net.™
Network Equipment Technologies

NET VX Series Voice Exchange™

VX1200 Unified Communications Gateway

- Enables seamless migration to VoIP, Unified Messaging and Unified Communications

- Reduces costs by enabling voice infrastructure consolidation & elimination

- Supports enterprise mobility with SIP WiFi devices

- Microsoft UC Qualified
  (NET's VX Series products are qualified in Microsoft's Unified Communications Open Interoperability Program for Direct SIP)

ENTERPRISE-CLASS INTEGRATION FOR UNIFIED COMMUNICATIONS

Traditional Enterprise communications are silos with multiple networks with their own dedicated platforms, protocols, and devices. Additionally, organizations may have diverse systems leading to large and complex networks.

Today, voice, video, messaging, and other web based applications are converging on a single data network. Functions such as IP Telephony, calendaring, Instant messaging, video, conferencing, wireless, rich presence, and other collaboration tools collectively called Unified Communications is helping organizations improve employee productivity.

While migrating to Unified Communications, organizations need solutions that help protect their investments, and a solution that guarantees network reliability, high-availability, branch survivability, and security.

A LOWER COST SOLUTION THAT DRIVES EVEN GREATER COST SAVINGS

The VX1200 provides a lower cost solution for enterprise VoIP, unified messaging and unified communications. Enterprises can leverage the VX1200 to reduce existing infrastructure by consolidating and eliminating expensive voicemail and PBX infrastructure. With support for enterprise mobility and SIP-Wifi devices, the VX1200 can also enable companies to dramatically reduce cellular service costs.

SECURITY WITH SCALABILITY

The VX1200's optional hardware-based Security Acceleration Module, provides scalable, high-performance IPSEC, SRTP & TLS encryption for voice over IP communications.

FLEXIBLE, EXPANDABLE, AND DESIGNED FOR THE FUTURE

The advanced features of the VX1200 Unified Communications Gateway provide capabilities that go beyond the limitations of VoIP media gateways. The VX1200 is a fully integrated single box solution designed to handle the complexity and challenges that are common when introducing unified communications into today's enterprise voice networks.

The VX1200 supports industry's broadest set of optional software modules to provide advanced gateway functions such as SIP trunking, integrated session border control, bandwidth optimization, hardware accelerated security, and remote survivability. These advanced options enable the VX1200 to deliver what enterprises need for secure migration to IP-based voice networking, unified communications and enterprise mobility while providing the interoperability to existing voice networks and PBX infrastructure.

ABOUT NET

For nearly a quarter of a century, Network Equipment Technologies, Inc. (NET) has provided voice and data communications equipment for multi-service networks requiring high degrees of versatility, inter-operability, security and performance. NET's broad family of products are purpose-built for mixed-service, multi-protocol networks; bandwidth-sensitive site communications; high performance, security-sensitive transmissions; and converged communications. The Company's NX (network exchange) and VX (voice exchange) products enable interoperability and integration with existing networks for seamless migration to secure IP-based voice and data communications.

VX1200 BASE SPECIFICATIONS

Interfaces
- Capacity - 2 slots for digital modules Capacity - 2 slots for digital modules
- T1 / E1 digital modules - 1, 2, and 4 port versions, 8 port maximum per node
- Ethernet - 6 x 10/100 Ethernet ports
- RS232 - Console for setup and debugging

VoIP Signaling
- SIP - RFC3261 compliant

TDM Signaling
- CAS: MF-R1, T1 CAS (E&M, Loopstart), E1 CAS (MFC-R2)
- ISDN: AT&T 4ESS, AT&T 5ESS, Nortel DMS-100, Euro ISDN (ETSI 300-102), QSIG, NTT InsNet(Japan), Harris 20/20, CoreNet and ANSI National ISDN-2 (NI-2)

Voice Features
- Voice compression: G.711 (A-law and μ-law), G.723 (5.3 or 6.3 Kbps), G.729A,G.729AB, G.726 (16, 24, or 32 Kbps), G.727 (16, 24, or 32 Kbps)
- Automatic call type detection/pass through for voice/modem/fax
- RFC2833 in-band DTMF signaling over RTP
- G.168 echo cancellation
- T.38 real time fax relay with CNG tone detection
- Voice activity detection, silence suppression, Automatic comfort noise generation
- Call progress tone generation and detection - Dial tone, busy, ring-back, and congestion
- RTP / RTCP

Routing
- Dynamic flexible call routing with up to 10000 entries
- Link quality management (LQM) via ICMP or SIP-OPTIONS
- Multiple IP to IP and TDM to IP routing
- Multiple routing tables per channel, per port
- Load balancing
- DiffServ-based IP QoS support (marking, queuing and scheduling)
- 802.1p based Layer 2 QoS support
- Static IP routing
- Carrier selection via Least cost routing
- Local session control & management

Security
- Transport Layer Security (TLS)
- Built-in VOIP aware firewall
- SSH
- Smart card authentication
- Hardened operating system
- Denial of service (DOS) attack mitigation and protection
- Advanced remote access control
- Spoofing detection and avoidance
- DNIS, CLID, call type pre-authentication

Configuration/Network Management
- SNMPv2 - traps, alarms, and statistics
- VXbuilder™ (GUI and Wizard based provisioning tool)
- VXwatch™ (real-time monitoring tool)
- Network logging (syslog)
- Active Directory User Integration

Chassis Data
- Rack mount: 19in. (483mm) rack mountable with EIA and telco rack support
- Normal operating conditions: 32F to 104F (0C to 40C)
- AC power: 100 - 240 Volt, 50/60 Hz, 200 Watt
- Humidity: 10% to 90% non-condensing

EMC & Safety Compliance
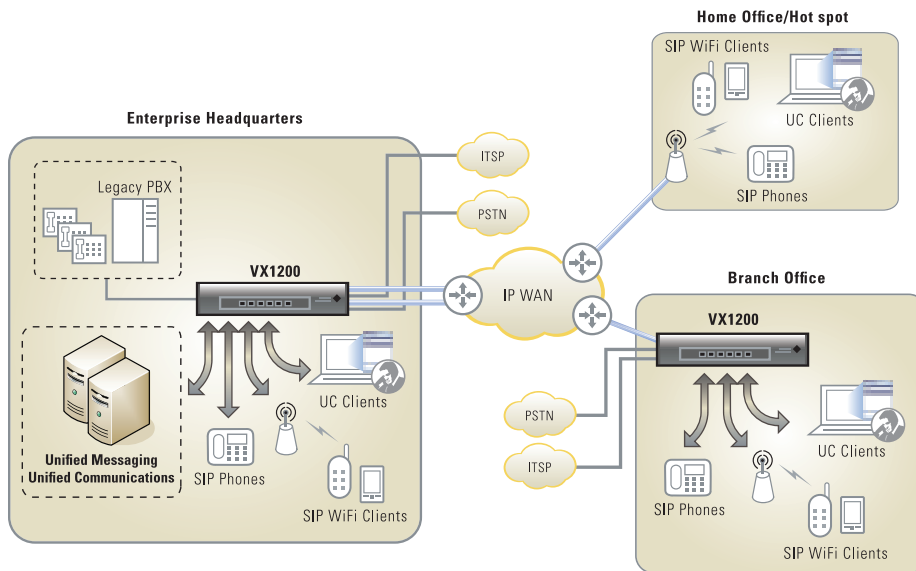- Meets EN 300 386, EN55022, EN55024, EN60950, UL60950, CB

VX1200 OPTIONAL SOFTWARE MODULES

VoIP Signaling
- H.323v3 - Interconnection with H.323 based devices
- BESTflow - Bandwidth saving VOIP for low speed links
- SIP Trunking (ITSP) support
- IP to IP mediation
- Session Limit Controller
- SIP registrar
- SIP registrant
- SIP Proxy-like mode with survivability and local switching

Security
- Secure RTP (SRTP) - Full capacity hardware accelerated
- IPSec
- MD5 digest authentication

Home Office/Hot spot
SIP WiFi Clients
UC Clients
SIP Phones
Enterprise Headquarters
Legacy PBX
ITSP
PSTN
VX1200
IP WAN
UC Clients
Unified Messaging Unified Communications
SIP Phones
SIP WiFi Clients
Branch Office
VX1200
PSTN
ITSP
UC Clients
SIP Phones
SIP WiFi Clients

ENTERPRISE-CLASS INTEGRATION OF UNIFIED COMMUNICATIONS WITH TELECOM INFRASTRUCTURE: NET's VX Series and Tenor Series Media Gateways provide full connectivity between Unified Communications and Telecom infrastructure. NET's portfolio meets the Media Gateway requirements for UC deployments for large to small enterprises for their headquarters and branch office locations.

WEBSITE: Please visit our website at www.net.com for information on how to contact us, place an order or get more information on NET solutions.