

# 3480 ASG

## Access Services Gateway

Integrated Secure Voice and Data Solution for Enterprise Branch Office



### Robust Routing

The Vanguard 3480 robust routing capabilities include full OSPF, BGP-4, MLPPP and multicast protocols, all without any extra memory requirements. MLPP provides high availability through multiple service connectivity paths and load balancing. IP multicasting allows efficient, fast forwarding of multimedia business applications. The Vanguard 3480 delivers the low-latency, high packet forwarding required by VoIP delivery with optimal quality.

### Managed Routable Ethernet Ports

Multiple, managed, routable Ethernet ports provide the flexibility for load balancing, secure WAN access, and backup, when used as WAN interfaces. These ports can also be used as LAN interfaces with WAN connectivity being provided by another transmission interface such as T1/E1.

### Toll Quality Voice Access Gateway

Vanguard Networks long history and expertise in providing toll-quality packet voice solutions enables the 3480 Access Services Gateway to deliver reliable and robust voice quality.

The Vanguard 3480 Access Services Gateway provides enterprises and service providers a wide range of solutions for data, voice, and video. The Vanguard 3480 provides connectivity to the PSTN, ISDN, legacy PBX and analog devices, allowing a gradual migration to IP Telephony and interoperability between PSTN, VoFR, BRI, SIP and H.323 environments.

### Modular Integrated Voice/Data Architecture

The Vanguard 3480 allows for rapid deployment of new converged multimedia services in IP-based networks allowing you to move from proprietary PBX systems and desktop phones to open, SIP-based standard technologies. The Vanguard 3480 is a single integrated platform for all applications, IP and non-IP and consolidates multiple functions in an optimized, flexible platform. The Vanguard 3480 modularity allows your network to grow and adapt to your business needs. With Vanguard Networks Voice Broadcasting service, you can improve productivity by providing a reliable, cost-effective way to reach your existing customers. Vanguard Networks also has the ability to network digital and analog radios through MPLS or Frame Relay using E&M interfaces. The ISDN BRI voice interface provides voice/fax support over ISDN, while the ISDN BRI data interface can be used for backup WAN access in the case of primary WAN access failure.

### Advanced Security and Control

The Vanguard 3480 enterprise-class security features are designed to enable secure site-to-site, internet, and remote access connections over IP. The 3480 supports an integrated firewall with DMZ capacity and secure access via IPSec VPN with optional hardware-accelerated encryption. Access to the CTP is secured by using SSH2 to ensure full configuration control.

### Advanced QOS and Bandwidth Management

With Vanguard Networks advanced quality of service you have the ability to provide different priority to different applications, users, or data flows allowing optimal performance for mission-critical and low-latency applications such as VoIP. The bandwidth management capabilities are scalable, standards-based, and multivendor compatible.

### Vanguard Networks Family of Products and Simplify Choices

Choosing Vanguard Networks enables the integration of secure IP services with legacy data, voice, and video applications over the WAN, while optimizing network performance, security, and quality of service (QoS). Vanguard offers a complete line of enterprise multi-service IP access routers for both small and large Branches and Data Center solutions.

### Standards Based Interoperability with Multiple Vendors

The Vanguard 3480 is standards based allowing for interoperability between various vendor technologies. With Vanguard Networks customers can choose best-of-breed vendors offering numerous benefits over monolithically, proprietary solutions provided by a single vendor. Interoperable with leading vendors at the core, our SIP, VPN, MPLS and routing implementations add value while reducing total cost of ownership.

### Vanguard Networks Outstanding Reliability

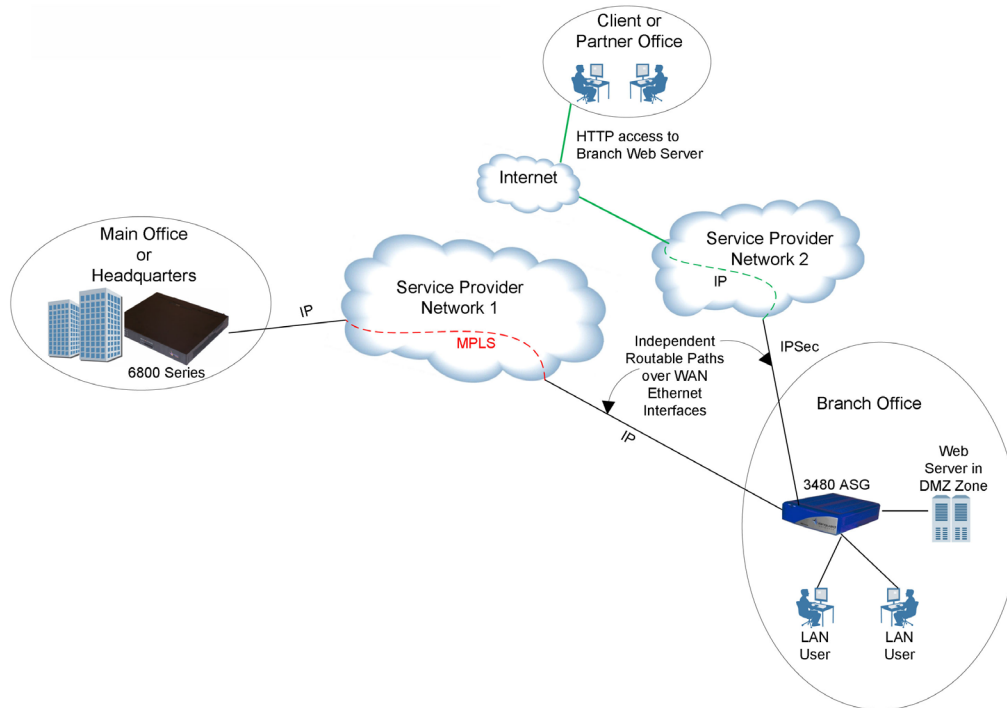
Vanguard Networks' Applications Ware suite of protocols and security routing features have been deployed throughout thousands of locations. Their outstanding reliability has proven itself over the many years of service provided to customers without interruption.



### Target Applications

The major applications envisioned for the 3480 are the following scenarios:

1. IP-based WAN Data Access at small to medium branch office locations. Multiple WAN routable interfaces deliver load-balancing, security, and backup connectivity serving multiple LAN users. Client/Partner access to publicly available web services with DMZ zoning while securing internal resources.



2. Hosted, SIP based IP Telephony and WAN data access for branch office LAN users at small to medium branch office locations. Telephone services are maintained in case of WAN link loss by using PSTN- based survivability. Service providers can offer IP and serial data transport alongside voice services, while ensuring high quality voice through advanced QoS technologies.

