NetVanta 1234P/1238P

PoE, Layer 3 Lite Fast Ethernet Switches

Product Features

- 24/48-port auto-sensing 10/100Base-T managed Layer 2 Ethernet switch

- Two standard 1 Gbps (shared copper and SFP) ports and Two enhanced 2.5 Gbps SFP ports

- 802.3af (PoE) and Legacy PoE

- Non-blocking, up to 23.6 Gbps switching capacity

- Line rate Layer 2 and Layer 3 Lite capabilities

- Up to 32 static routes

- 802.1Q tagged and port-based Virtual LANS (VLANs)

- Support for up to 255 active vVLANs

- VoIP Setup Wizard

- 802.1p and DiffServ prioritization with 4 queues per egress port

- Link aggregation, LLDP and LLDP-MED

- Weighted Round Robin (WRR) and WRR + expedite

- 802.1D Spanning Tree and 802.1w Rapid Spanning Tree support

- DHCP network forensics

- Business-class security with RADIUS, TACACS+, 802.1x and port security

- Port mirroring

- TFTP/FTP firmware upgrades

- Broadcast, Unicast, and Multicast storm control

- Wi-Fi® Access Controller for centralized management of NetVanta Wireless Access Points (WAPs)

- Cable diagnostics identifies cable length and detects shorts or open twisted pair

- Familiar CLI and Web GUI

- Limited Lifetime Warranty

- Next Business Day Advance Replacement

The NetVanta® 1200 Series of managed, Layer 3 Lite, Ethernet switches is designed for fast, secure, cost-effective Local Area Network (LAN) switching. These scalable, full-featured business-class switches are perfect for Voice over IP (VoIP) applications. The switches use robust Quality of Service (QoS) features and Power over Ethernet (PoE) capabilities to power IP Phones, protecting the organization with advanced security capabilities, and ease of management with an easy-to-use Web-based Graphical User Interface (GUI) and familiar Command Line Interface (CLI).

Hardware

The NetVanta 1234P and 1238P rackmount switches support 24 and 48 10/100Base-T Ethernet ports with auto-rate, auto-duplexing and MDI/MDI-X sensing. In addition, each switch supports two 1.0 Gbps shared Small Form-factor Pluggable (SFP) or copper ports, and two 2.5 Gbps enhanced SFP ports. Together the four uplink ports can provide up to 14 Gbps of bandwidth between interconnected NetVanta 1234P or 1238P switches.

Multi-layer Switching

The NetVanta 1230 Series switches support advanced multi-layer (Layer 2 and Layer 3 Lite) switching with up to 32 static routes allowing it to easily scale from SMBs to enterprise-size networks.

Standards-based Protocols

Based on the ADTRAN® Operating System (AOS), these devices offer support for Link Aggregation (802.3ad); Port Mirroring; and Port-based switching features including Broadcast Storm Control, Spanning Tree (802.1D) and Rapid Spanning Tree (802.1w) for faster network convergence, link redundancy, and recovery from topology changes.

VLANs

All NetVanta switches support 802.1Q trunking and up to 255 port-based VLANs to allow network managers to separate broadcast domains for efficient network performance and traffic control.

Power over Ethernet

The NetVanta 1234P and 1238P platforms provide standards-based 802.3af and Legacy PoE functionality for powering IP phones, WAPs, or other devices requiring LAN power.

Security

The NetVanta 1200 Series switches offer a variety of data security features including multilevel user passwords, Secure Shell (SSH) and Secure Socket Layer (SSL) for encrypted user login, and Access Authentication and Authorization (AAA) for authentication with a RADIUS, RSA SecurID and TACACS+.

VoIP Ready

The NetVanta 1200 Series switches are VoIP-ready with the ability to automatically configure IP phones using LLDP-MED, and the ability to separate voice traffic onto voice VLANs, to simplify the deployment of VoIP. In addition, the switches include a VoIP Setup Wizard (available via a web-based GUI or CLI), which automates the complete VoIP setup process reducing deployment time and eliminating errors. An on-demand VoIP report provides a printable summary of the switch VoIP configuration, as well as providing alerts and recommendations to improve performance. All NetVanta switches support QoS to prioritize VoIP traffic, 802.1p and DiffServ Class of Service (CoS).

Administration

The AOS offers both a CLI and an intuitive Web-based GUI with step-by-step configuration wizards. For a centralized enterprise-wide management scheme, ADTRAN offers n-Command®, an intuitive, scalable software suite to manage firmware revisions, push firmware upgrades and configuration changes, backup and restore configurations, and manage security policies and Access Control Lists (ACLs).

NetVanta 1200 Series of Ethernet switches are easily coupled with other ADTRAN products including access routers, WAPs, IP Business Gateways, IP phones, and VoIP telephony solutions. All of these solutions are backed by ADTRAN's outstanding support and services, and an industry-leading warranty.

ADTRAN, Inc.
Attn: Enterprise Networks
901 Explorer Boulevard
Huntsville, AL 35806
P.O. Box 140000
Huntsville, AL 35814-4000

256 963-8000
256 963-8699 fax

General Information
800 9ADTRAN
info@adtran.com
www.adtran.com

Pre-Sales Technical Support
888 423-8726
application.engineer@adtran.com
www.adtran.com/presales

Post-Sales Technical Support
888 423-8726
support@adtran.com
www.adtran.com/support

Where to Buy
888 423-8726
channel.sales@adtran.com
www.adtran.com/where2buy

ProServicesSM
888 874-2237
proservices@adtran.com
www.adtran.com/proservices

Global Inquiries
256 963-8000
256 963-6300 fax
international@adtran.com

TL19.1270

ADTRAN is an ISO 9001, ISO 14001, and a TL 9000 certified supplier.

NetVanta 1234P/1238P
PoE, Layer 3 Lite Fast Ethernet Switches

Product Specifications

Physical Interface

Ethernet Ports
- **NetVanta 1234P:** 24 10/100Base-T
- **NetVanta 1238P:** 48 10/100Base-T
- Two Combo 10/100/1000Base-T/SFP
- Two Enhanced 1.0/2.5 Gbps SFP ports
- Auto Rate/Duplex/MDI/MDI-X

Console Port
- DB-9, RS-232

Switching Performance
- Non-blocking Layer 2/3 Switching
- 8,000 MAC Addresses

Maximum Forwarding Bandwidth
- **NetVanta 1234P:** 18.8 Gbps
- **NetVanta 1238P:** 23.6 Gbps

Layer 2 Support
- 802.1D Spanning Tree
- 802.3ad Link Aggregation
- Jumbo Frames (9K)
- 802.3x Flow Control
- 802.1w Rapid STP
- 8,000 MAC Addresses
- IGMP Snooping

Layer 3 Support
- 32 Static Routes
- UDP Relay
- IPv6 Management
- 16 Layer 3 Interfaces
- 232 ARP Entries

Diagnostics
- Port Mirroring
- LLDP-MED
- Cable Diagnostics
- LLDP (802.1AB)
- Ping

Front Panel Status LEDs
- Status
- **LAN:** Link, Activity

Port Statistics
- Number of TX/RX Frames
- Number of Collisions
- Number of Errors

Spanning Tree Support
- 802.1D Spanning Tree
- 802.1w Rapid Spanning Tree

Link Aggregation
- 802.3ad Link Aggregation
- Support for 6 Trunk Groups
- Trunk groups consist of up to 8 access ports or 2 uplink ports

Quality of Service (QoS)
- 802.1p and DiffServ
- 4 output queues per egress port
- Weighted Round Robin (WRR)

VLAN Support
- Port-based VLANs
- 802.1Q Tagged Trunked VLANs
- Support for up to 255 Active VLANs

Power Over Ethernet
- 802.3af and Legacy Support
- Up to 15.4 W/Port
- **NetVanta 1234P/128P:** 370 total watts
- Power Management

Wi-Fi Controller
- Controls up to 24 NetVanta WAPs

Storm Control
- Broadcast, Unicast, and Multicast

Administration
- Familiar Command Line Interface (CLI)
- Web-based GUI
- n-Command Support
- SNMP v3 n TCL Scripting
- Requires AOS R10.8 or higher
- SYSLOG Logging
- Email Alerts (SMTP)
- IPv6 Management

Network Access Control
- Port Authentication (802.1x)

Environment
- **Operating Temperature:** 32° to 122 °F (0° to 50 °C)
- **Storage Temperature:** -4° to 158 °F (-20° to 70 °C)
- **Relative Humidity:** Up to 95%, Non-condensing

Physical
- **Chassis:** 1U, 19 in. Rackmountable Metal Enclosure
- **NetVanta 1234P**
  - **Dimensions:** 1.7 in. x 17.2 in. x 13.25 in. (H x W x D) (4.3 cm x 43.7 cm x 33.7 cm)
  - **Weight:** 12.7 lbs (5.8 kg)
  - **Power:** 500 watts
- **NetVanta 1238P**
  - **Dimensions:** 1.7 in. x 17.2 in. x 15.42 in. (H x W x D) (4.3 cm x 43.7 cm x 39.2 cm)
  - **Weight:** 13.5 lbs (6.1 kg)
  - **Power:** 500 watts
- **AC Power:** 100–250 VAC, 50/60 Hz

Agency Approvals
- FCC Part 15 Class A and UL 1950/CSA

Ordering Information

Equipment	Part No.
NetVanta 1234P	**1703595G1**
NetVanta 1238P	**1702599G1**
NetVanta 1000BaseSX SFP (LC Connectors)	**1200480E1**
NetVanta 1000BaseLX SFP (LC Connectors)	**1200481E1**
NetVanta 1000Base-T SFP	**1200485G1**
NetVanta 2.5 Gbps multi-mode SFP Transceiver	**1200482G1**
NetVanta 2.5 Gbps single-mode SFP Transceiver	**1200483G1**
NetVanta 1 meter SFP Interconnect cable	**1200484G1**
NetVanta 3 meter SFP Interconnect cable	**1200484G3**