Performance | Switch Fabric Capacity 136 Gb/s Forwarding Rate 95 Mpps Up to 8,000 MAC Addresses | | Switch Fabric Capacity 184 Gb/s Forwarding Rate 131 Mpps Up to 8,000 MAC Addresses |
| Availability | Spanning Tree (IEEE 802.1D) and Rapid Spanning Tree (IEEE 802.1w) with Fast Link Support; Multiple spanning trees (IEEE 802.1s); Supports Virtual Redundant Routing Protocol (VRRP); External redundant power support with PowerConnect RPS-600 (sold separately); Cable diagnostics; SFP transceiver diagnostics | | |
| Layer 3 routing protocols | Static Routes; Routing Information Protocol (RIP) v1/v2; Open Shortest Path First (OSPF) v1/v2/v3; Classless Inter-Domain Routing (CIDR); Internet Control Message Protocol (ICMP); ICMP Router Discover Protocol (IRDP); Virtual Redundant Routing Protocol (VRRP); Address Resolution Protocol (ARP); Internet Group Management Protocol (IGMP) v2; Distance-Vector Multicast Routing Protocol (DVMRP) | | |
| VLAN | VLAN support for tagging and port-based as per IEEE 802.1Q; Double VLAN tagging (QinQ); Up to 1024 VLANs supported; Dynamic VLAN with GVRP support | | |
| Quality of service | Layer 2 Trusted Mode (IEEE 802.1p tagging); Layer 3 Trusted Mode (DSCP); Layer 4 Trusted Mode (TCP/UDP); Advanced Mode using Layer 2/3/4 flow-based Policies, including metering/rate limiting, marking and bandwidth guarantees; up to 100 ACLs can be used for QoS flow identification via Class-maps; 8 Priority Queues per Port; Adjustable Weighted-Round-Robin (WRR) and Strict Queue Scheduling; Port-based QoS Services Mode; Flow-based QoS Services Mode | | |
| Layer 2 multicast | IGMP v1/v2/v3; Static IP Multicast; Dynamic Multicast Support – 256 Multicast groups supported in IGMP Snooping; IGMP snooping for IP multicast support; IGMP Querier; Protocol Independent Multicast (PIM-DM, PIM-SM) | | |
| Security | IEEE 802.1x-based edge authentication; Switch access password protection; User-definable settings for enabling or disabling Web, SSH, Telnet, SSL management access; Port-based MAC Address alert and lock-down LLDP-MED; IP Address filtering for management access via Telnet, HTTP, HTTPS/SSL, SSH and SNMP; RADIUS and TACACS+ remote authentication for switch management access; Up to 100 Access Control Lists (ACLs) supported; up to 127 Access Control Entries (ACEs) per ACL; SSLv3 and SSHv2 encryption for switch management traffic; Management access filtering via Management Access Profiles | | |
| Other switching features | Link Aggregation with support for up to 128 static aggregated links, 8 dynamic aggregated links per switch or switch stack and up to 8 member ports per aggregated link; LACP support (IEEE 802.3ad); Link Layer Discovery Protocol support (IEEE 802.1AB); Support for unicast NLB (multicast NLB not supported) | | |
| Management | Web-based management interface; Industry-standard CLI accessible via Telnet or Local Serial Port; SNMPv1, SNMPv2c and SNMPv3 supported; four RMON groups supported (history, statistics, alarms and events); TFTP transfers of firmware and configuration files; Dual firmware images on-board; Multiple configuration file upload/download supported; Statistics for error monitoring and performance optimization including port summary tables; BootP/DHCP IP address management supported; Syslog remote logging capabilities; Temperature sensors for environmental monitoring; iSCSI Auto Configuration | | |
| Chassis | Approximate weight (without modules): 12.1lbs, 5.49 kg 440 x 387 x 43.2 mm (W x D x H) 17.3" x 15.2" x 1.7" 1U, rack-mounting kit included | | Approximate weight (without modules): 12.87lbs, 5.84 kg 440 x 387 x 43.2 mm (W x D x H) 17.3" x 15.2" x 1.7" 1U, rack-mounting kit included |
| Environmental | Operating Temperature: 0° C to 45° C (0° F to 113° F), Storage Temperature: -20° C to 70° C (-4° F to 158° F) | | |
| Power | Internal Power Supply Voltage AC 110/240 V +- 10% (50/60Hz) Power Consumption Max (Watts): 6224 (69.9W); 6224F (67.6W); 6224P (477W, if all ports drive PoE connections); 6248 (120W); 6248P (499W, if all ports drive PoE connections) | | |
| Optional peripheral products | RPS-600 Redundant Power Supply EPS 470 Redundant Power Supply for POE models SFP Optical Transceivers, 1000BASE-SX, LC Connector SFP Optical Transceiver, 1000BASE-LX, LC Connector CX-4 Module (Max. length supported is 12 meters) XFP Module 10GBase -T Module Stacking Module with 1 Meter Dell Stacking cable 3 meter stacking cable | | |

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*Select PowerConnect products carry a Lifetime Limited Warranty with Basic Hardware Service (repair or replacement) for life. Repair or replacement does not include troubleshooting, configuration, or other advanced service provided by Dell ProSupport. For more details see dell.com/warranty.



