

DrayTek

VigorSwitch 2540x series

54-Port Layer 2+ Managed 10G Switch



DrayTek VigorSwitch 2540x series is a Layer 2+ Managed 10 Gbps switch with 48 Gigabit Ethernet ports and 6 x SFP+ 10Gbps Fiber links. Supporting advanced Layer 3 features, DHCP Server and VLAN Routing. Moreover, it supports VLAN routing to route the inter-VLAN traffic directly, shares loads of the router, and improve overall network performance.

VigorSwitch G2540x/P2540x

48 x GbE
10/100/1000Mbps
Ethernet, RJ-45

6 x 10G SFP+
1000Mbps/10Gbps
fiber slot

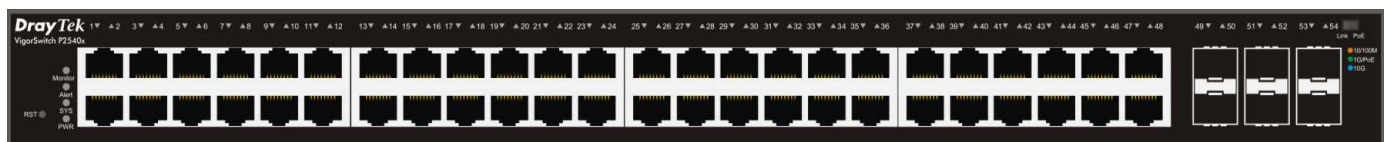
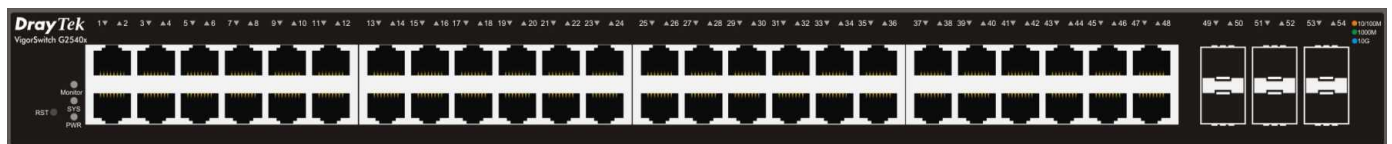
216 Gbps
Switching Capacity

160.7 Mpps
Forwarding Rate

VigorSwitch P2540x

48 x PoE/PoE+
PoE/PoE+ Gigabit
Ethernet Ports

400 watts
of PoE Power Budget



Key Features



PoE (P2540x)

Deliver power and data over one ethernet cable, turn on/off the PoE device periodically with PoE Schedule.



QoS (Quality of Service)

Improve the performance of critical traffic by prioritizing the traffic with CoS, DSCP, and IP Precedence tag.



PoE Device Check (P2540x)

Enable Ping Watchdog for all PoE devices, if they lose their network connection, automatically restart them by a power cycle.



Wire-Speed VLAN Routing

Improve overall network performance to route the inter-VLAN traffic directly and offload the router.



Auto Surveillance & Voice VLAN

Recognize traffic from IP cameras and IP phones automatically and add CoS tag for QoS prioritization.



10G SFP+

Provides 10G-capable fiber SFP ports for aggregation or uplinking to the core switches.



IP Conflict Prevention

Improve network stability by avoiding IP conflicts caused by a misconfigured or malicious host.



Multiple Admin Accounts

Multiple Admin accounts with two levels of administrator privilege.



Access Control

Support ACL by IP/MAC and 802.1x port access control with RADIUS to filter unauthorized hosts.



Energy-Efficient Ethernet

Compliant with IEEE 802.3az to reduce power consumption.



ONVIF-Friendly

Recognize the ONVIF devices, display surveillance topology, provide UI for video streaming and device maintenance.



Central Switch Management

Set up VLAN easily from the router and get a centralized hierarchy view of the switches.

Specification

Interface

LAN Port	48 x 10/100/1000Mbps Ethernet, RJ-45 6 x 1000Mbps/10Gbps SFP+ slot
Slide Switch	1 (Port/PoE LED)(P2540x)
Button	1 x Factory Reset

PoE (P2540x)

PoE Capable Ports	48
PoE Standards	PoE/PoE+ (802.3af/802.3at), Type mode A
PoE Power Budget	400 watts
Power Limit	•
Scheduled On/Off	•
Power Cycle on Port	Manual, Ping Watchdog

Capacity

Buffer Size	16 Mbit
Switching Capacity	216 Gbps
Forwarding Rate	160.7 Mpps (64 bytes)
MAC Address Table	32k
Jumbo Frame	Up to 12KB
L3 Routing Table	Max. 2k

Networking Standards

IP Version	IPv4, IPv6
Ethernet Standards	802.3af PoE, 802.3at PoE+ (P2540x) 802.3 10Base-T 802.3u 100Base-T 802.3ab 1000Base-T IEEE802.3ae 10GBase-X 802.3x Flow Control 802.3 Auto-Negotiation 802.1q Tag-based VLAN 802.1p Class of Service 802.1d STP 802.1w RSTP 802.1s MSTP 802.3ad LACP 802.1ad QinQ 802.1x Port Access Control 802.1AB LLDP 802.3az EEE

VLAN

Max.Number of VLAN	256
VLAN Type	802.1q Tag-based MAC-based Protocol-Based Management VLAN Voice VLAN Surveillance VLAN
802.1x Guest VLAN	•
Port Isolation	•
GVRP	•
Q-in-Q	Basic

ONVIF Surveillance

Discovery	•
Surveillance Topology	•
Real-Time Video Streaming	•
ONVIF Device Maintenance	Device Info, Reset Factory Default, Time Settings, Reboot

Security

Access Control List	MAC, IPv4, IPv6
Storm Control	Broadcast, Unknown Multicast, Unknown Unicast
DoS Defense	•
802.1x Port Access Control	•
IP Source Guard	•
IP Conflict Detection/Prevention	•
Loop Protection	•
Dynamic ARP Inspection	•
DHCP Snooping with Option 82	•

QoS

Number of QoS Queues	8
Queue Scheduling	SPQ, WRR
CoS (Class of Service)	802.1p CoS, DSCP, CoS-DSCP, IP Precedence
Rate Limit & Shaping	•

Link Aggregation

Max. Number of Group	8
Max. Number of Member in Each Group	8
Type	Static, LACP
Traffic Load Balancing	MAC Address, IP/MAC Address

Multicast

IGMP Snooping	v2, v3 (BISS)
IGMP Querier	•
MLD Snooping	v1, v2 (Basic)
Max. Number of Multicast Group	256
Group Throttling	•
Group Filtering	•
MVR (Multicast VLAN Registration)	•

Layer 3 Features

Static Route	•
VLAN Route	•
DHCP Server	•

Management

Web Interface	HTTP, HTTPS
Command Line Interface	Telnet, SSH
OpenVPN Client	Certificate-based authentication
User Authentication	Local Database, RADIUS, TACACS+
sFlow	•
SNMP	v1, v2c, v3
Private MIB	•
RMON Group	1, 2, 3, 9
LLDP	LLDP-MED, Media Endpoint Discovery Extension
Mail Alert	Port Status, Port Speed, System Restart, IP Conflict
Syslog	•
2-Level Admin Privilege	•
Multiple Admin Accounts	•
Managed by Vigor Router SWM	•
Managed by VigorConnect	•
Managed by VigorACS 2	•
Config File Export/Import	•
Dual Image	•
SNTP	•
Diagnostics Tools	Port Mirroring, Ping, Cable Test

Physical

Operating Temperature	0 to 45°C
Storage Temperature	-20 to 70°C
Operating Humidity	10 to 90% non-condensing
Storage Humidity	5 to 90% non-condensing