







## **Next-Generation Firewall for Enterprise Networks**

## CR750iNG-XP

Data Sheet



The mobilization of workforce has led to demand for anytime-anywhere access to network resources. This, along with increasing number of users like customers and partners connecting to an enterprise network from outside, and trends like rise in number of network users and devices, application explosion, virtualization, and more are leading to loss of security controls for enterprises over their networks. Cyberoam Next-Generation Firewalls (NGFW) with Layer 8 Identity-based technology offer actionable intelligence and controls to enterprises that allow complete security controls over L2-L8 for their future-ready security. Cyberoam's Human Layer 8 acts like a standard abstract layer that binds with real Layers 2-7, enabling organizations to regain lost security controls.

Cyberoam CR750iNG-XP offers inline application inspection and control, website filtering, HTTPS inspection, Intrusion Prevention System, VPN (IPSec and SSL) and granular bandwidth controls. Additional security features like WAF, Gateway Anti-Virus, Anti-Spam are also available. The FleXi Ports (XP) available in CR750iNG-XP appliances offer flexible network connectivity with I/O slots that allow additional Copper/Fiber 1G/10G ports on the same security appliance.

Cyberoam security appliances offer high performance, assured Security, Connectivity and Productivity and an Extensible Security Architecture (ESA) for future-ready security in enterprises.















**Next-Generation Firewall** for Enterprises:

Offering Actionable Intelligence and Controls

Cyberoam's Layer 8 Technology treats "User Identity" as the 8th Layer in the protocol stack

L8 L7 **Application** Presentation ASCII, EBCDIC, ICA L5 Session L4 **Transport** Network Data Link L2 00-17-BB-8C-E3-E7 L1 Physical

Cyberoam NGFW offers security across Layer 2-Layer 8 using Identity-based policies

Cyberoam NGFWs assure Security, Connectivity, Productivity

# Security

## **Network Security**

- Firewall
- Intrusion Prevention System
- Web Application Firewall

## **Administrative Security**

- Next-Gen UI
- iView- Logging & Reporting

## **Content Security**

- Anti-Virus/Anti-Spyware
- Anti-Spam (Inbound/Outbound)
- HTTPS/SSL Content Security



# Connectivity

## **Business Continuity**

- Multiple Link Management
- High Availability

## **Network Availability**

- 3G/4G/WiMAX Connectivity

## **Future-ready Connectivity**

- "IPv6 Ready" Gold Logo
- FleXi Ports (XP)



# **Productivity**

## **Employee Productivity**

- Content Filtering
- Instant Messaging Archiving & Controls

## **IT Resource Optimization**

- Bandwidth Management
- Traffic Discovery
- Application Visibility & Control

## **Administrator Productivity**

- Next-Gen UI



# **Specification**

Maximum number of Available Ports	24
Fixed Copper GbE Ports	8
Number of Slots for FleXi Ports Module	2
Port options per FleXi Ports Module	8/8/4
(GbE Copper/GbE Fiber/10GbE Fiber)	
Console Ports (RJ45)	1
Configurable Internal/DMZ/WAN Ports	Yes
USB Ports	2
Hardware Bypass Segment"	2

## System Performance

## Stateful Inspection Firewall

- Layer 8 (User Identity) Firewall Multiple Security Zones Location-aware and Device-aware Identity-based
- Access Control Policy
   Access Control Criteria (ACC): User-Identity, Source and Destination Zone, MAC and IP address, Service
   Security policies IPS, Web Filtering, Application
- Filtering, Anti-virus, Anti-spam and QoS
   Country-based Traffic Control
   Access Scheduling

- Access Scheduling
   Policy based Source and Destination NAT, Gateway
  Specific NAT Policy
   H.323, SIP NAT Traversal
   DoS and DDoS attack prevention
   MAC and IP-MAC filtering

- Spoof Prevention

- Intrusion Prevention System
   Signatures: Default (4500+), Custom
   IPS Policies: Pre-configured Zone-based multiple policies, Custom
  - Filter based selection: Category, Severity, Platform and
- Target (Client/Server)
   IPS actions: Recommended, Allow Packet, Drop Packet,
- Disable, Drop Session, Reset, Bypass Session
- User-based policy creation
   Automatic signature updates via Cyberoam Threat Research Labs
- Protocol Anomaly Detection
   SCADA-aware IPS with pre-defined category for ICS and SCADA signatures

- Application Filtering
   Layer 7 (Applications) & Layer 8 (User Identity) Control and Visibility
- Inbuilt Application Category Database
   Control 2,000+ Applications, classified in 21 Categories
- Filter based selection: Category, Risk Level, Characteristics and Technology
   Schedule-based access control

- Securing SCADA Networks
   SCADA/ICS Signature-based Filtering for Protocols Modbus, DNP3, IEC, Bacnet, Omron FINS, Secure DNP3, Longtalk
  - Control various Commands and Functions

# Administration & System Management - Web-based configuration wizard - Role-based Access control

- Support of API Firmware Upgrades via Web UI
- Web 2.0 compliant UI (HTTPS)
- Command Line Interface (Serial, SSH, Telnet) SNMP (v1, v2, v3)
- Multi-lingual : English, Chinese, Hindi, French, Japanese Cyberoam Central Console (Optional)

## **User Authentication**

- Internal database
- AD Integration and OU-based Security Policies
- Automatic Windows Single Sign On
   External LDAP/LDAPS/RADIUS database Integration
- Thin Client support
   2-factor authentication: 3rd party support
   SMS (Text-based) Authentication

## Layer 8 Identity over IPv6

- Secure Authentication AD, LDAP, Radius
- Clientless Users
- Authentication using Captive Portal

- Logging/Monitoring
   Real-time and historical Monitoring
- Log Viewer IPS, Web filter, WAF, Anti-Virus, Anti-Spam, Authentication, System and Admin Events
   Forensic Analysis with quick identification of network attacks and other traffic anomalies
- Syslog support
- 4-eye Authentication

- Cyberoam On-Appliance Cyberoam-iView Reporting

  Integrated Web-based Reporting tool - Cyberoam-iView

  1,200+ drilldown reports

  Compliance reports - HIPAA, GLBA, SOX, PCI, FISMA

  Zone based application reports

  Default Dashboards: Traffic and Security

  Username, Host, Email ID specific Monitoring

- Dashboard
- Reports Application, Internet & Web Usage, Mail Usage, Attacks, Spam, Virus, Search Engine and more
  - Client Types Report including BYOD Client Types
  - Export reports in - PDF, Excel, HTML

- Email notification of reports
   Report customization (Custom view and custom logo)
   Supports 3rd party PSA Solution ConnectWise

# Virtual Private Network - IPSec, L2TP, PPTP

- Encryption 3DES, DES, AES, Twofish, Blowfish,
- Serpent
- Hash Algorithms MD5, SHA-1 Authentication: Preshared key, Digital certificates IPSec NAT Traversal

- Dead peer detection and PFS support
   Diffie Hellman Groups 1, 2, 5, 14, 15, 16
   External Certificate Authority support
- Export Road Warrior connection configuration
   Domain name support for tunnel end points
   VPN connection redundancy

- Overlapping Network support
   Hub & Spoke VPN support
   Threat Free Tunnelling (TFT) Technology

- TCP & UDP Tunnelling
   Authentication AD, LDAP, RADIUS, Cyberoam (Local)
   Multi-layered Client Authentication Certificate,
- Username/Password
- User & Group policy enforcement
   Network access Split and Full tunnelling
- Browser-based (Portal) Access Clientless access
   Lightweight SSL VPN Tunnelling Client
   Granular access control to all the enterprise network
- Administrative controls Session timeout, Dead Peer
- Detection, Portal customization TCP based Application Access HTTP, HTTPS, RDP,
- TELNET, SSH

- Web Filtering
   On-Cloud Web Categorization
   Controls based on URL, Keyword and File type
   Web Categories: Default (89+), External URL Database,
- Custom
   Protocols supported: HTTP, HTTPS
- Block Malware, Phishing, Pharming URLs Block Java Applets, Cookies, Google Cache pages
- CIPA Compliant
- Data leakage control block HTTP and HTTPS upload
- Schedule-based access control
- Safe Search enforcement, YouTube for Schools

- Bandwidth Management
   Application, Web Category and Identity based
- Bandwidth Management
   Guaranteed & Burstable bandwidth policy
- Application & User Identity based Traffic Discovery
- Data Transfer Report for multiple Gateways

- Web Application Firewall
- Web Application Firewaii

   Positive Protection model

   Unique "Intuitive Website Flow Detector" technology

   Protection against SQL Injections, Cross-site Scripting
  (XSS), Session Hijacking, URL Tampering, Cookie
  Poisoning etc.

   Support for HTTP 0.9/1.0/1.1

   Back-end servers supported: 5 to 300 servers

- Gateway Anti-Virus & Anti-Spyware
   Virus, Worm, Trojan Detection and Removal
- Spyware, Malware, Phishing protection
   Automatic virus signature database update
   Scans HTTP/S, FTP, SMTP, POP3, IMAP, VPN Tunnels
   Customize individual user scanning

- Self Service Quarantine area
- Scan and deliver by file size
  Block by file types

- Gateway Anti-Spam
   Inbound and Outbound Scanning
   Real-time Blacklist (RBL), MIME header check
- Filter based on message header, size, sender, recipient
   Language and Content-agnostic spam protection using
- RPD Technology
   Zero Hour Virus Outbreak Protection
   Self Service Quarantine area
   IP address Black list/White list

- Spam Notification through Digest IP Reputation based Spam filtering

## Wireless WAN

- USB port 3G/4G and WiMAX Support Primary WAN link WAN Backup link

- Networking
   WRR based Multilink Load Balancing
- Automated Failover/Failback
   Interface types: Alias, Bridge Pair, LAG (port trunking), VLAN, WLAN, WWAN
- DNS-based inbound load balancing
   IP Address Assignment Static, PPPoE (with Schedule Management), L2TP, PPTP & DDNS, Client, Proxy ARP,
- Multiple DHCP Servers support, DHCP relay
   Supports HTTP Proxy, Parent Proxy with FQDN
   Dynamic Routing: RIP v1& v2, OSPF, BGP, Multicast
- Bytanin Routing. Rif Vi V2, OSFF, BGF, Moliticast Forwarding
   Support of ICAP to integrate third-party DLP, Web Filtering and AV applications
   IPv6 Support:
   Dual Stack Architecture: Support for IPv4 and IPv6
  - Protocols
  - Management over IPv6
  - IPv6 routing protocols IPv6 tunneling (6in4, 6to4, 6rd, 4in6) Alias and VLAN
  - DNSv6 and DHCPv6 Services Firewall security over IPv6 traffic

- High Availability
- Active-Active
- Active-Passive with state synchronization Stateful Failover with LAG Support

# 

- Certification - Common Criteria - EAL4+
- ICSA Firewall Corporate Checkmark Certification
- VPNC Basic and AES interoperability
- IPv6 Ready Gold Logo - Global Support Excellence - ITIL compliance (ISO 20000)

# **Hardware Specifications**

Memory Compact Flash HDD 250GB or higher

## Compliance FCC

Environmental

Operating Temperature
Storage Temperature
Relative Humidity (Non condensing)

**Dimensions** H x W x D (inches) H x W x D (cms) 1.7 x 17.44 x 18.75 4.4 X 44.3 X 47.62 5.1 kg, 11.24 lbs Weight

CF

Power Input Voltage 100-240 VAC Consumption
Total Heat Dissipation (BTU)
Redundant Power Supply 208W 345 Yes

'Additional purchase required. FleXi Ports are not HOT swappable. Appliance needs to be turned off prior to changing the FleXi Ports Module. "If Enabled, will bypass traffic only in case of power failure. "Antivirus, IPS and Fully Protected Throughput performance is measured based on HTTP traffic as per RFC 3511 guidelines. Actual performance may vary depending on the real network traffic environments." NGFW throughput is measured with Firewall, IPS, and Web & Application Filtering features turned on. "For details, refer Cyberoam's Technical Alliance Partner list on Cyberoam website." Additional Purchase Required. For list of compatible platforms, refer to OS Compatibility Matrix on Cyberoam DOCS.

0 to 40 °C 0 to 70 °C 10 to 90%