



# NetVanta 344

## Business-class ADSL/ADSL2/ADSL2+ Router with Four-port Switch

### Product Features

- Affordable routing solutions for business-class ADSL networks
- Integral four-port managed Ethernet switch
- Innovative ADSL2+ technology provides further reach and higher bandwidth (up to 25 Mbps)
- Standards-based routing/switching protocols, based on the widely deployed NetVanta Series
- Feature-rich ADTRAN Operating System (AOS)
- Stateful inspection firewall for network security
- Optional VPN for secure corporate connectivity across the Internet
- Recognizable Command Line Interface (CLI) eliminates re-training
- User-friendly Web Graphical User Interface (GUI)
- NAT-compatible SIP ALG for VoIP
- Interoperable with other NetVanta product offerings and carrier-based ADSL service offerings
- Industry-leading five-year North American warranty

The NetVanta® 344 is a business-class ADSL/ADSL2/ADSL2+ IP access router with an integral four-port Ethernet switch. It provides a single ADSL network interface and four auto-sensing 10/100Base-T Ethernet interfaces. This product is ideal for carrier bundled service offerings and enterprise Internet access for secure, high-speed corporate connectivity. In addition to supporting ADSL (Annex A), and ADSL2, the NetVanta 344 supports today's most advanced ADSL technology, ADSL2+, for applications taking advantage of its greater reach and higher bandwidth, up to 25 Mbps. A variety of WAN protocols are supported including PPP over ATM and PPPoE over ATM.

#### Standards Protocols

The versatile hardware platform of the NetVanta 344 is further complemented with the ADTRAN® Operating System (AOS). The AOS allows for the support of standards-based switching, VLAN tagging, static and default routes, demand routing, and allows for fast, accurate network convergence using routing protocols such as BGP, OSPF, and RIP.

#### Security

The AOS provides a powerful, high performance stateful inspection firewall. It will examine all incoming and outgoing packets against the security policies established by the IT manager. In addition, the firewall can identify and protect against common Denial of Service (DoS) attacks like TCP syn flooding, IP spoofing, ICMP redirect, ping-of-death, and IP reassembly problems.

With the AOS Enhanced Feature Pack Upgrade, the NetVanta 344 supports up to five simultaneous IPSec VPN tunnels, and encryption algorithms like DES, 3DES, and AES. With this upgrade, the NetVanta 344 is fully compatible with other IPSec VPN equipped NetVanta products.

#### Quality of Service (QoS)

QoS is also supported for delay sensitive traffic like VoIP or video. To prioritize mission critical traffic and control network congestion, the NetVanta 344 uses Low Latency Queuing, Weighted Fair Queuing (WFQ), Class-based WFQ, and DiffServ marking to establish priority of IP packets routed over the WAN.

#### VoIP Ready

In combination with the QoS features, a specialized SIP Application Layer Gateway (ALG) allows SIP traffic to traverse NAT-enabled firewalls. For an enterprise network, this interoperability allows IP PBXs, phones, and other SIP-based devices to set up, tear down, and pass voice and call control messages seamlessly through the integral NAT-enabled firewall.

#### Administration

The AOS offers a standard Command Line Interface (CLI) that mimics the widely adopted, industry *de facto* standard. The sequence of commands to configure similar devices is almost identical, virtually eliminating training costs associated with re-learning a new operating system or costly industry certifications. The CLI also allows for configuration scripts to be used, saved, and downloaded for a quick and easy recovery mechanism. In addition, an intuitive Web-based GUI provides step-by-step configuration wizards, management capability, and the ability to upload firmware updates.

ADTRAN, the leader in WAN connectivity, offers proven and dependable equipment that will increase your network performance, lower costs, and allow migration to next generation technologies. The NetVanta 344 is no exception.





### ADTRAN, Inc.

Attn: Enterprise Networks  
901 Explorer Boulevard  
Huntsville, AL 35806

P.O. Box 140000  
Huntsville, AL 35814-4000

256 963-8000 voice  
256 963-8699 fax  
256 963-8200 fax back

### General Information

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

### Pre-Sales

#### Technical Support

800 615-1176 toll-free  
application.engineer@adtran.com  
www.adtran.com/support

### Where to Buy

877 280-8416 toll-free  
channel.sales@adtran.com  
www.adtran.com/where2buy

### Post-Sales

#### Technical Support

888 423-8726  
support@adtran.com  
www.adtran.com/support

### ACES Installation & Maintenance Service

888 874-ACES  
aces@adtran.com  
www.adtran.com/support

### International Inquiries

256 963 8000 voice  
256 963-6300 fax  
international@adtran.com  
www.adtran.com/international

### For the regional office nearest you, visit:

www.adtran.com/regional



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

61200426L1-8F AOS 16.1 August 2007  
Copyright © 2007 ADTRAN, Inc.  
All rights reserved.

# NetVanta® 344

## Business-class ADSL/ADSL2/ADSL2+ Router with Four-port Switch

### Physical Interface

- **DSL:** ADSL/ADSL2/ADSL2+ Interface  
ADSL ITU G.992.1 (Annex A)  
ADSL ITU G.992.2 (Annex A) G.Lite  
Extended Reach ADSL (RADSL)  
ADSL2 ITU G.992.3 (Annex A)  
ADSL2+ ITU G.992.5 (Annex A)
- **Ethernet:** Four-port, Auto-sensing Ethernet Switch  
10/100Base-T Full Duplex (RJ-45)

### Diagnostics LEDs

- Power
- Ethernet
- DSL
- Internet

### Memory

- **RAM:** 32 MB
- **FLASH:** 16 MB

### Protocols

- eBGP/iBGP
- OSPF
- RIP (v1 and v2)
- Demand Routing
- GRE
- IGMP v2
- PPP over ATM (RFC 2364)
- PPPoE over ATM (RFC 2516)
- Classical IP over ATM (RFC 2225)
- AAL5
- PAP and CHAP

### Quality of Service

- **DSL:** Low Latency, Weighted Fair Queuing (WFQ), and Class-based WFQ
- **Ethernet:** Weighted Round Robin (WRR) and Strict Priority Queuing
- DiffServ Packet Marking and Recognition
- Frame Relay Fragmentation

### Switching

- VLAN Support (802.1Q)
- Spanning Tree (802.1D)
- Rapid Spanning Tree (802.1w)
- 802.1p and DiffServ QoS

### Administration

- Familiar Command Line Interface (CLI)
- Web-based GUI
- n-Command® support
- SNMP v3
- SYSLOG Logging
- Email Alerts (SMTP)
- Policy Statistics

### DHCP

- Client, Server, and Relay

### Security

#### Firewall

- Stateful Inspection Firewall
- Denial of Service (DoS) Protection
- Access Control Lists
- Application Level Gateways (ALGs)

#### Network Address Translation

- Basic NAT (1:1), NAT (Many:1), and Port Translation
- NAT compatible SIP ALG

#### Secure Management

- Multilevel access control
- RADIUS AAA
- TACACS+
- SSH CLI and SSL GUI

#### Optional Virtual Private Network (VPN)

- **IPSec Tunnel Mode:** 5 Tunnels
- **Encryption:** DES, 3DES, and AES
- **Diffie Hellman Group Support:** Group 1: MODP 768 and Group 2: MODP 1024
- **Hash Algorithms:** MD5-HMAC and SHA1-HMAC
- **Authentication Mechanisms:** XAUTH, Digital certificates, Preshared keys, and Secure ID
- **Key Management:** IKE (ISAKMP/Oakley)
- **IKE Modes:** Main and Aggressive
- Dead Peer Detection
- NAT Traversal V2

### Environment

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

### Physical

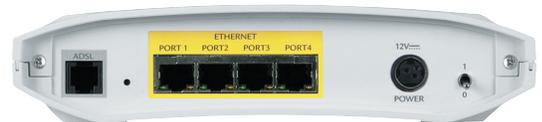
- **Chassis:** Self-standing, plastic enclosure
- **Dimensions:** 1.625" H, 7.5" W, 5.25" D
- **Weight:** 1 lb.
- **Power:** 12 VDC, 800 mA, 6 W  
(AC to DC Power Adapter Included)

### Agency Approvals

- FCC Part 68
- Industry Canada CS03
- CE Mark, UL and Canadian UL (CUL), IEC/EN, CSA

## Ordering Information

Equipment	Part #
<b>Systems</b>	
NetVanta 344 Chassis	1200426E1
<b>Systems with VPN</b>	
NetVanta 344 with VPN	4200426E2
<b>VPN Software Upgrade</b>	
NetVanta 344 VPN Software Upgrade	1950426L2



Specifications subject to change without notice. ADTRAN and NetVanta are a registered trademark of ADTRAN, Inc. All other trademarks mentioned in this document are the property of their respective owners. For more information regarding ADTRAN's export license, please visit [www.adtran.com/exportlicense](http://www.adtran.com/exportlicense)

ADTRAN believes the information in this publication to be accurate as of publication date, and is not responsible for error. Content subject to change without notice. ADTRAN provides an industry-leading warranty with all of its products. For more details, visit [www.adtran.com/warranty](http://www.adtran.com/warranty)

An Export License is required if these ADTRAN products are sold to a Government Entity outside of the EU-8 (Austria, Australia, Belgium, Bulgaria, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Japan, Latvia, Lithuania, Luxembourg, Malta, Netherlands, New Zealand, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, and the United Kingdom). This is per DOC/BIS ruling G030477 issued June 6, 2003.