

The NetEqualizer 5000 Series is our powerhouse bandwidth shaping solution for businesses ready for the next generation in networking. Designed for massive deployments, it is a rack-mountable unit capable of handling up to 60,000 network users on internet links of up to ten (10) gigabits.

Just like all of our NetEqualizer models, the NE5000 performs QoS through our proprietary “equalizing” technology, utilizing algorithms to achieve fairness across network users. Our NetEqualizer product family optimizes critical network bandwidth resources for any organization that purchases bandwidth in bulk and then redistributes or resells that bandwidth to disparate users with competing needs.



NetEqualizer 5000 Features:

- Affordable. Low-cost, available factory-direct with in-house engineering support.
- Equalizes up to 10 gigabits traffic (full duplex).
- Ethernet connectivity standard via 10 gigabit single mode or multi-mode fiber.
- Built-in management port.
- Failover standard. Built-in bypass ports take over upon failover. Standard redundant power supply.
- Shared or individual bandwidth limits can be defined by individual IP, Class B or Class C subnets, VLANs, Pools, or MAC address.
- QoS implemented via behavior-based bandwidth shaping. “Fairness” algorithms give priority to latency-sensitive applications, such as VoIP, web applications, web browsing, chat and e-mail over large file downloads and video that can clog your network.
- Supports up to 20,000 simultaneous bandwidth rules.
- Built-in Dynamic Real-Time Reporting (RTR) provides traffic monitoring in real-time for both IPv4 & IPv6. Sortable & searchable reports include active connections, top 10 flows, and penalized flows.
- Trend analysis and graphs included via RTR Traffic History. Traffic History graphs bandwidth usage by IP, Pool, VLAN, or your network using up to four (4) weeks of data. Export data for longer analysis.
- Turn-key behavior-based control and containment of all common encrypted and unencrypted Peer-to-Peer (P2P) applications using Connection Limits by IP or subnet. P2P Locator reports provide visibility to suspected P2P traffic so that you can contain it.
- CALEA Compliant. Acts as a CALEA Probe via packet capturing & forwarding.
- **NEW** Use DDoS Monitor to identify suspicious, potentially malicious activities. Optional DDoS Firewall can be used to contain suspected DDoS attacks, protecting your network from wide-scale brownouts, traffic storms, and worms.
- Plug-n-play, low maintenance solution. Quick and easy set-up, usually within hours. Configure via NetEqualizer GUI or command-line interface. Define four key parameters for out-of-the-box equalizing.
- Ability to create and enforce individual bandwidth quotas by customer IP or subnet. User Quota API toolkit provides custom configuration, monitoring/alarming, and reporting capabilities.
- Acts as a Transparent Bridge on your network.
- NetEqualizer Caching Option (NCO) available as an add-on module. NCO caches all port 80 traffic file sizes from 2MB to 40MB, including YouTube videos. When NCO is activated, a squid proxy server and web cache daemon are loaded, along with proprietary NetEqualizer Caching configuration and integration software and an internal solid-state drive (SSD).
- Reasonably-priced, yearly software upgrade and support contracts (NSS) available in 1 year to 4 year increments.
- Hardware warranties (NHW) available to protect your hardware investment, for up to 4 years.

NetEqualizer Series Specifications

NetEqualizer Model	NE3000	NE4000	NE5000
Capacity			
Number of Users	20,000	40,000	60,000
Connections/Flows per Minute	2,000,000	3,000,000	5,000,000
Maximum Number of Rules	10,000	20,000	20,000
Throughput (full duplex)	20Mbps to 1Gbps (20Mbps, 50Mbps, 100Mbps, 150Mbps, 350Mbps, 500Mbps, 750Mbps, 1Gbps)	1Gbps 5Gbps	10Gbps
Latency	< 1 millisecond (ms)		
Pools / VLANs / Subnets	250	250	250
Interfaces			
Network Interfaces (in/out) (internal/external)	2 - copper 10/100/1000 Fiber optional: 1Gbps single mode (SM) or multi-mode (MM)	2 - copper 10/100/1000 10 Gbps copper optional Fiber optional: 1Gbps or 10Gbps single mode (SM) or multi-mode (MM)	2 - fiber 10,000 Failover bypass ports standard. Choose 10Gbps single mode (SM), multi-mode (MM)
Device Management	Dedicated management port standard.		
Interoperability	SNMP MIB		
Features			
Equalizing	Yes. Behavior-based shaping via "fairness" algorithms gives priority to latency-sensitive applications, such as VoIP, web applications, web browsing, & e-mail over bandwidth hogs that can clog your network.		
Bandwidth Shaping & QoS	By IP, subnet, MAC, VLAN, and Bandwidth Pools		
Bandwidth Limiting	1) Hard Limits by IP (with optional Bursting), subnet, or MAC address 2) Shared Bandwidth Pools or VLANs 3) User Bandwidth Quotas by customer IP or subnet		
P2P Control & Containment (encrypted & unencrypted)	Yes. Equally effective on both encrypted and unencrypted P2P. Implemented via Connection Limits.		
Streaming Video Prioritization	Yes. Available for internally or externally hosted video servers.		
Caching	yes (optional NCO).		
DDoS Monitor & Firewall	yes. DDoS Monitor standard. DDoS Firewall available (optional).		
Failover	1) Failover: Use STP mode on your own switch. 2) Failover: Install a third-party switch in STP mode (available from APconnections).	Built-in. Failover bypass ports standard.	
Full Redundancy	Install Secondary NetEq in active:passive mode; hot swappable via STP.		
Redundant Power	no	no	yes, standard.
Logging	Yes. All shaping activities monitored and reported via NetEqualizer Log.		
Dynamic Real-Time Reporting (RTR)	Active Connections Reports enable you to see what is going on in your network at this moment, in order to actively monitor and manage your network usage. Active Connections tabular reports are sortable and searchable real-time views of all connections or penalties active on the NetEqualizer. They include Active Connections (IPv4 or IPv6), P2P Locator, Active Penalties, and Lookups by IP (country, DNS, rules).		
Trend Analysis & Graphs	Traffic History Reports provide up to 4 weeks of data in Bandwidth Graphs by IP, Pool/VLAN, or the entire network. Traffic History Reports provide you with a graphical view into the trends of bandwidth usage and traffic shaping on your network across time. This can help you in network design and capacity planning activities. Includes Top 10 Flows, Traffic History by IP/Pool/VLAN, and Overall Traffic and Penalties. You can also Export Data to your own reporting data warehouse for further analysis.		
Dimensions			
Rack Mountable	yes	yes	yes - rails required (included)
Height	1.7 in (4.3 cm)	1.7 in (4.3 cm)	1.7 in (4.3 cm)
Width	16.8 in (42.6 cm)	16.8 in (42.6 cm)	17.2 in (43.7 cm)
Depth (length)	14.0 in (35.6 cm)	14.0 in (35.6 cm)	16.9 in (42.9 cm)
Weight	11.1 lbs (5.05 kg)	11.1 lbs (5.05 kg)	18 lbs (8.16 kg)
Power			
Power Rating	132W	180W	400W Redundant Power Supplies
Operating Temperature & Relative Humidity	Operating Temp: 10° - 35°C (50° - 95°F) Operating RH: 8% - 90% (non-condensing)		
Heat Dissipation	450.40 BTU/hr	617.58 BTU/hr	1200 BTU/hr
Power Supply	100-240 VAC, 50-60Hz, 4 Amp max		
Safety and Certifications			
Safety, Emission, & Power Supply	USA - UL listed, FCC Canada - CUL listed Germany - TUV certified Europe/CE Mark EN 60950/IEC 60950-Compliant CCC certified		USA - UL listed, FCC Canada - CUL listed Germany - TUV Certified Europe/CE Mark EN 60950/IEC 60950-Compliant

About APconnections

APconnections is an innovation-driven technology company that delivers best-in-class network traffic management solutions to give our customers faster networks, with zero maintenance, at the best prices.

We design and develop NetEqualizer bandwidth shaping appliances that solve Internet congestion issues while remaining easy-to-install, affordable, and low maintenance. We built our behavior-based "equalizing" technology to optimize critical network bandwidth resources.

APconnections is based in Lafayette, Colorado, USA. We released our first commercial offering in July 2003, and since then thousands of customers all over the world have put our products into service. Today, our flexible and scalable solutions can be found in Fortune 500 companies, major universities, Internet providers, small businesses, non-profits, military, and government agencies on six (6) continents.

About the NetEqualizer Product Family

NetEqualizer appliances are behavior-based traffic shaping appliances designed to optimize your Internet connection, while giving priority to your important business and data applications. Our flexible, scalable, and affordable bandwidth shaping products can be deployed in both corporate and Internet provider networks.

NetEqualizer is available in a range of configurations from 20Mbps up to 10Gbps.