Barracuda

Barracuda CloudGen Firewall

Protecting cloud connected users, network workloads and devices wherever they reside

Product Overview

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About Barracuda Networks

Barracuda Networks provides cloud-connected security and storage solutions that simplify IT. These powerful, easy-to-use, and affordable solutions are trusted by more than 200,000 organizations worldwide. Barracuda's expansive product portfolio delivers protection against threats targeting email, web, and network intrusions, as well as products that improve application delivery, network access, message archiving, backup, and data protection, on-premises or in the cloud.

Barracuda's high-value, subscription-based IT solutions provide end-to-end network and data security that helps customers address security threats, improve network performance, and protect and store their data.

Barracuda's international headquarters are in the heart of northern California's Silicon Valley.

Barracuda CloudGen Firewall

The first cloud-generation firewall

More and more companies all over the world adopt and integrate public cloud offerings into their network. But “before you can work in the cloud, you have to get to cloud” has never been more true than today.

Shifting workloads to cloud based services, regardless if Software as a Service (SaaS), Platform as a Service (PaaS) or Infrastructure as a service (IaaS) exposed a different set of requirements WAN edge and network security devices today need to address: Optimizing connectivity for business critical applications, enforcing higher security levels than ever and reducing cost by moving away from expensive MPLS lines.

Because traditional WAN edge and security products did not adapt to these new challenges, a new set of solutions enabling cost efficient connectivity across the cloud-enabled WAN has emerged: SD-WAN.

However, SD-WAN typically does not address security-related aspects. It is considered more like a connectivity solution that works besides the security solution - at best. Just like different species.

Barracuda CloudGen Firewall is the first to combine full next-generation security with the connectivity optimization and cost savings potentials of a full SD-WAN solution onto one single easy to manage hardware, virtual or cloud based appliance. CloudGen Firewall improves site-to-site connectivity and enables uninterrupted access to applications hosted in the cloud all while simplifying the administration of network operations for enterprises and managed services providers.

CloudGen Firewall achieves this by tightly integrating a comprehensive set of next-generation firewall technologies, including layer 7 application profiling, intrusion prevention, web filtering, advanced threat and malware protection, spam protection, and network access control. On top of these next generation firewall capabilities, CloudGen Firewall’s specialized and highly resilient remote access technology outperforms any other SD-WAN.

All pieces of the solution are centrally manageable across all platforms and release versions, reducing ongoing administrative overhead and ensuring policy compliance and enforcement across the wide area network.

Benefits at a glance

Consolidated security without compromise: All CloudGen Firewall models and deployment options provide comprehensive next-generation firewalling including application control and user awareness, full mail & web security gateway functionality, malware protection, botnet and spyware detection, typosquatting & link protection, sandboxing (Advanced Threat Protection), URL filter, and file type policy enforcement. All this combined with unbeatable network security and packed into a single, powerful appliance, virtual or public cloud image. The tight integration of web security and network security features enables advanced functionalities, such as prioritizing certain application traffic based on user/group info and time information, and allowing certain applications to go out via predefined uplinks only.

Cloud ready: The ongoing shift of IT workloads to cloud services requires a reliable, cost-effective extension of the company WAN to the cloud. This applies to headquarters as well as direct Internet breakouts at every branch location. CloudGen Firewall models come fully featured for all common cloud IaaS providers, as virtual appliances, and in a variety of hardware appliances for even small offices. Hybrid WAN and cloud-only networks can thereby also benefit from CloudGen Firewall.

Secure SD-WAN capabilities: Significantly increase uplink capacity and application performance by aggregating up to 24 active, load-sharing connections of any type (broadband, 4G, MPLS between locations). Dynamic packet loss prevention, traffic compression, and application acceleration increase available bandwidth far beyond the sum of all available physical uplinks combined. Dynamic, on-the-fly adjustments of QoS and application usage policies depending on dynamic bandwidth measurement make sure there will always be enough bandwidth for business-critical applications.
And with zero-touch deployment even the largest rollouts are easy to execute.

ZTNA and remote access: For traditional remote access requirements via encrypted connectivity Barracuda CloudGen Firewall includes zero-touch for remote access, unified remote-access clients for macOS, Windows, iOS, and Android devices to make sure employees enjoy fast and reliable access to the corporate network. For increased security and direct application access Barracuda CloudGen Firewall is integrated into the ZTNA concept of the Barracuda SecureEdge Platform. This enables fast deployment of ZTNA for all types of applications without the need for separate installation of proxy services or back-hauling of confidential customer data via a third party web solution.

Once-only central management: The entire CloudGen Firewall infrastructure, regardless if only a few devices or a couple thousand distributed across thousands of locations and multiple deployment types, can be deployed, managed and monitored from a single pane of glass through the Barracuda Firewall Control Center. Managing several thousands of firewalls requires the same effort as managing one firewall.

Unparalleled cost savings: CloudGen Firewall consolidates security, SD-WAN, link balancing, and WAN compression disciplines into a single appliance that provides significant cost savings due to the reduction or elimination of expensive leased lines and consolidation of security devices. Even for small rollouts of only a few devices, customers achieve a return of investment after just a few months with potential savings of hundreds of thousands of dollars over the next years.

Analytics and reporting: Staying secure and seamlessly connected requires you to have up-to-date data. The vast amount of data coming from different origins and in different formats often needs manual processing, an approach that is both error prone and costly. Barracuda Firewall Insights automates these challenging tasks.

Perimeter security

Full application awareness

Mobile devices, online applications, social networks, and streaming media have caused an enormous increase in non-business network data traffic, pushing bandwidth capacities to their limits and causing degradation in performance of business-critical applications. Application control built into every Barracuda CloudGen Firewall allows admins to accurately identify and control thousands of protocols and applications (like software updates, BitTorrent, Skype, instant messaging etc.) crossing the network and not visible with regular port-based firewalls. CloudGen Firewall gives administrators granular control over applications. They can define rules for forwarding application traffic using the most suitable uplink based on type of application, user, content, available bandwidth, link status, time of day, and even geographical location. Unsanctioned applications can be reliably blocked or bandwidth throttled to an acceptable level.

Deep application context

Deep application context analysis enables deeper inspection of the application data stream by continually evaluating the actual intentions of applications and the respective users. For example, if a user attempts to use an application like “HydeMyAss” privacy VPN to bypass traditional web filtering, Barracuda CloudGen Firewall cannot only block the application itself, but also report the website the user originally attempted to connect to. For more details, please click here...

Custom application definitions

On top of thousands of applications that are delivered out of the box and constantly updated, Barracuda CloudGen Firewall provides an easy way to create user-defined application definitions. For example, admins can allow just a very limited set of Facebook apps while blocking all others, or assign more bandwidth to homegrown or legacy business systems.

For more details, please click here...

Application-based routing

A unique combination of next-generation security and adaptive WAN routing technology allows CloudGen Firewall to dynamically assign available bandwidth, uplink, and routing information based not only on protocol, user, location, and content, but also on applications, application categories, and even web content categories. This keeps expensive, highly available lines free for business- and mission-critical applications, while significantly reducing response times and freeing up additional bandwidth.

For more details, please click here...

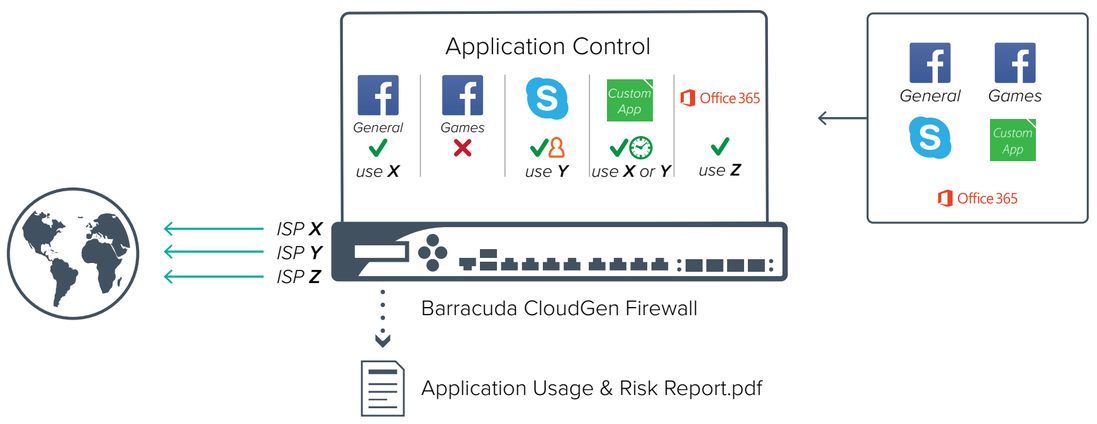


Figure 1 - Application-based routing with Barracuda CloudGen Firewall

Real-time application reporting and manipulation

For on-the-fly reporting and drill-down capabilities, Barracuda CloudGen Firewall comes with real-time and historical application visibility that show live and recent application traffic on the corporate network that can be interactively filtered and drilled down. This helps admins to decide which application connections should be given bandwidth prioritization and who is currently violating acceptable use policies.

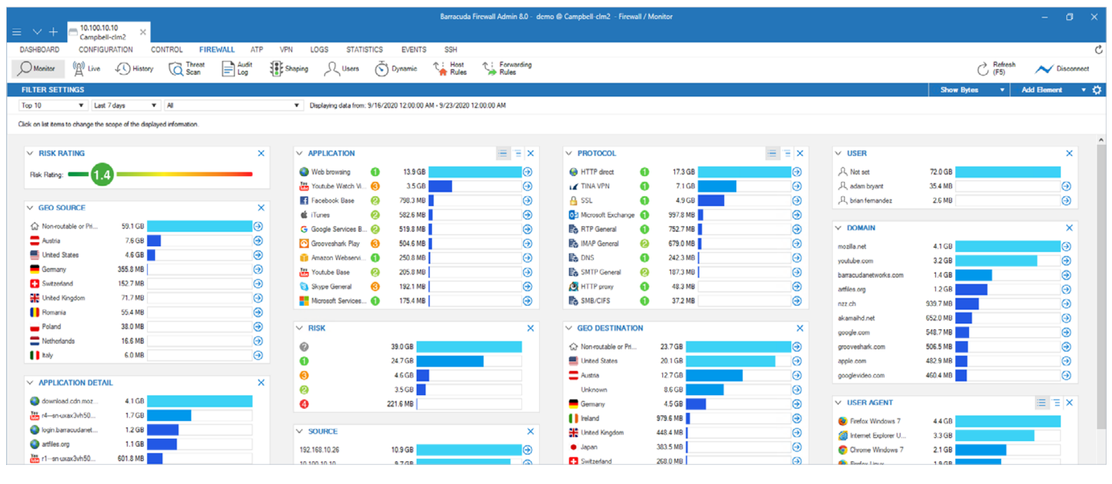


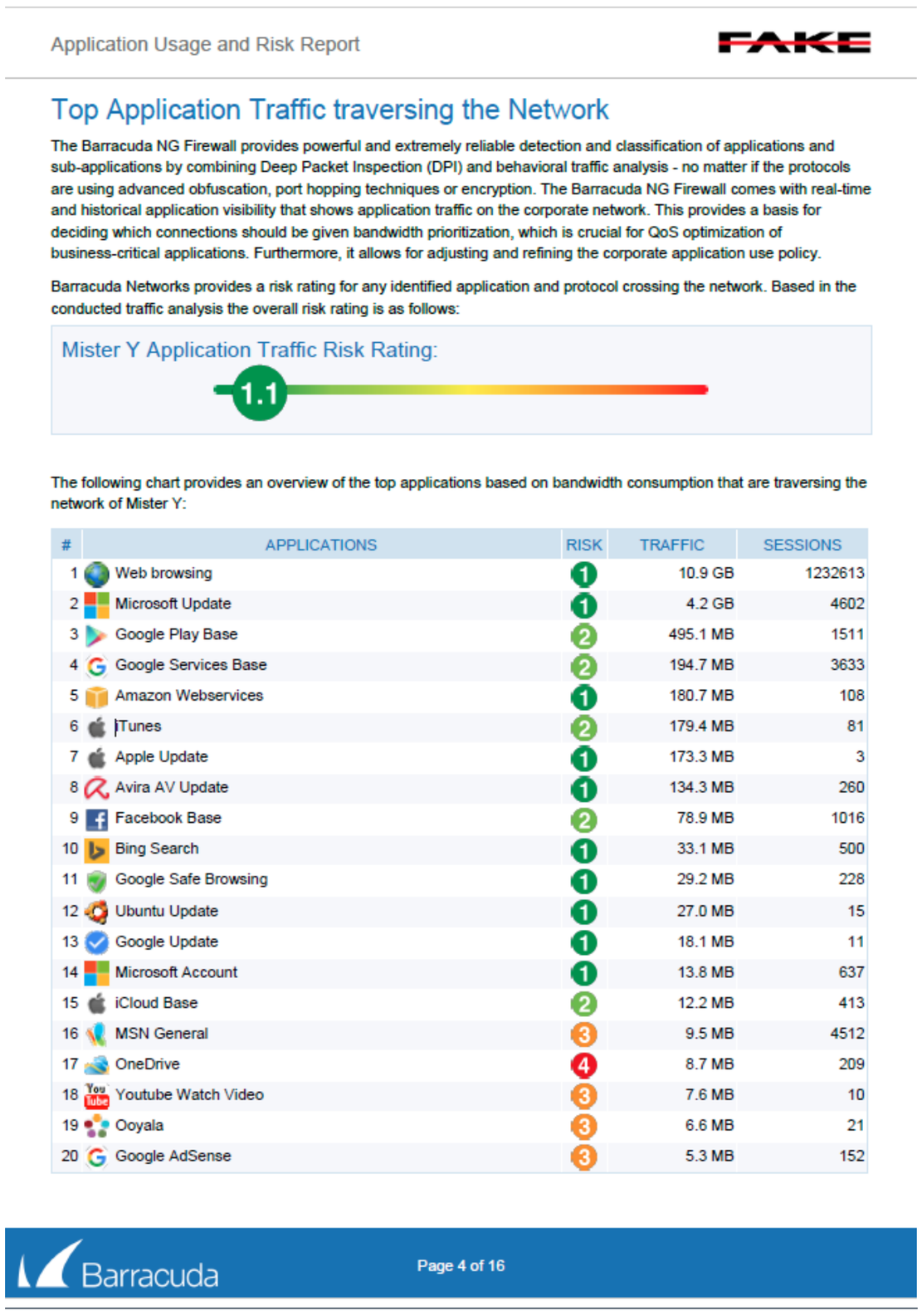
Figure 2 - Real-time application reporting

Application risk and usage report

The application usage and risk report is one of many predefined reports in the included Barracuda Firewall Report Creator tool that provides automated reports and risk analysis based on the network traffic traversing the network. It gives an overview of how effective the currently deployed policies are in detecting and enforcing corporate application usage policies and even provides recommendations of what actions should be taken to improve these policies.

Barracuda CloudGen Firewall can easily be deployed risk free into existing networks to collect data required for generating such reports by using either a layer-2 network bridge or SPAN port / port mirroring deployment. No matter what method is used, collecting the traffic has no impact on the firewall performance at all.

Creating reports can be started manually (on-demand) or scheduled (including automated email distribution). And - of course - reports are fully customizable to comply with possible branding requirements.



Application Usage and Risk Report

FAKE

Top Application Traffic traversing the Network

The Barracuda NG Firewall provides powerful and extremely reliable detection and classification of applications and sub-applications by combining Deep Packet Inspection (DPI) and behavioral traffic analysis - no matter if the protocols are using advanced obfuscation, port hopping techniques or encryption. The Barracuda NG Firewall comes with real-time and historical application visibility that shows application traffic on the corporate network. This provides a basis for deciding which connections should be given bandwidth prioritization, which is crucial for QoS optimization of business-critical applications. Furthermore, it allows for adjusting and refining the corporate application use policy.

Barracuda Networks provides a risk rating for any identified application and protocol crossing the network. Based in the conducted traffic analysis the overall risk rating is as follows:

Mister Y Application Traffic Risk Rating: 1.1

The following chart provides an overview of the top applications based on bandwidth consumption that are traversing the network of Mister Y:

#	APPLICATIONS	RISK	TRAFFIC	SESSIONS
1	Web browsing	1	10.9 GB	1232613
2	Microsoft Update	1	4.2 GB	4602
3	Google Play Base	2	495.1 MB	1511
4	Google Services Base	2	194.7 MB	3633
5	Amazon Webservices	1	180.7 MB	108
6	iTunes	2	179.4 MB	81
7	Apple Update	1	173.3 MB	3
8	Avira AV Update	1	134.3 MB	260
9	Facebook Base	2	78.9 MB	1016
10	Bing Search	1	33.1 MB	500
11	Google Safe Browsing	1	29.2 MB	228
12	Ubuntu Update	1	27.0 MB	15
13	Google Update	1	18.1 MB	11
14	Microsoft Account	1	13.8 MB	637
15	iCloud Base	2	12.2 MB	413
16	MSN General	3	9.5 MB	4512
17	OneDrive	4	8.7 MB	209
18	Youtube Watch Video	3	7.6 MB	10
19	Ooyala	3	6.6 MB	21
20	Google AdSense	3	5.3 MB	152

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Figure 3 - Example for an application risk and usage report

Full user identity awareness

Barracuda CloudGen Firewall combines application control with seamless support for all commonly used authentication schemes such as Azure AD, active directory, RADIUS, and LDAP/S. That means reporting can be done based on user and group membership (instead of source IP addresses), and firewall and application policy rules can easily be created for individual users and groups.

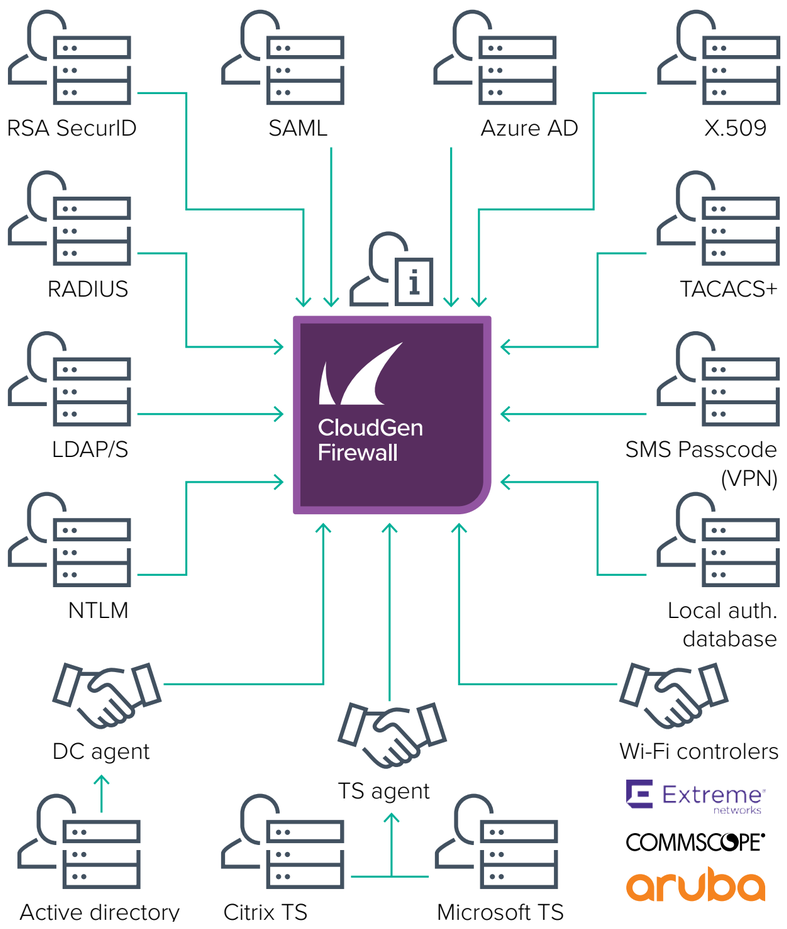


Figure 4 - Seamless support for commonly used authentication schemes

Web security

Advanced Threat Protection

Barracuda Advanced Threat Protection (ATP) uses next-generation sandbox technology including full-system emulation to catch advanced persistent threats, zero-day malware, and all advanced malware designed specifically to evade detection. ATP on Barracuda CloudGen Firewall ensures flexible and simple deployment into existing networks because no additional hardware is required. Resource-intensive sandboxing is offloaded to the Barracuda ATP Cloud with its multiple datacenters in the Americas, mainland Europe, UK, Japan, and Singapore. A hash fingerprint of each file and the good/bad classification of all sandboxed files are stored and cached for future use, effectively speeding up processing and guaranteeing near instantaneous results. Over 95% of all files checked by the ATP service have typically been seen before and only very few files need processing.

Since the Barracuda ATP cloud database cache is continuously updated by hundreds of thousands of CloudGen Firewall and CloudGen WAN deployments, Email Security Gateways, Web Security Gateways and Barracuda Email Protection services, the ATP service provides a true worldwide early detection grid for newly emerging malware.

With ATP on CloudGen Firewall, the firewall administrator has full policy control over how PDF documents, Microsoft Office Files, EXEs/MSIs/DLLs, Android APKs, compressed files, and archives are emulated and delivered to the client. Based on identified malware activity, infected users can be automatically quarantined, thereby preventing the malware from spreading within the network. Customizable, on-demand analysis reports for any emulated file provide full insight and details on malicious activities, file behavior, system-registry entries, and evasion and obfuscation techniques.

This also enables network activities such as establishing encrypted connections to botnet command and control centers for increased security posture to evade scaled botnet attacks.



Figure 5 - Barracuda Advanced Threat Protection architecture

Botnet and spyware protection

In combination with the ATP cloud database, all CloudGen Firewall models and deployment types provide protection against botnet infections and detect potentially infected clients based on DNS requests. Once an infected client is detected, it can be isolated automatically, and an alert can be created or reported with the Barracuda Firewall Report Creator.

Typo squatting & link protection for email

This important feature of ATP adds protection for two rising threats: uncovering misleading and misspelled links.

The link protection component automatically rewrites deceptive URLs in email messages to a Barracuda-validated URL and informs the requesting user on this change via a warning page displaying all the details about the blocked URL.

Typo squatting is a common trick to fool users into clicking on a link to a known source although the link is misspelled (e.g., examlpe.com), comes with a different top-level domain (e.g., example.org), or contains special characters (e.g., greek character rho for “p” - example.com), etc.

Web filtering

Web filtering on CloudGen Firewall is included with the Energize Updates subscription and enables highly granular, real-time visibility into online activity, broken down by individual users and applications, thereby letting administrators create and enforce effective Internet content and access policies.

Web filter functionality with CloudGen Firewall protects user productivity, blocks malware downloads and other web-based threats, enables compliance by blocking access to inappropriate websites and servers, and provides an additional layer of security alongside application control. For more details, please click here...

Safe Search enforcement

Many search engines have a safe search setting that filters out adult search results such as inappropriate images and videos in search query return traffic. On CloudGen Firewall customers can easily activate Safe Search enforcement so that the firewall will enforce safe search settings for all common search providers such as Google, Yahoo, and Bing, and even within YouTube. Search engines not supported can easily be blocked.

This functionality is even effective within SSL-encrypted search engines like google.com if TLS Inspection (included with all Barracuda CloudGen Firewall models and deployment types) is activated.

Google Apps accounts enforcement

In some cases, users with their own Google Apps account may be able to circumvent Safe Search enforcement settings by logging in from their workstation with their own Google Apps account. To prevent this, all CloudGen Firewall models and deployment types enforce and limit Google Apps accounts logins only for a list of predefined apps accounts easily created the administrator.

Mail security

Mail is still one of the most common ways of spreading malware. CloudGen Firewall includes all necessary means to prevent incoming email to the corporate mail server from being infected.

CloudGen Firewall’s mail security includes malware scanning, Advanced Threat Protection, and basic spam filtering via DNS block-listing of known mail senders and malware domains. For more details, please click here...

Malware protection

The optional malware protection shields the internal network from malicious content by scanning web content (HTTP and HTTPs), email (SMTP, POP3), and file transfers (FTP) via two fully integrated antivirus engines. Malware protection is based on regular signature updates as well as heuristics to detect malware or other potentially unwanted programs even before signatures are available. The malware protection covers viruses, worms, trojans, malicious Java applets, and programs using known exploits on PDF, pictures and office documents, macro viruses, and many more, even when using stealth or morphing techniques for obfuscation.

For more details, please click here...

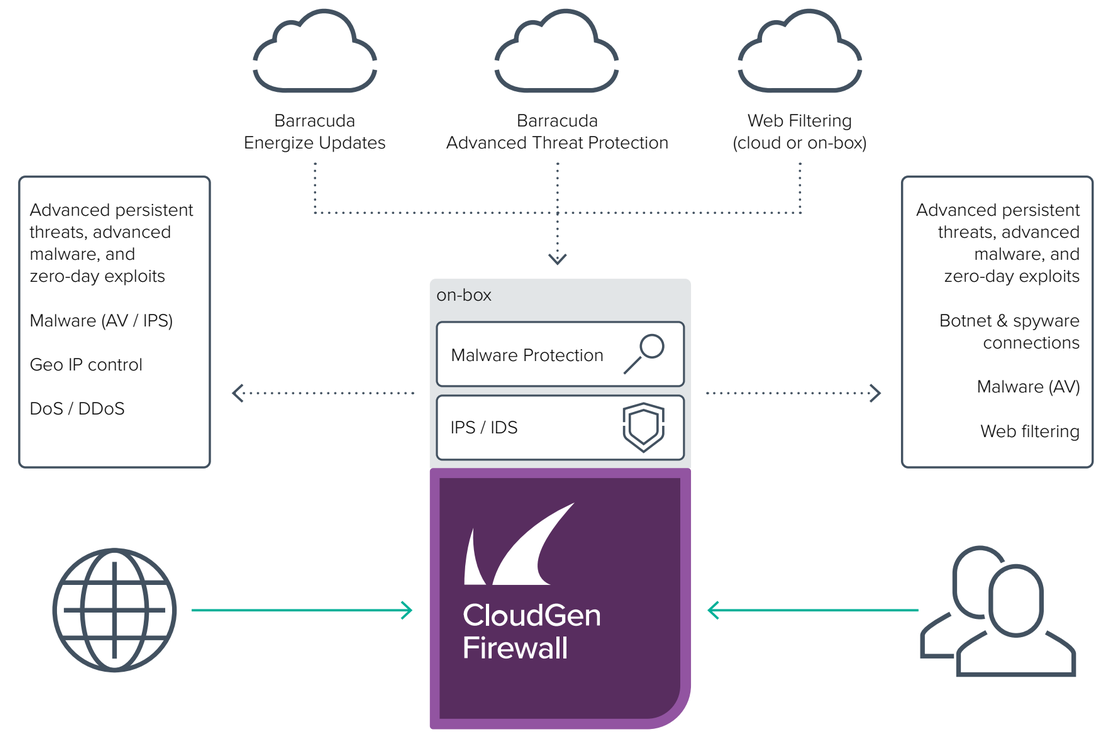


Figure 6 - Multi-layered security architecture

File content enforcement

Barracuda CloudGen Firewall includes true file type detection and enforcement capabilities based not only on extension and MIME type, but also on sophisticated true file type detection algorithms. Bypassing executable files by renaming or compressing is detected and blocked. Besides blocking / allowing connections, the Barracuda CloudGen Firewall also lets admins change download priorities . For example, if an ISO image started downloading with normal web traffic priority, the admin can increase or decrease the assigned bandwidth for the download, even though the user started downloading via a regular web- browsing session.

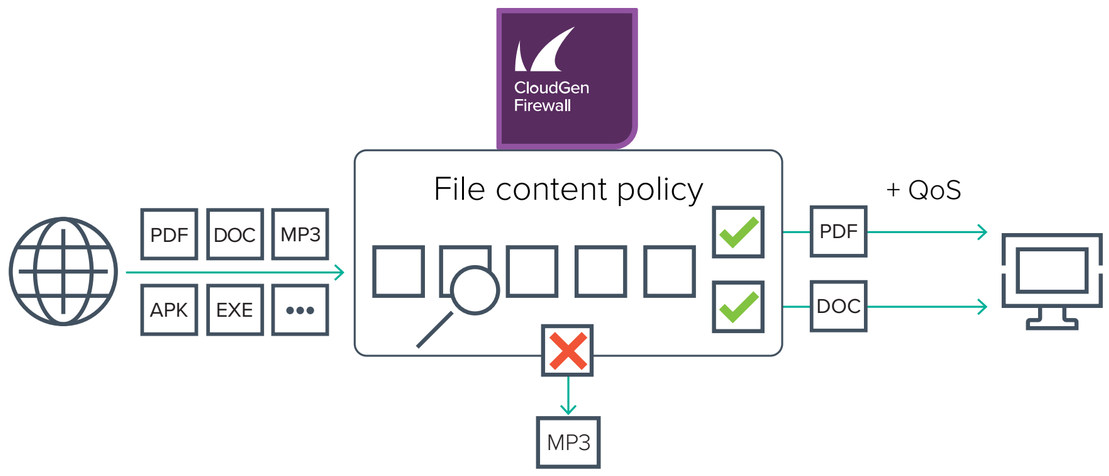


Figure 7 - True file type detection and enforcement

Network security

Intrusion detection and prevention

Every CloudGen Firewall includes a built-in intrusion detection and prevention system (IDS/IPS) that provides complete and comprehensive real-time network protection against a broad range of network threats, vulnerabilities, exploits, and exposures in operating systems, applications, and databases, thereby preventing network attacks such as:

- SQL injections and arbitrary code executions
- Access control attempts and privilege escalations
- Cross-site scripting and buffer overflows
- DoS and DDoS attacks
- Directory traversal and probing and scanning attempts
- Backdoor attacks, trojans, rootkits, viruses, worms, and spyware

By providing advanced attack and threat protection features such as stream segmentation and packet anomaly protection, TCP split handshake protection, IP and RPC defragmentation, FTP evasion protection, as well as URL and HTML decoding, CloudGen Firewall can identify and block advanced evasion attempts and obfuscation techniques that are used by attackers to circumvent and trick traditional intrusion prevention systems. As part of Barracuda's Energize Updates subscription automatic IPS signature updates are delivered on a regular schedule or on an emergency basis to ensure that CloudGen Firewall is constantly up-to-date. For more details, please click here...

DoS/DDoS attack protection

Every CloudGen Firewall comes with a host of built-in network protection functionalities beyond firewalling and IPS to protect networks and resources against malicious over-exhaustion.

TCP SYN flooding attacks are automatically prevented by predefined connection attempt limits that are configurable separately for outbound and inbound accept policies.

To further guard against regular DoS/DDoS attacks, the maximum number of new sessions and the allowed total number of sessions from a single source can be specified. This protects against resource exhaustion of your firewalls as well as the servers and networks behind them. These settings are configurable on a per-rule basis, thereby ensuring that protected servers with higher loads like web servers may be fully utilized.

Cloud automation

The big advantage of going to the cloud goes beyond cost savings but in greater agility and flexibility, enabling adoption of a DevOps/Agile methodology, and of cloud-native constructs and automation. Development and deployment processes in the cloud show drastic improvements over on-premises deployments and, thus, require high levels of automation and scripting. All of the components, including infrastructure for security and connectivity, need to adapt to the way this works in the public cloud via API or scripting. CloudGen Firewall provides fully automated protection across multi-cloud deployments, including SD-WAN and remote access automation across multiple cloud providers, on-site and virtual. This is important for DevOps processes that need to automate security, segmentation, and secure remote connectivity.

Fast user experience and improved application performance

CloudGen Firewall is designed from ground up to secure and optimize access to cloud applications by utilizing a unique combination of link bonding, dynamic application prioritization, application-based uplink selection and traffic compression techniques to improve the WAN network performance to the cloud, regardless of office type or remote mobile locations.

Multi-tier security

Segmenting cloud networks into multiple tiers provides security, visibility, and compliance for on-premises applications. Additionally, this can be leveraged when the applications are deployed in public cloud environments through Barracuda CloudGen Firewall.

CloudGen Firewall secures, restricts, and monitors the communications between these tiers, and limits the potential damage to an organization in the event of an attack. By filling the functional gaps between cloud infrastructure security and a defense-in-depth strategy, CloudGen Firewall provides protection between the application and data layers, rather than solely where the cloud network starts.

This architecture provides:

- Comprehensive security enforcement inside the cloud
- Threat detection and traffic monitoring between cloud application components
- Secure integration with on-premises resources
- Restricted and encrypted role-based administrative access to application infrastructure
- A mix of cloud-hosted network tiers and on-premises tiers if required by compliance regulations

Flexible licensing and consumption models

To be able to benefit of the elasticity of a cloud deployment, the licensing aspect has to taken into consideration as well. CloudGen Firewall provides regular Bring-Your-Own-License (BYOL) and highly flexible Pay-As-You-Go (PAYG) licensing based on on hourly (metered) usage.

Enhancing ExpressRoute and Direct Connect security

Azure ExpressRoute and AWS Direct Connect allow organizations to establish high-performance private connections between Azure datacenters and on-premises infrastructure and provides low latencies, failure-resilient connectivity and consistent predictable performance.

For both public cloud services, CloudGen Firewall enhances security and boosts reliability as well as connectivity performance:

Security

- Encrypt traffic across ExpressRoute and Direct Connect
- Check traffic for network threats and malware
- Prevent unwanted traffic from entering or leaving the cloud

Reliability & Performance

- Provide transparent fallback to internet SD-WAN in case of MPLS uplink failure while preserving all running sessions
- Bond ExpressRoute/Direct Connect with up to 24 Internet uplinks using Barracuda TINA remote access technology for significantly enhanced cloud connection

Intelligence

- Log all traffic for troubleshooting and reporting purposes
- Enforce priorities for protocols and applications utilizing ExpressRoute
- Enforce security policies based on user identity

Supported public-cloud offerings and available deployment sizes

For more details on Microsoft Azure and CloudGen Firewall, please visit barracuda.com/programs/azure.

	MICROSOFT AZURE						
CloudGen Firewall virtual model	VFC1	VFC2	VFC4	VFC8	VFC16	VFC48	PAYG
Virtual Cores	1	2	4	8	16	48	Does not apply
Protected IP addresses	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited
Available consumption models	Bring-Your-Own-Licence (BYOL)						Pay-As-You-Go (PAYG) (time-based)
AVAILABLE SUBSCRIPTIONS							
Barracuda Firewall Insights	Optional	Optional	Optional	Optional	Optional	Optional	✓
Advanced Threat Protection	Optional	Optional	Optional	Optional	Optional	Optional	-
Malware Protection	Optional	Optional	Optional	Optional	Optional	Optional	-
Advanced Remote Access	Optional	Optional	Optional	Optional	Optional	Optional	✓
Premium Support	Optional	Optional	Optional	Optional	Optional	Optional	-

For more details on Amazon Web Services and CloudGen Firewall, please visit barracuda.com/programs/aws.

	AMAZON WEB SERVICES						
CloudGen Firewall virtual model	VFC1	VFC2	VFC4	VFC8	VFC16	VFC48	PAYG
Virtual Cores	1	2	4	8	16	48	Does not apply
Protected IP addresses	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited
Available consumption models	Bring-Your-Own-Licence (BYOL)						Pay-As-You-Go (PAYG) (time-based)
AVAILABLE SUBSCRIPTIONS							
Barracuda Firewall Insights	Optional	Optional	Optional	Optional	Optional	Optional	✓
Advanced Threat Protection	Optional	Optional	Optional	Optional	Optional	Optional	-
Malware Protection	Optional	Optional	Optional	Optional	Optional	Optional	-
Advanced Remote Access	Optional	Optional	Optional	Optional	Optional	Optional	✓
Premium Support	Optional	Optional	Optional	Optional	Optional	Optional	-

For more details on Google Cloud and CloudGen Firewall, please visit barracuda.com/programs/googlecloud.

	GOOGLE CLOUD PLATFORM						
CloudGen Firewall virtual model	VFC1	VFC2	VFC4	VFC8	VFC16	VFC48	PAYG
Virtual Cores	1	2	4	8	16	48	Does not apply
Protected IP addresses	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited	Unlimited
Available consumption models	Bring-Your-Own-Licence (BYOL)						Pay-As-You-Go (PAYG) (time-based)
AVAILABLE SUBSCRIPTIONS							
Barracuda Firewall Insights	Optional	Optional	Optional	Optional	Optional	Optional	✓
Advanced Threat Protection	Optional	Optional	Optional	Optional	Optional	Optional	-
Malware Protection	Optional	Optional	Optional	Optional	Optional	Optional	-
Advanced Remote Access	Optional	Optional	Optional	Optional	Optional	Optional	✓
Premium Support	Optional	Optional	Optional	Optional	Optional	Optional	-

SD-WAN and performance

With the increasing adoption cloud-native applications in today's business environment, the role of the firewall has evolved from a gateway-based, security-only device to a set of distributed solutions that make sure the WAN network is available any time for any type of endpoint. Regardless if the WAN endpoint is at headquarters, a remote office, a network in the IaaS cloud, or a mobile endpoint, Barracuda CloudGen Firewall enables impeccable WAN performance.

Barracuda CloudGen Firewall units deployed to multiple physical and cloud locations allow an organization to create a fault-tolerant, high-performance WAN network on top of low-cost broadband lines by combining full next-gen deep security inspection, smart policy-based adaptive traffic management, and traffic compression technology into a single centrally manageable solution. Besides improved fault tolerance against outages and better WAN performance, the solution enables cost optimization strategies when multiple carriers/ISPs are combined to get the required bandwidth at an optimum price. This section highlights of CloudGen Firewall's WAN reliability and performance technologies.

Optimized direct internet break out for SaaS

Barracuda CloudGen Firewall optimizes access to SaaS applications that require direct internet access. Based on the performance to the Internet, the most responsive uplink is chosen to guarantee fast application performance.

WAN compression

All Barracuda CloudGen Firewall models include data deduplication and traffic compression. With built-in WAN compression, CloudGen Firewall significantly improves site-to-site WAN network throughput and accelerates the delivery of business applications - at no extra charge.

WAN compression is even included with CloudGen Firewall's virtual and cloud-based deployment options, effectively enabling secure, high-performance direct internet breakouts to cloud-hosted networks for every remote location.

For more details, please click here...

Failover and link balancing

Barracuda CloudGen Firewall provides a wide range of built-in uplink options such as leased lines, broadband (DHCP, DSL/cable, PPPoA, PPPoE, PPTP), and 3G/4G/UMTS. Up to 24 uplinks can be combined in load sharing or failover mode, eliminating the need to purchase additional devices for link balancing. CloudGen Firewall's unique combination of application awareness and traffic intelligence mechanisms automatically prioritizes business-critical applications, networks, and even distinct endpoints in case overall remaining bandwidth is degraded. Unlike typical firewall solutions, all uplinks can be utilized to distribute SD-WAN traffic, effectively enabling extremely reliable and encrypted site-to-site connectivity with only inexpensive broadband or even 4G uplinks.

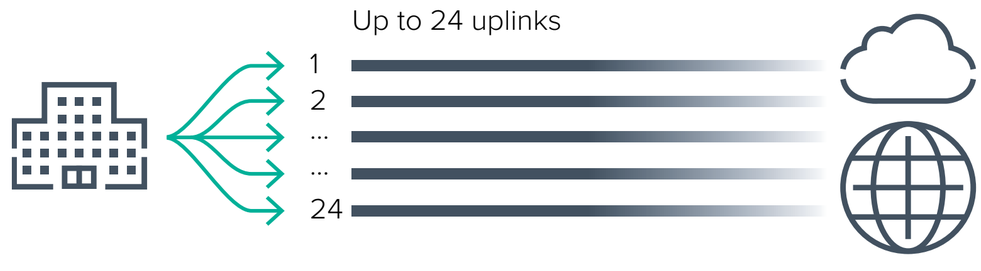


Figure 8 - Combine up to 24 uplinks load sharing or failover mode

Dynamic bandwidth detection and performance-based transport selection

In order to achieve the highest possible quality of service, all CloudGen Firewall models pro-actively measure the available bandwidths and - automatically - select the best uplink for a SD-WAN connection based on bandwidth, latency, or combined quality metrics.

Adaptive bandwidth reservation

If a measured bandwidth is not sufficient for business-critical traffic (e.g., VoIP), CloudGen Firewall can automatically adjust the allocated bandwidths for non-business-critical traffic to free up bandwidth for redistribution.

Adaptive session balancing

Using multiple transports simultaneously might end up in some clogged transports and some hardly used ones. To avoid this inconvenience, CloudGen Firewall can dynamically balance not only newly created sessions but also already existing ones across the available uplinks.

Dynamic forward error correction

Secure SD-WAN connections with Barracuda CloudGen Firewall are designed for high-speed networking across shared lossy lines such as internet broadband or 4G/5G. The underlying forward error correcting (FEC) technology to remediate packet loss is based on a new set of algorithms in the category of random linear network codes (RLNC). Algorithms based on RLNC codes react much faster to losses, remediate these faster on the fly, requiring fewer packet retransmissions and reducing overhead on the devices. This results in high quality voice and video calls even in high packet loss scenarios and with many subscribers on the shared line.

On-demand dynamic mesh SD-WAN

CloudGen Firewall deployments in a centrally managed WAN network create SD-WAN connections dynamically based on remote peer and application. The typical use case for this technology is creating an encrypted SD-WAN connections between two branch offices on-demand for a VoIP phone call, thereby improving call quality.

For hybrid networks hosted in public cloud infrastructures like Microsoft Azure, Amazon Web Services, or Google Cloud Platform, this technology can be used easily to enable on-the-fly and direct access to cloud applications from remote offices that otherwise do not need a permanent cloud connection.

Azure Virtual WAN

CloudGen Firewall supports Microsoft's Azure Virtual WAN technology to allow fast, secure, and uninterrupted network availability with your cloud-hosted or hybrid datacenter and your branch offices through Microsoft's global network.

In combination with Virtual WAN, CloudGen Firewall fully enables automated large-scale branch connectivity, selective traffic backhauling, unified networks and policy management, and optimized routing using the Microsoft global network.

- Automatic branch to branch connectivity
- Automatic branch to Microsoft Azure connectivity
- Allow hundreds of remote locations to securely connect via Azure Virtual WAN
- Active-active remote access for uninterrupted connectivity
- Optimal routing and minimal latency for branch-to-branch and branch-to-Azure connectivity with Microsoft's global network
- Unified network and security policy management

Zero Trust Access

In todays business world, cloud migrations are accelerating and the need to secure and monitor access to public and private business applications is vital. The Zero Trust Access (ZTA; also know as Zero Trust Network Access or in short ZTNA) approach enforces verification of each attempt by a device or individual to obtain access to resources and company data.

ZTA requires continuous verification that only the right person, with the right device, and the right permissions can access company data or apps. If all prerequisites are met, ZTA establishes a direct connection to the application without exposing the network, largely reducing the possible attack surface. Creating ZTA environments with traditional VPN solutions and micro-segmentation is unreasonably cumbersome, highly error prone and impossible to maintain.

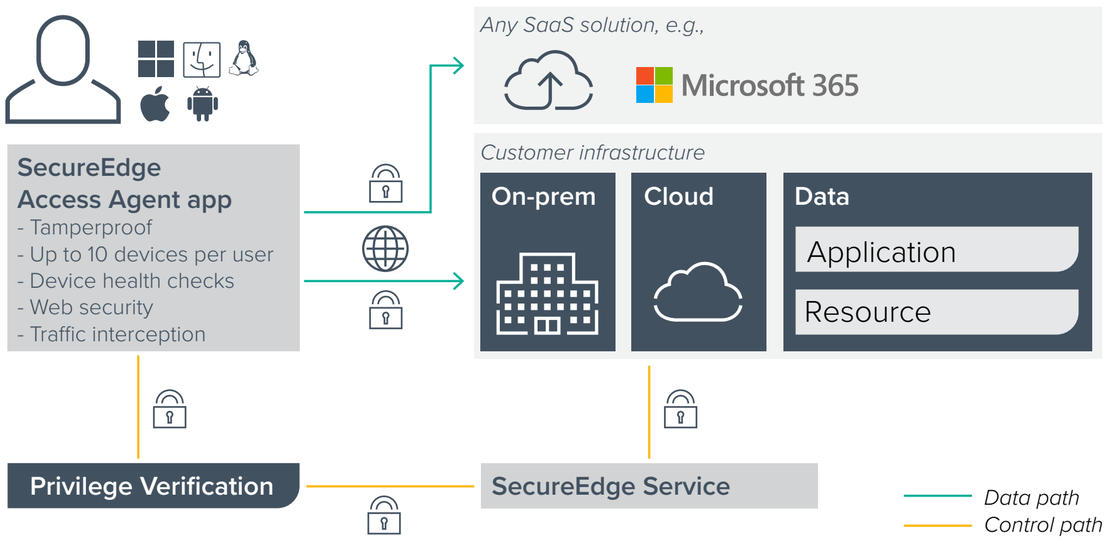


Figure 9 - Zero Trust Access architecture

Utilizing SecureEdge Access Agents for ZTA in CloudGen Firewall environments provides:

- Enforcement of least-privilege-access principles
- Controlled secure access to apps from BYOD devices
- Simultaneous access to applications on-prem and on multiple clouds
- Provide contractors secured access to company applications regardless where hosted
- DevOps access on multi-cloud environments
- Increase security posture by eliminating transparent network-based access
- Mobile device security monitoring and protection against malicious web sites

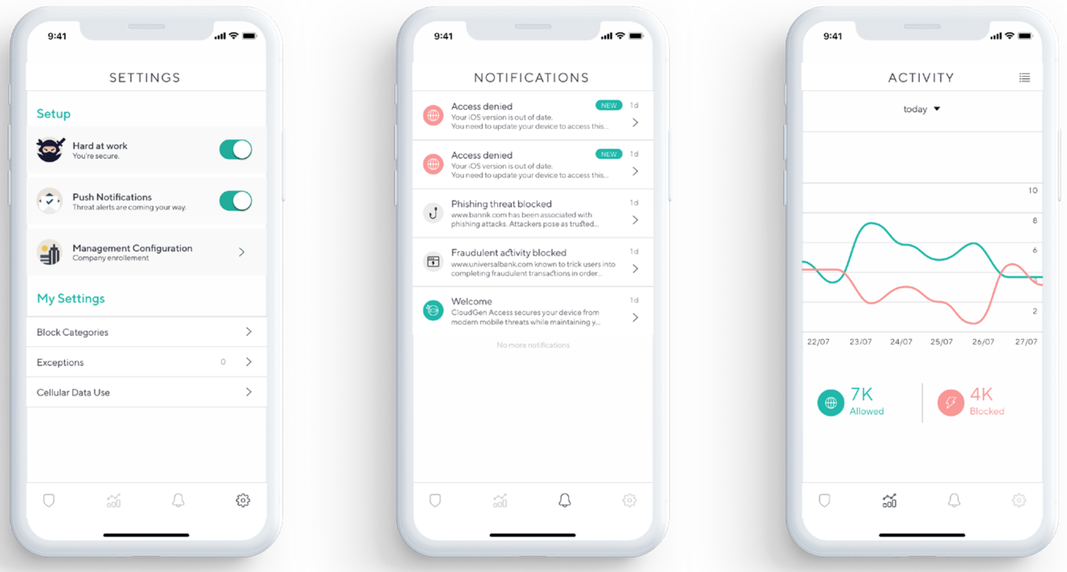


Figure 10 - Various SecureEdge Access app impressions

Please note: Zero Trust Access requires a separate subscription for Barracuda SecureEdge.

BARRACUDA SECUREEDGE CAPABILITIES	
Please note that the following is a non-exhaustive list. For more details, please refer to campus.barracuda.com.	
SSO and authentication enforcement	✓
Access privilege enforcement	✓
Tamper proof agent	✓
SecureEdge Access Agents available for	Windows, macOS, iOS, Android, Linux (for more detailed information, please consult Barracuda Campus)
Max. devices per users	10 (simultaneously)
SecureEdge Access Agent Mass Enrollment	✓
Zero Trust Access Dashboard	✓
Last mile uplink optimization via Forward Error Correction (FEC)	✓
ID Provider support	Entra ID, SAML 2.0, Google Workspace, OpenID connect, E-Mail-based OTP, Okta via SAML, Barracuda Cloud Control

Unified remote access

Barracuda CloudGen Firewall incorporates advanced client-to-site access capabilities, using ZTNA, SSL, mTSL, IPsec, and TINA protocols to ensure remote users can easily and securely access network resources without time-consuming client configuration and management. The communication protocols used with our clients are optimized to be fully roaming-capable by quickly reconnecting upon loss of communication. Smart pathfinder technology determines the nearest point of entry to the corporate network. By using different ports encapsulated in either TCP or UDP, the advanced NAT traversal technology can easily pass through web proxies.

CloudGen Firewall provides strong capabilities that give users the full advantage of their devices while reducing possible risks to their business. Unwanted applications can be blocked, LAN segmentation can protect sensitive data, and network access control can check the health state of each device prior to connecting to the corporate network.

For authentication purpose, CloudGen Firewall supports time-based one-time password (TOTP) algorithm (requires an Advanced Remote Access subscription. This allows to streamline the rollout of TOTP solutions using bulk enrollment.

Multi-factor authentication (MFA) provided by all CloudGen Firewall devices with an active Advanced Remote Access subscription provides an additional layer of security.

The widely used time-based-one-time password (TOTP) algorithm ensures wide end user acceptance.

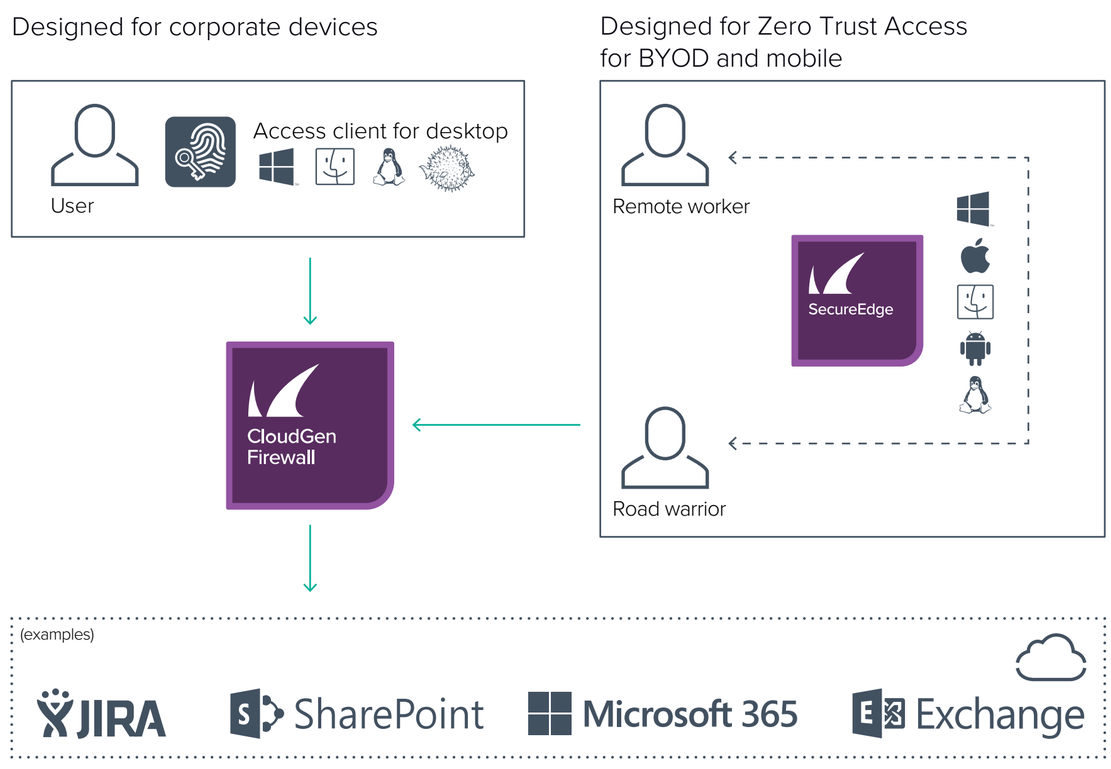


Figure 11 - Secure remote access architecture

About TINA protocol

The TINA protocol encapsulates encrypted ESP payload in TCP or UDP packets, thus adapting to underlying transport network quality and providing failure resistant, high-speed connections. It also improves remote access substantially by adding:

- Multiple concurrent physical transport paths per logical tunnel
- Session level or packet level transport aggregation for increased total tunnel throughput
- Adaptive traffic shaping depending on SD-WAN transport availability
- Fallback transports in case of uplink failure
- Traffic compression and deduplication
- DHCP and NAT support
- Packet loss mitigation with dynamic forward error correction

Network Access Client



Every Barracuda CloudGen Firewall supports an unlimited number of remote access clients at no extra cost. The Barracuda Network Access Client provides a sophisticated VPN client for Windows, macOS, and Linux that provides richer performance and functionality than standard IPsec client software. Benefits include quick restoration of encrypted tunnels, “Always On” remote access connections for PCs, redundant gateway support, selective routing of network traffic through the encrypted tunnel, and optimal gateway detection based on location.

The Barracuda Network Access Client provides centrally managed Network Access Control (NAC) and an advanced Personal Firewall. This enforces client health and security policies for remote users connecting to the corporate network.

	FIREWALL BASE LICENCE	ADVANCED REMOTE ACCESS
Multiple concurrent sessions by same user	-	✓
Multi-factor authentication (TOTP)	-	✓ (unlimited users per device)
BARRACUDA NETWORK ACCESS CLIENT		
TINA remote access client (Windows, macOS, Linux, and openBSD)	✓	✓
Personal firewall & health checks (Windows only)	-	✓
Microsoft Access Control Services support	✓	✓
Two-factor authentication (Windows and macOS)[1]	✓	✓
SAML authentication support	-	✓
LIGHTWEIGHT BROWSER-BASED REMOTE ACCESS		
TLS encrypted web portal (for desktop / mobile)	-	✓
Health checks	-	✓
Multi-factor authentication	-	✓

1 Requires external handling of additional authentication factors (e.g., Azure Multi-Factor Authentication).

Once-only central management

To centralize management across many different firewalls and remote access users, the **Barracuda Firewall Control Center** enables administrators to manage and configure security, content, traffic management, and network access policies from a single interface. Template-based configuration and globally available security objects enable efficient configuration across thousands of locations.

The Firewall Control Center helps significantly reduce the cost associated with security management while providing extra functionality both centrally and locally at the managed gateway. Software patches and version upgrades are centrally controlled from within the management console and deployment can be applied to all managed devices.

Highly customizable administrative roles can be defined to delegate administrative capabilities for specific departments or locations.

Lifecycle management

Scalable CloudGen Firewall deployments offer companies sustainable investment protection. Energize Updates automatically provide the latest firmware and threat definitions to keep the appliance up to date. With a active Instant Replacement subscription, organizations receive a new appliance with the latest specs every four years.

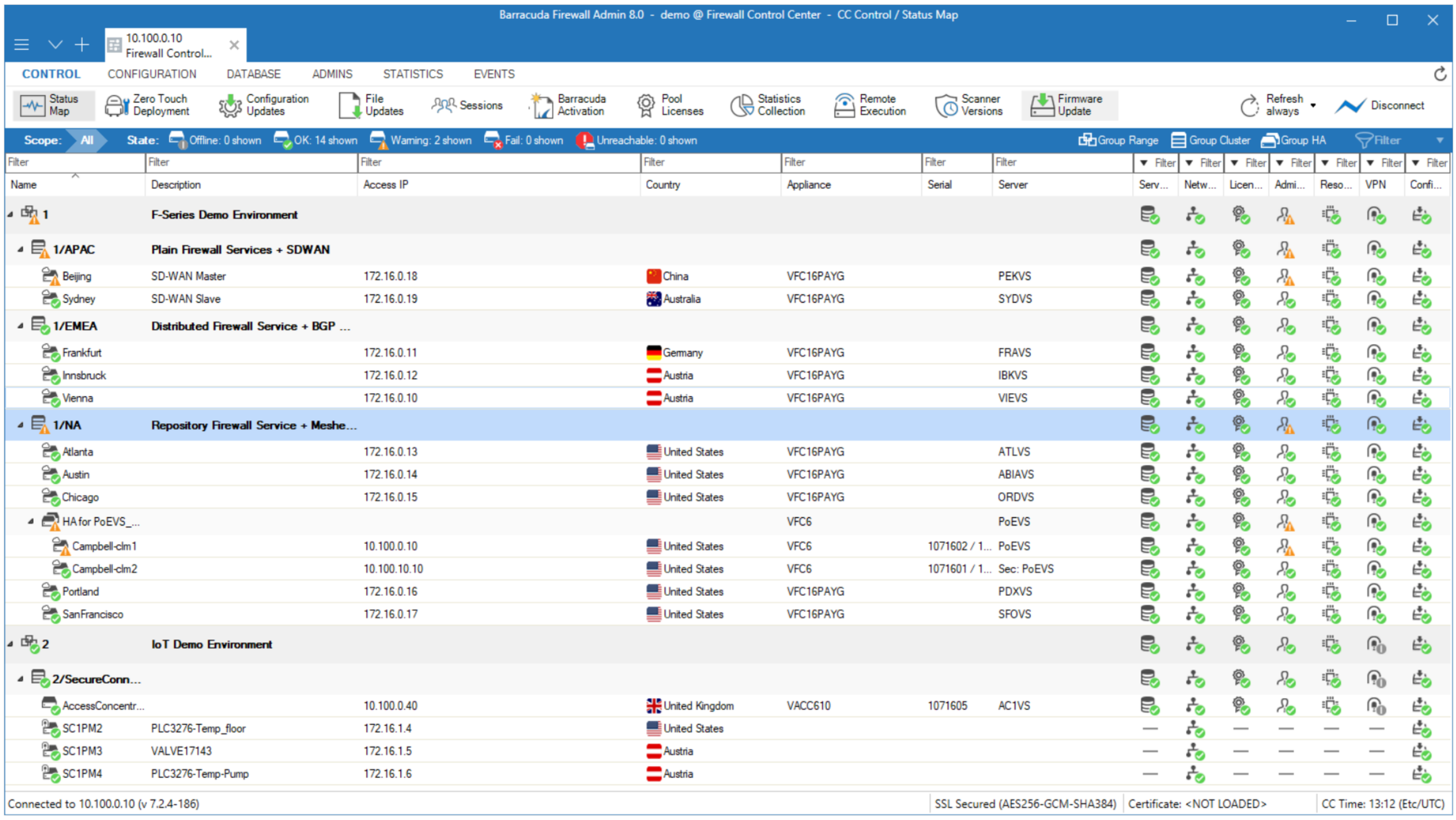


Figure 12 - Firewall Control Center's Status Map displays a drill down status overview of all centrally managed CloudGen Firewall deployments.

Scalable deployment

Managing the security issues in a widely distributed enterprise network can be painful and extremely time consuming. Managing a system may take only 15 minutes per day. But having 20 firewall systems in place results in five hours per day – just to manage the existing system.

With Firewall Control Center, managing multiple CloudGen Firewall deployments takes the same amount of time as managing one. For more details, please click here,

Cloud deployment

Moving infrastructure to the cloud does not stop at administration tools. Therefore, the Firewall Control Center is available for direct deployment in public cloud offerings like Microsoft Azure, Amazon Web Services, and Google Cloud Platform in a Bring-Your-Own-License model.

Lifecycle automation

CloudGen Firewall features a full set of well-documented automation APIs. The automation APIs included with every CloudGen Firewall allow endusers as well as service partners to automate the management of their devices, across the complete lifecycle. This enables faster deployment, enhanced consistency in management and more rapid adoption of configuration changes for on-premises, virtual as well as cloud-hosted devices.

Zero-touch deployment

Especially for large rollouts without having IT personnel on the ground at remote locations, CloudGen Firewall in conjunction with Firewall Control Center supports zero-touch deployment. This feature allows to send appliances to locations without having to pre-setup them beforehand.

After unpacking the appliance and powering it up, the appliance automatically connects to the Barracuda Cloud Control where it receives are very basic set of information. This Information is just enough to create a high-secure connection (utilizing TINA protocol) to the private Firewall Control Center the appliance shall be assigned to.

The full configuration is sent to the appliance via an encrypted connection and the appliance becomes part of the security infrastructure without the need of dedicated and trained IT security administrators at the location.

Enterprise- and service provider licensing

The Firewall Control Center lets you centrally manage all CloudGen Firewall licensing flexible and interdependently of hardware. You can make best use of type of licensing for CloudGen Firewall deployments when you have a large number of firewalls running across a wide geographic area.

For more information on this type of licensing, please see the dedicated whitepaper “Enterprise and Service-Provider Licensing“ available on barracuda.com.

Comparison of Barracuda Firewall Control Center models

FEATURES	**VC400** VIRTUAL ENVIRONMENT	**VCC400** PUBLIC CLOUD	**VC610** VIRTUAL ENVIRONMENT	**VCC610** PUBLIC CLOUD	**VC820** VIRTUAL ENVIRONMENT
Max. no. of managed gateways [Recommended[1]]	unlimited [up to 50]	unlimited [up to 50]	unlimited [up to 1,000]	unlimited [up to 1,000]]	unlimited [up to 3,000]
Manageable configuration groupings	3	3	Unlimited	Unlimited	Unlimited
Multi-administrator support	✓	✓	✓	✓	✓
Role-based administration	✓	✓	✓	✓	✓
Revision control system	✓	✓	✓	✓	✓
Central statistics	✓	✓	✓	✓	✓
Central syslog host / relay	✓	✓	✓	✓	✓
Firewall audit information collector / viewer	✓	✓	✓	✓	✓
Barracuda access monitor	✓	✓	✓	✓	✓
PKI service	-	-	✓	✓	✓
High availability	Optional	Optional	Optional	Optional	HA license included
Tenants support	1 tentant	1 tentant	2 tentants	2 tentants	5 tentants
Additional tenant for multi-tenancy	Optional	Optional	Optional	Optional	Optional

1 Depending on range of functions, setup, and hardware/hypervisor

Analytics and reporting

Information is key

Staying secure and seamlessly connected requires you to have up-to-date data to be able to continuously assess the effectiveness of your security measures and WAN performance. The vast amount of data coming from different origins and in different formats often needs manual processing, an approach that is both error prone and costly. If information retrieval and processing of raw data is not automated, auditing and reporting requirements will represent an enormous yet inevitable burden. **Barracuda Firewall Insights** automates these challenging tasks.

Central reporting instance

Firewall Insights is an advanced reporting and analysis solution that gathers, consolidates, and analyzes data fully automatically from any CloudGen Firewall deployed across your organizational network, including public cloud deployments. Barracuda's reporting solution provides status overviews for the entire WAN, including details and availability information on SD-WAN connections, transport details, security, and web- and network-traffic details. More than one hundred predefined reports, including summary reports, are available for areas like safety and liability, network activity, web activity, security, and productivity.

All reports are customizable for individual timeframes and can include all or just a subset of the deployed firewalls. This enables businesses to provide policy-compliant access to information to all management levels within a secure and trusted environment.

> For availability and hardware requirements, please see "Available subscriptions and plans" on page 85.

Central log aggregator

Firewall Insights works as the central log aggregator for every CloudGen Firewall. Since installation on virtualization solutions supports an almost unlimited amount of storage, the log retention period is flexible, depending on the demands or local regulation authority.

Advanced definition, automatic generation, and reliable delivery

Creating reports that visualize how the CloudGen Firewall protects and connects your networks has never been easier. The graphical user interface lets you quickly select from hundreds of predefined reporting options. Various output formats for paper or web-based publishing ensure that the most accurate and reliable information is available for your strategic business decisions.

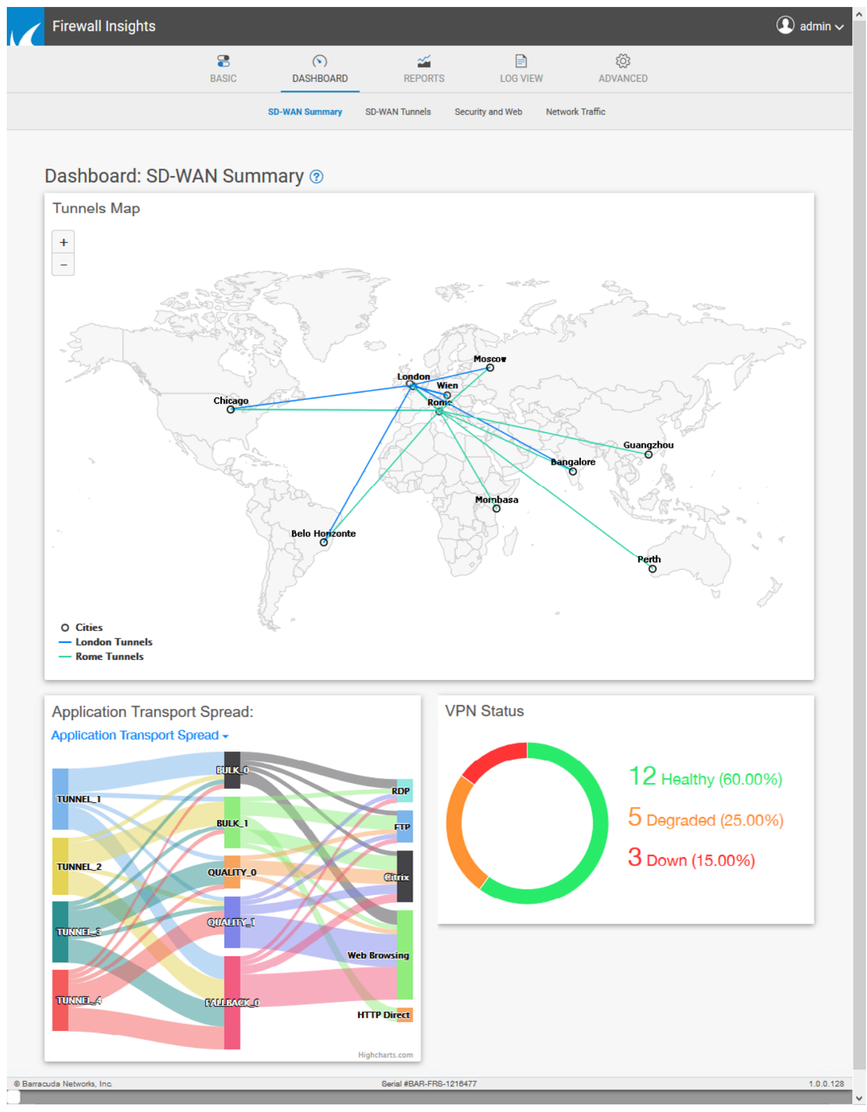


Figure 13 - Barracuda Firewall Insights' dashboard

Hardware facts

Model comparison

With hardware models available for small branch offices as well as large headquarters and datacenters, a corresponding offering of virtual appliances, and a comprehensive public cloud support, the Barracuda CloudGen Firewall is designed for deployment across the entire enterprise.

For more information on how Barracuda can secure your Internet-of-Things deployments, please consult the solution overview Barracuda Industrial Security (also available in German).

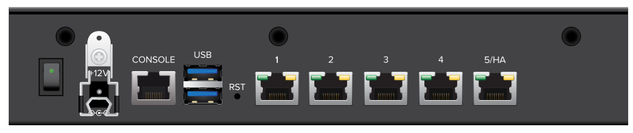
MODEL COMPARISON	ENTRY LEVEL/ BRANCH OFFICES					MID-RANGE			HIGH-END			DIN RAIL / RUGGED			
	F12A	F18B	F80B	F180B	F280C	F380B	F400C	F600D	F800D	F900C	F1000B	F93A.R	F193A.R	SC2X	SC3X
PERFORMANCE[1]	(MORE DETAILED ON PAGE 25 FF.)					PAGE 30 FF.			PAGE 38 FF.			PAGE 49 FF.			
Firewall throughput	1.2 Gbps	2.0 Gbps	2.0 Gbps	3.2 Gbps	4.8 Gbps	8.5 Gbps	13 Gbps	20 Gbps	42.5 Gbps	63.0 Gbps	52 Gbps	1.5 Gbps	2.1 Gbps	–	–
SD-WAN throughput	220 Mbps	720 Mbps	720 Mbps	800 Mbps	1.5 Gbps	2.1 Gbps	3.6 Gbps	6.8 Gbps	11.5 Gbps	20.0 Gbps	15.8 Gbps	240 Mbps	320 Mbps	30 Mbps	30 Mbps
IPS throughput	400 Mbps	600 Mbps	600 Mbps	1.0 Gbps	2.0 Gbps	2.5 Gbps	4.2 Gbps	8.0 Gbps	12.9 Gbps	19.4 Gbps	16 Gbps	400 Mbps	790 Mbps	–	–
NGFW throughput	250 Mbps	400 Mbps	400 Mbps	1.2 Gbps	1.6 Gbps	2.0 Gbps	3.7 Gbps	6.4 Gbps	9.7 Gbps	15.2 Gbps	14.8 Gbps	400 Mbps	800 Mbps	–	–
Threat protection throughput	230 Mbps	380 Mbps	380 Mbps	1.0 Gbps	1.5 Gbps	1.7 Gbps	3.1 Gbps	5.8 Gbps	9.3 Gbps	14.1 Gbps	13.5 Gbps	380 Mbps	700 Mbps	–	–
Concurrent sessions	80,000	80,000	80,000	150,000	300,000	400,000	500,000	2,100,000	3,000,000	4,000,000	10,000,000	80,000	100,000	–	–
New sessions/s	8,000	12,000	12,000	12,000	12,000	15,000	20,000	115,000	220,000	250,000	250,000	8,000	9,000	–	–
Recommended concurrent users (depending on feature set)	5-75	50-100	50-100	75-150	150-300	200-500	300-1,000	1,000-4,000	4,000-6,000	7,000-15,000	7,000-15,000	50-100	75-150	–	–
Integrated WiFi access point	–	–	✓	✓	✓	–	–	–	–	–	–	–	–	✓[3]	✓[3]
SD-WAN connections	Unlimited														
Recommended no. of remote access clients	10	25	25	50	75	100	250	500	1,000	2,000	3,000	50	75	–	–
Rugged hardware	–	–	–	–	–	–	–	–	–	–	–	✓	✓	–	✓
AVAILABLE SOFTWARE/FEATURE SUBSCRIPTIONS (EXCERPT, MORE DETAILED ON PAGE 85 FF.)															
Energize Updates	**MANDATORY**														
Firewall Insights	**OPTIONAL**													–	–
Advanced Threat Protection	**OPTIONAL**													–	–
Malware Protection	**OPTIONAL**[2]													–	–
Advanced Remote Access	–	**OPTIONAL**												–	–
AVAILABLE HARDWARE/SUPPORT SUBSCRIPTIONS (EXCERPT, MORE DETAILED ON PAGE 85 FF.)															
Warranty Extension	**OPTIONAL**														
Instant Replacement	**OPTIONAL**														
Premium Support	on request							**OPTIONAL**						on request	

1 Numbers are "up to"; for detailed information on throughput and how throughput numbers are measured, please refer to the hardware specifications on page 25 ff.
2 F12A features cloud-based malware protection as part of an active Advanced Threat Protection subscription.
3 Depends on selected sub-model.

SPECIFICATIONS - ENTRY AND BRANCH OFFICE MODELS

F12A





INTERFACES	
Copper ethernet NICs (1 GbE)	5x
USB 3.0	2x
VGA	-
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	1.2
SD-WAN throughput [AES-128, TINA std hash, Mbps] [b]	220
SD-WAN throughput [AES-256, TINA std hash, Mbps] [b]	200
IPS throughput [Mbps] [c]	400
NGFW throughput [Mbps] [d]	250
Threat protection throughput [Mbps] [e]	230
Concurrent sessions	80,000
New sessions/s	8,000
Recommended number of concurrent users [f]	5-75
MEMORY	
RAM [GB]	2
MASS STORAGE	
Type	SSD
Size ([GB] or better)	80
SSD MTBF [hours]	n/a
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	4.4 / 2.0
Appliance size: width x depth x height [in]	9.1 x 6.0 x 1.7
Appliance size: width x depth x height [mm]	232 x 153 x 44
Weight carton with appliance [lbs] / [kg]	5.2 / 2.4
Carton size: width x depth x height [in]	12.2 x 10.2 x 7.1
Carton size: width x depth x height [mm]	310 x 260 x 180
Form factor	Compact
HARDWARE	
Display	-
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	External power brick
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	45
Max. power draw @ 120V [Amps]	0.4
Max. power draw @ 230V [Amps]	0.2
Max. heat dissipation [W]	19
Max. heat dissipation [BTU]	65
Energy efficiency (average)	> 85%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓

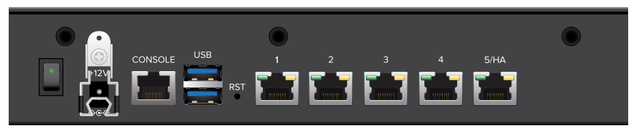
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F18B





INTERFACES	
Copper ethernet NICs (1 GbE)	5x
USB 3.0	2x
Serial / console	1x RJ45
Integrated WiFi (IEEE 802.11b/g/n)	-
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	2.0
SD-WAN throughput [AES-128, TINA std hash, Mbps] [b]	720
SD-WAN throughput [AES-256, TINA std hash, Mbps] [b]	660
IPS throughput [Mbps] [c]	600
NGFW throughput [Mbps] [d]	400
Threat protection throughput [Mbps] [e]	380
Concurrent sessions	80,000
New sessions/s	12,000
Recommended number of concurrent users [f]	50-100
MEMORY	
RAM [GB]	4 or higher
MASS STORAGE	
Type	SSD
Size ([GB] or better)	80
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	4.4 / 2.0
Appliance size: width x depth x height [in]	9.1 x 6.0 x 1.7
Appliance size: width x depth x height [mm]	232 x 153 x 44
Weight carton with appliance [lbs] / [kg]	7.7 / 3.5
Carton size: width x depth x height [in]	12.2 x 10.2 x 7.1
Carton size: width x depth x height [mm]	310 x 260 x 180
Form factor	Desktop
HARDWARE	
Display	-
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Single, 12V
Power supply type	External power brick
Power type [AC/DC]	DC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	45
Max. power draw @ 120V [Amps]	0.4
Max. power draw @ 230V [Amps]	0.2
Max. heat dissipation [W]	26.7
Max. heat dissipation [BTU]	90.9
Energy efficiency (average)	> 93%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓

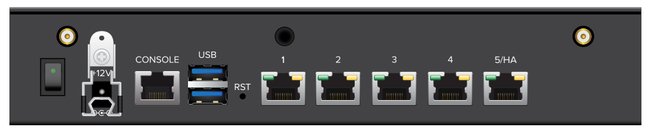
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F80B





INTERFACES	
Copper ethernet NICs (1 GbE)	5x
USB 3.0	2x
Serial / console	1x RJ45
Integrated WiFi (IEEE 802.11b/g/n)	✓
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	2.0
SD-WAN throughput [AES-128, TINA std hash, Mbps] [b]	720
SD-WAN throughput [AES-256, TINA std hash, Mbps] [b]	660
IPS throughput [Mbps] [c]	600
NGFW throughput [Mbps] [d]	400
Threat protection throughput [Mbps] [e]	380
Concurrent sessions	80,000
New sessions/s	12,000
Recommended number of concurrent users [f]	50-100
MEMORY	
RAM [GB]	4 or higher
MASS STORAGE	
Type	SSD
Size ([GB] or better)	80
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	4.4 / 2.0
Appliance size: width x depth x height [in]	9.1 x 6.0 x 1.7
Appliance size: width x depth x height [mm]	232 x 153 x 44
Weight carton with appliance [lbs] / [kg]	7.7 / 3.5
Carton size: width x depth x height [in]	12.2 x 10.2 x 7.1
Carton size: width x depth x height [mm]	310 x 260 x 180
Form factor	Desktop
HARDWARE	
Hardware crypto accelerator	Yes, built-in
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Single, 12V
Power supply type	External power brick
Power type [AC/DC]	DC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	45
Max. power draw @ 120V [Amps]	0.4
Max. power draw @ 230V [Amps]	0.2
Max. heat dissipation [W]	26.7
Max. heat dissipation [BTU]	90.9
Energy efficiency (average)	> 93%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Wireless antenna	✓

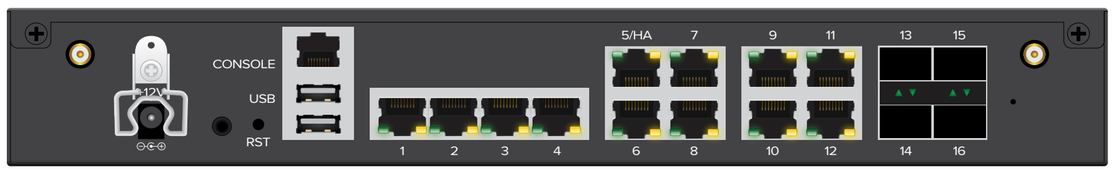
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a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
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c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F180B





INTERFACES	
Copper ethernet NICs (1 GbE)	12x
SFP fiber NICs (1 GbE)	4x
USB 3.0	2x
Serial / console	1x RJ45
Integrated WiFi (IEEE 802.11b/g/n)	✓
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	3.2
SD-WAN throughput [AES-128, TINA std hash, Mbps] [b]	800
SD-WAN throughput [AES-256, TINA std hash, Mbps] [b]	730
IPS throughput [Gbps] [c]	1.0
NGFW throughput [Gbps] [d]	1.2
Threat protection throughput [Gbps] [e]	1.0
Concurrent sessions	150,000
New sessions/s	12,000
Recommended number of concurrent users [f]	75-150
MEMORY	
RAM [GB]	4 or higher
MASS STORAGE	
Type	SSD
Size ([GB] or better)	100
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	5.1 / 2.3
Appliance size: width x depth x height [in]	11.8 x 8.6 x 1.7
Appliance size: width x depth x height [mm]	300 x 219 x 44
Weight carton with appliance [lbs] / [kg]	10.1 / 4.6
Carton size: width x depth x height [in]	15.7 x 13.4 x 7.3
Carton size: width x depth x height [mm]	400 x 340 x 185
Form factor	Desktop
HARDWARE	
Display	-
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 40
Operating temperature [°F] / [°C]	+30 to +95 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 12
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	External power brick
Power type [AC/DC]	AC
Input ratings [Volts]	90-264
Input frequency [Hz]	50-60
Auto sense	n/a
Max. power draw [W]	90
Max. power draw @ 120V [Amps]	4
Max. power draw @ 230V [Amps]	2
Max. heat dissipation [W]	52
Max. heat dissipation [BTU]	180
Energy efficiency (average)	> 89%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Wireless antenna	✓
2x Barracuda L-shape rack mount bracket	✓

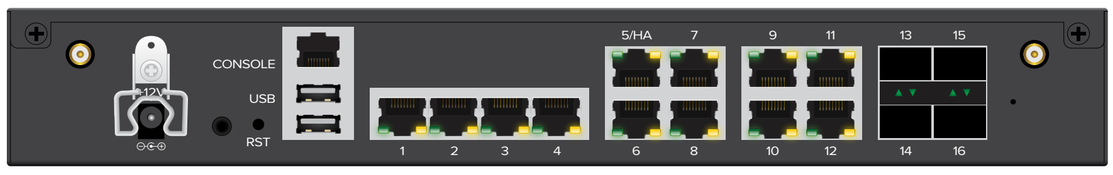
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

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F280C





INTERFACES	
Copper ethernet NICs (1 GbE)	12x
SFP fiber NICs (1 GbE)	4x
USB 3.0	2x
Serial / console	1x RJ45
Integrated WiFi (IEEE 802.11b/g/n)	✓
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	4.8
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	1.5
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	1.1
IPS throughput [Gbps] [c]	2.0
NGFW throughput [Gbps] [d]	1.6
Threat protection throughput [Gbps] [e]	1.5
Concurrent sessions	300,000
New sessions/s	12,000
Recommended number of concurrent users [f]	150-300
MEMORY	
RAM [GB]	4
MASS STORAGE	
Type	SSD
Size ([GB] or better)	100
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	5.1 / 2.3
Appliance size: width x depth x height [in]	11.8 x 8.6 x 1.7
Appliance size: width x depth x height [mm]	300 x 219 x 44
Weight carton with appliance [lbs] / [kg]	10.1 / 4.6
Carton size: width x depth x height [in]	15.7 x 13.4 x 7.3
Carton size: width x depth x height [mm]	400 x 340 x 185
Form factor	Desktop
HARDWARE	
Display	-
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 40
Operating temperature [°F] / [°C]	+30 to +95 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	10% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 12
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	External power brick
Power type [AC/DC]	AC
Input ratings [Volts]	90-264
Input frequency [Hz]	50-60
Auto sense	n/a
Max. power draw [W]	90
Max. power draw @ 120V [Amps]	4
Max. power draw @ 230V [Amps]	2
Max. heat dissipation [W]	52
Max. heat dissipation [BTU]	180
Energy efficiency (average)	> 89%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Wireless antenna	✓
2x Barracuda L-shape rack mount bracket	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

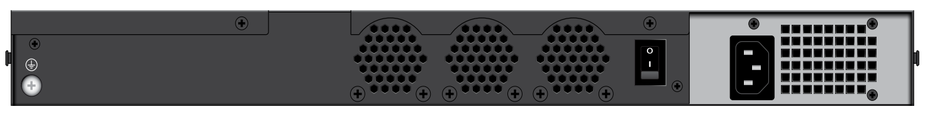
a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

SPECIFICATIONS - MID-RANGE MODELS

F380B





INTERFACES	
Copper ethernet NICs (1 GbE)	8x
SFP+ fiber NICs (10 GbE)	2x
USB 3.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	8.5
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	2.1
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	1.2
IPS throughput [Gbps] [c]	2.5
NGFW throughput [Gbps] [d]	2.0
Threat protection throughput [Gbps] [e]	1.7
Concurrent sessions	400,000
New sessions/s	15,000
Recommended number of concurrent users [f]	200-500
MEMORY	
RAM [GB]	4
MASS STORAGE	
Type	SSD
Size ([GB] or better)	120
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	18.5 / 8.4
Appliance size: width x depth x height [in]	17.3 x 17.3 x 1.7
Appliance size: width x depth x height [mm]	440 x 440 x 44
Weight carton with appliance [lbs] / [kg]	20.7 / 9.4
Carton size: width x depth x height [in]	29.7 x 21.85 x 8
Carton size: width x depth x height [mm]	755 x 555 x 203
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+33 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 6
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	174
Max. power draw @ 120V [Amps]	12
Max. power draw @ 230V [Amps]	6
Max. heat dissipation [W]	23
Max. heat dissipation [BTU]	77
Energy efficiency (average)	> 87%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	Optional

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

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F400C standard model





INTERFACES	
Copper ethernet NICs (1 GbE)	8x
SFP+ fiber NICs (10 GbE)	2x
USB 3.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	13
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	3.6
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	2.1
IPS throughput [Gbps] [c]	4.2
NGFW throughput [Gbps] [d]	3.7
Threat protection throughput [Gbps] [e]	3.1
Concurrent sessions	500,000
New sessions/s	20,000
Recommended number of concurrent users [f]	300-1,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	120
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	18.5 / 8.4
Appliance size: width x depth x height [in]	17.3 x 17.3 x 1.7
Appliance size: width x depth x height [mm]	440 x 440 x 44
Weight carton with appliance [lbs] / [kg]	20.7 / 9.4
Carton size: width x depth x height [in]	29.7 x 21.85 x 8
Carton size: width x depth x height [mm]	755 x 555 x 203
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 6
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	192
Max. power draw @ 120V [Amps]	14
Max. power draw @ 230V [Amps]	7
Max. heat dissipation [W]	29
Max. heat dissipation [BTU]	98
Energy efficiency (average)	> 85%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	Optional

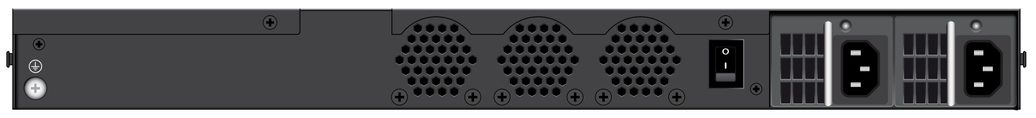
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e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F400C.F20





INTERFACES	
Copper ethernet NICs (1 GbE)	8x
SFP fiber NICs (1 GbE)	4x
SFP+ fiber NICs (10 GbE)	2x
USB 3.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	13
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	3.6
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	2.1
IPS throughput [Gbps] [c]	4.2
NGFW throughput [Gbps] [d]	3.7
Threat protection throughput [Gbps] [e]	3.1
Concurrent sessions	500,000
New sessions/s	20,000
Recommended number of concurrent users [f]	300-1,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	120
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	20.5 / 9.3
Appliance size: width x depth x height [in]	17.3 x 17.3 x 1.7
Appliance size: width x depth x height [mm]	440 x 440 x 44
Weight carton with appliance [lbs] / [kg]	22.7 / 10.3
Carton size: width x depth x height [in]	29.7 x 21.85 x 8
Carton size: width x depth x height [mm]	755 x 555 x 203
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 6
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	208
Max. power draw @ 120V [Amps]	15
Max. power draw @ 230V [Amps]	7.5
Max. heat dissipation [W]	31
Max. heat dissipation [BTU]	106
Energy efficiency (average)	> 85%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	Optional

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F600D.C10





INTERFACES	
Copper ethernet NICs (1 GbE)	18x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	15
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	3.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	2.6
IPS throughput [Gbps] [c]	4.8
NGFW throughput [Gbps] [d]	4.2
Threat protection throughput [Gbps] [e]	4.0
Concurrent sessions	2,100,000
New sessions/s	115,000
Recommended number of concurrent users [f]	1,000-4,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	240
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	22.0 / 10.0
Appliance size: width x depth x height [in]	17.3 x 19.7 x 1.7
Appliance size: width x depth x height [mm]	440 x 500 x 44
Weight carton with appliance [lbs] / [kg]	26.5 / 12.0
Carton size: width x depth x height [in]	25.6 x 23.2 x 7.9
Carton size: width x depth x height [mm]	650 x 590 x 200
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 5
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	300
Max. power draw @ 120V [Amps]	5
Max. power draw @ 230V [Amps]	2.6
Max. heat dissipation [W]	300
Max. heat dissipation [BTU]	1,024
Energy efficiency (average)	> 80%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F600D.C20





INTERFACES	
Copper ethernet NICs (1 GbE)	18x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	15
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	3.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	2.6
IPS throughput [Gbps] [c]	4.8
NGFW throughput [Gbps] [d]	4.2
Threat protection throughput [Gbps] [e]	4.0
Concurrent sessions	2,100,000
New sessions/s	115,000
Recommended number of concurrent users [f]	1,000-4,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	240
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	22.0 / 10.0
Appliance size: width x depth x height [in]	17.3 x 19.7 x 1.7
Appliance size: width x depth x height [mm]	440 x 500 x 44
Weight carton with appliance [lbs] / [kg]	26.5 / 12.0
Carton size: width x depth x height [in]	25.6 x 23.2 x 7.9
Carton size: width x depth x height [mm]	650 x 590 x 200
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 5
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	300
Max. power draw @ 120V [Amps]	5
Max. power draw @ 230V [Amps]	2.6
Max. heat dissipation [W]	300
Max. heat dissipation [BTU]	1,024
Energy efficiency (average)	> 80%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F600D.F10





INTERFACES	
Copper ethernet NICs (1 GbE)	10x
SFP fiber NICs (1 GbE)	8x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	15
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	3.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	2.6
IPS throughput [Gbps] [c]	4.8
NGFW throughput [Gbps] [d]	4.2
Threat protection throughput [Gbps] [e]	4.0
Concurrent sessions	2,100,000
New sessions/s	115,000
Recommended number of concurrent users [f]	1,000-4,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	240
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	22.0 / 10.0
Appliance size: width x depth x height [in]	17.3 x 19.7 x 1.7
Appliance size: width x depth x height [mm]	440 x 500 x 44
Weight carton with appliance [lbs] / [kg]	26.5 / 12.0
Carton size: width x depth x height [in]	25.6 x 23.2 x 7.9
Carton size: width x depth x height [mm]	650 x 590 x 200
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 5
POWER AND EFFICIENCY	
Power supply	Single
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	300
Max. power draw @ 120V [Amps]	5
Max. power draw @ 230V [Amps]	2.6
Max. heat dissipation [W]	300
Max. heat dissipation [BTU]	1,024
Energy efficiency (average)	> 80%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F600D.F20





INTERFACES	
Copper ethernet NICs (1 GbE)	10x
SFP fiber NICs (1 GbE)	8x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	15
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	3.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	2.6
IPS throughput [Gbps] [c]	4.8
NGFW throughput [Gbps] [d]	4.2
Threat protection throughput [Gbps] [e]	4.0
Concurrent sessions	2,100,000
New sessions/s	115,000
Recommended number of concurrent users [f]	1,000-4,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	240
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	22.0 / 10.0
Appliance size: width x depth x height [in]	17.3 x 19.7 x 1.7
Appliance size: width x depth x height [mm]	440 x 500 x 44
Weight carton with appliance [lbs] / [kg]	26.5 / 12.0
Carton size: width x depth x height [in]	25.6 x 23.2 x 7.9
Carton size: width x depth x height [mm]	650 x 590 x 200
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 5
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	300
Max. power draw @ 120V [Amps]	5
Max. power draw @ 230V [Amps]	2.6
Max. heat dissipation [W]	300
Max. heat dissipation [BTU]	1,024
Energy efficiency (average)	> 80%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F600D.E20





INTERFACES	
Copper ethernet NICs (1 GbE)	10x
SFP fiber NICs (1 GbE)	8x
SFP+ fiber NICs (10 GbE)	2x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	20
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	6.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	5.2
IPS throughput [Gbps] [c]	8.0
NGFW throughput [Gbps] [d]	6.4
Threat protection throughput [Gbps] [e]	5.8
Concurrent sessions	2,100,000
New sessions/s	115,000
Recommended number of concurrent users [f]	1,000-4,000
MEMORY	
RAM [GB]	8
MASS STORAGE	
Type	SSD
Size ([GB] or better)	240
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	22.0 / 10.0
Appliance size: width x depth x height [in]	17.3 x 19.7 x 1.7
Appliance size: width x depth x height [mm]	440 x 500 x 44
Weight carton with appliance [lbs] / [kg]	26.5 / 12.0
Carton size: width x depth x height [in]	25.6 x 23.2 x 7.9
Carton size: width x depth x height [mm]	650 x 590 x 200
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 5
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	300
Max. power draw @ 120V [Amps]	5
Max. power draw @ 230V [Amps]	2.6
Max. heat dissipation [W]	300
Max. heat dissipation [BTU]	1,024
Energy efficiency (average)	> 80%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

SPECIFICATIONS - HIGH-LEVEL MODELS

F800D.CCC





INTERFACES *	
Copper ethernet NICs (1 GbE)	24x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	42.0
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	11.5
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	10.0
IPS throughput [Gbps] [c]	12.9
NGFW throughput [Gbps] [d]	9.7
Threat protection throughput [Gbps] [e]	9.3
Concurrent sessions	3,000,000
New sessions/s	220,000
Recommended number of concurrent users [f]	4,000-6,000
MEMORY	
RAM ([GB] or better)	24
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 19.0
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CCC to CCE or CCF but not to a model CFE as such a sub model is not available for F800. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F800D.CCF





INTERFACES *	
Copper ethernet NICs (1 GbE)	16x
SFP fiber NICs (1 GbE)	8x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	42.0
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	11.5
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	10.0
IPS throughput [Gbps] [c]	12.9
NGFW throughput [Gbps] [d]	9.7
Threat protection throughput [Gbps] [e]	9.3
Concurrent sessions	3,000,000
New sessions/s	220,000
Recommended number of concurrent users [f]	4,000-6,000
MEMORY	
RAM [GB]	24
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 19.0
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CCC to CCE or CCF but not to a model CFE as such a sub model is not available for F800. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F800D.CCE





INTERFACES *	
Copper ethernet NICs (1 GbE)	16x
SFP+ fiber NICs (10 GbE)	4x
USB 2.0	2x
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	42.5
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	11.5
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	10.0
IPS throughput [Gbps] [c]	12.9
NGFW throughput [Gbps] [d]	9.7
Threat protection throughput [Gbps] [e]	9.3
Concurrent sessions	3,000,000
New sessions/s	220,000
Recommended number of concurrent users [f]	4,000-6,000
MEMORY	
RAM ([GB] or better)	24
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 10.9
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

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All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F900C.CCC





INTERFACES *	
Copper ethernet NICs (1 GbE)	32x
USB 2.0	2x
IPMI	1x RJ45
Serial / console	1x RJ45
Management	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	53.2
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.0
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	13.2
IPS throughput [Gbps] [c]	16.9
NGFW throughput [Gbps] [d]	13.0
Threat protection throughput [Gbps] [e]	12.2
Concurrent sessions	4,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	6,000-9,000
MEMORY	
RAM ([GB] or better)	64
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 19.0
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CCC to CCE or CFEQ but not to a model CCF as such a sub model is not available for F900. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F900C.CCE





INTERFACES *	
Copper ethernet NICs (1 GbE)	16x
SFP+ fiber NICs (10 GbE)	8x
USB 2.0	2x
IPMI	1x RJ45
Serial / console	1x RJ45
Management	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	53.2
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.0
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	13.2
IPS throughput [Gbps] [c]	16.9
NGFW throughput [Gbps] [d]	13.0
Threat protection throughput [Gbps] [e]	12.2
Concurrent sessions	4,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	6,000-9,000
MEMORY	
RAM ([GB] or better)	64
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 19.0
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CCC to CCE or CFEQ but not to a model CCF as such a sub model is not available for F900. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F900C.CFE





INTERFACES *	
Copper ethernet NICs (1 GbE)	8x
SFP fiber NICs (1 GbE)	8x
SFP+ fiber NICs (10 GbE)	8x
USB 2.0	2x
IPMI	1x RJ45
Serial / console	1x RJ45
Management	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	53.2
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.0
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	13.2
IPS throughput [Gbps] [c]	16.9
NGFW throughput [Gbps] [d]	13.0
Threat protection throughput [Gbps] [e]	12.2
Concurrent sessions	4,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	6,000-9,000
MEMORY	
RAM ([GB] or better)	64
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 19.0
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CCC to CCE or CFEQ but not to a model CCF as such a sub model is not available for F900. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F900C.CFEQ





INTERFACES *	
Copper ethernet NICs (1 GbE)	8x
SFP fiber NICs (1 GbE)	8x
SFP+ fiber NICs (10 GbE)	4x
QSFP+ fiber NICs (40 GbE)	2x
USB 2.0	2x
IPMI	1x RJ45
Serial / console	1x RJ45
Management	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	63.0
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	20.0
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	18.0
IPS throughput [Gbps] [c]	19.4
NGFW throughput [Gbps] [d]	15.2
Threat protection throughput [Gbps] [e]	14.1
Concurrent sessions	4,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	7,000-15,000
MEMORY	
RAM ([GB] or better)	64
MASS STORAGE	
Type	SSD
Size ([GB] or better)	430
SSD MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	24.0 / 10.9
Appliance size: width x depth x height [in]	17.2 x 21.63 x 1.7
Appliance size: width x depth x height [mm]	440 x 550 x 44
Weight carton with appliance [lbs] / [kg]	42.0 / 19.0
Carton size: width x depth x height [in]	22.5 x 30.25 x 9.0
Carton size: width x depth x height [mm]	572 x 770 x 229
Form factor	1U rack mount
HARDWARE	
Display	✓
Cooling	Fan
ENVIRONMENTAL	
Noise emission [db/A]	< 73.9
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-4 to +167 / -20 to +75
Operating humidity (non-condensing)	10% to 85%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 7
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	550
Max. power draw @ 120V [Amps]	7
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	~ 330
Max. heat dissipation [BTU]	~ 1,124
Energy efficiency (average)	88%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
Direct power-to-wall outlet	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

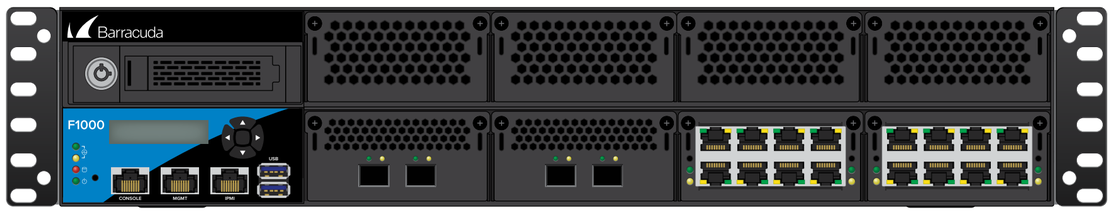
* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CCC to CCE or CFEQ but not to a model CCF as such a sub model is not available for F900. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

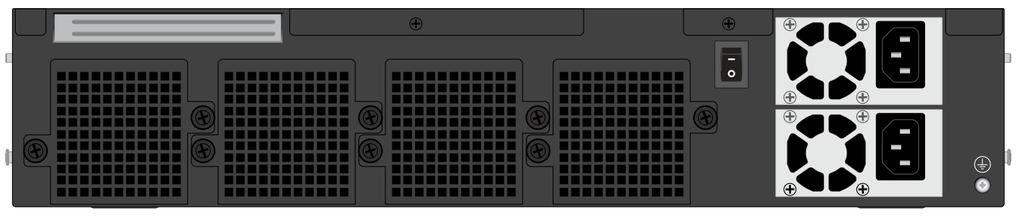
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F1000B.CE0





INTERFACES *	
Copper ethernet NICs (1 GbE)	16x
SFP+ fiber NICs (10 GbE)	4x
USB 3.0	2x
IPMI	1x RJ45
Management	1x RJ45
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	52
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	14
IPS throughput [Gbps] [c]	16
NGFW throughput [Gbps] [d]	14.8
Threat protection throughput [Gbps] [e]	13.5
Concurrent sessions	10,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	7,000-15,000
MEMORY	
RAM [GB]	128
MASS STORAGE	
Type	SSD
System disk size ([GB] or better)	960
System disk MTBF [hours]	1,200,000
Optional swappable disk size ([GB])	960
Optional swappable disk MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	55.1 / 25.0
Appliance size: width x depth x height [in]	17.3 x 27.9 x 3.4
Appliance size: width x depth x height [mm]	440 x 710 x 88
Weight carton with appliance [lbs] / [kg]	61.7 / 28.0
Carton size: width x depth x height [in]	23.2 x 34.3 x 11.4
Carton size: width x depth x height [mm]	590 x 870 x 290
Form factor	2U rack mount
HARDWARE	
Display	✓
Cooling	Fan, hot swap
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-49 to +167 / -45 to +75
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	810
Max. power draw @ 120V [Amps]	6.8
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	680
Max. heat dissipation [BTU]	2,322
Energy efficiency (average)	> 86%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CE0 to CE2 or CFE but not to a model CF2 as such a sub model is not available for F1000. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

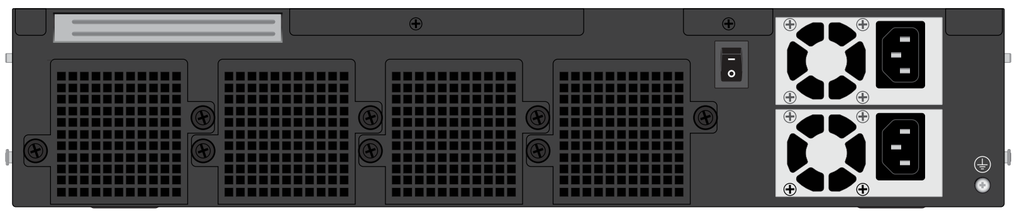
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F1000B.CE2





INTERFACES *	
Copper ethernet NICs (1 GbE)	32x
SFP+ fiber NICs (10 GbE)	8x
USB 3.0	2x
IPMI	1x RJ45
Management	1x RJ45
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	52
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	14
IPS throughput [Gbps] [c]	16
NGFW throughput [Gbps] [d]	14.8
Threat protection throughput [Gbps] [e]	13.5
Concurrent sessions	10,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	7,000-15,000
MEMORY	
RAM [GB]	128
MASS STORAGE	
Type	SSD
System disk size ([GB] or better)	960
System disk MTBF [hours]	1,200,000
Optional swappable disk size ([GB])	960
Optional swappable disk MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	55.1 / 25.0
Appliance size: width x depth x height [in]	17.3 x 27.9 x 3.4
Appliance size: width x depth x height [mm]	440 x 710 x 88
Weight carton with appliance [lbs] / [kg]	61.7 / 28.0
Carton size: width x depth x height [in]	23.2 x 34.3 x 11.4
Carton size: width x depth x height [mm]	590 x 870 x 290
Form factor	2U rack mount
HARDWARE	
Display	✓
Cooling	Fan, hot swap
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-49 to +167 / -45 to +75
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	810
Max. power draw @ 120V [Amps]	6.8
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	680
Max. heat dissipation [BTU]	2,322
Energy efficiency (average)	> 86%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CE0 to CE2 or CFE but not to a model CF2 as such a sub model is not available for F1000. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

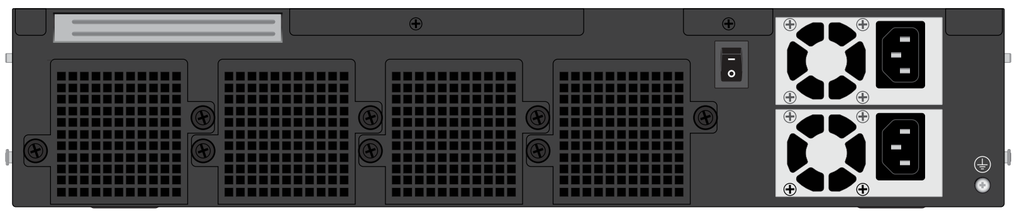
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c IPS throughput is measured with large UDP packets (MTU1500) and across multiple ports.
d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F1000B.CFE





INTERFACES *	
Copper ethernet NICs (1 GbE)	16x
SFP fiber NICs (1 GbE)	16x
SFP+ fiber NICs (10 GbE)	8x
USB 3.0	2x
IPMI	1x RJ45
Management	1x RJ45
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	52
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	14
IPS throughput [Gbps] [c]	16
NGFW throughput [Gbps] [d]	14.8
Threat protection throughput [Gbps] [e]	13.5
Concurrent sessions	10,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	7,000-15,000
MEMORY	
RAM [GB]	128
MASS STORAGE	
Type	SSD
System disk size ([GB] or better)	960
System disk MTBF [hours]	1,200,000
Optional swappable disk size ([GB])	960
Optional swappable disk MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	55.1 / 25.0
Appliance size: width x depth x height [in]	17.3 x 27.9 x 3.4
Appliance size: width x depth x height [mm]	440 x 710 x 88
Weight carton with appliance [lbs] / [kg]	61.7 / 28.0
Carton size: width x depth x height [in]	23.2 x 34.3 x 11.4
Carton size: width x depth x height [mm]	590 x 870 x 290
Form factor	2U rack mount
HARDWARE	
Display	✓
Cooling	Fan, hot swap
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-49 to +167 / -45 to +75
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	810
Max. power draw @ 120V [Amps]	6.8
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	680
Max. heat dissipation [BTU]	2,322
Energy efficiency (average)	> 86%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

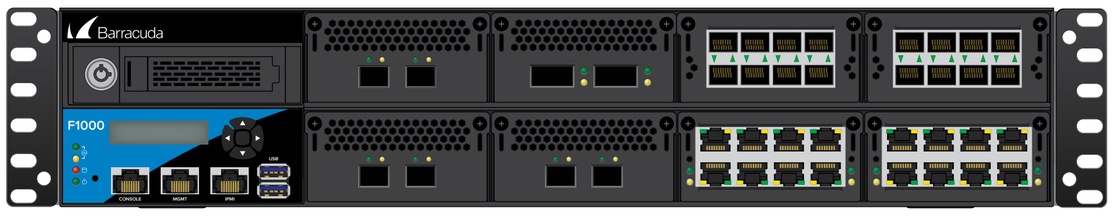
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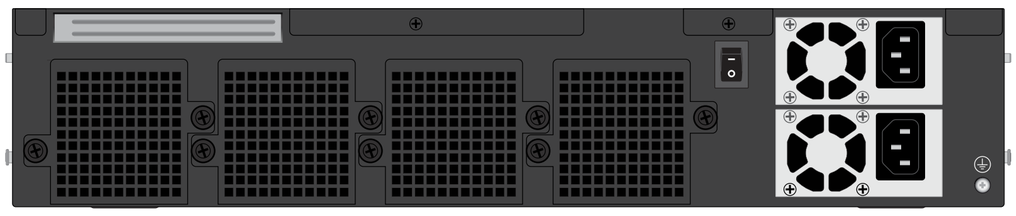
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d NGFW throughput is measured with IPS, application control, Advanced Threat Protection, and web filter enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

F1000B.CFEQ





INTERFACES *	
Copper ethernet NICs (1 GbE)	16x
SFP fiber NICs (1 GbE)	16x
SFP+ fiber NICs (10 GbE)	6x
QSFP+ fiber NICs (40 GbE)	2x
USB 3.0	2x
IPMI	1x RJ45
Management	1x RJ45
Serial / console	1x RJ45
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	52
SD-WAN throughput [AES-128, TINA std hash, Gbps] [b]	15.8
SD-WAN throughput [AES-256, TINA std hash, Gbps] [b]	14
IPS throughput [Gbps] [c]	16
NGFW throughput [Gbps] [d]	14.8
Threat protection throughput [Gbps] [e]	13.5
Concurrent sessions	10,000,000
New sessions/s	250,000
Recommended number of concurrent users [f]	7,000-15,000
MEMORY	
RAM [GB]	128
MASS STORAGE	
Type	SSD
System disk size ([GB] or better)	960
System disk MTBF [hours]	1,200,000
Optional swappable disk size ([GB])	960
Optional swappable disk MTBF [hours]	1,200,000
SIZE, WEIGHT, DIMENSIONS	
Weight appliance [lbs] / [kg]	55.1 / 25.0
Appliance size: width x depth x height [in]	17.3 x 27.9 x 3.4
Appliance size: width x depth x height [mm]	440 x 710 x 88
Weight carton with appliance [lbs] / [kg]	57.3 / 26.0
Carton size: width x depth x height [in]	23.2 x 34.3 x 11.4
Carton size: width x depth x height [mm]	590 x 870 x 290
Form factor	2U rack mount
HARDWARE	
Display	✓
Cooling	Fan, hot swap
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
Storage temperature [°F] / [°C]	-49 to +167 / -45 to +75
Operating humidity (non-condensing)	5% to 95%

MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 20
POWER AND EFFICIENCY	
Power supply	Dual hot swap
Power supply type	Internal
Power type [AC/DC]	AC
Input ratings [Volts]	100-240
Input frequency [Hz]	50-60
Auto sense	✓
Max. power draw [W]	810
Max. power draw @ 120V [Amps]	6.8
Max. power draw @ 230V [Amps]	3.5
Max. heat dissipation [W]	680
Max. heat dissipation [BTU]	2,322
Energy efficiency (average)	> 86%
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick and cables	✓
USB flash drive for recovery and installation	✓
Quick start guide	✓
2x Barracuda L-shape rack mount bracket	✓
Barracuda rail kit	✓

* Available sub models can be re-configured in the field. However, the re-configuration of network modules can be only applied to meet with available sub models. E.g., you may reconfigure from model CE0 to CE2 or CFE but not to a model CF2 as such a sub model is not available for F1000. Network modules may be replaced in case of failure. Spare parts for redundant power supply can be ordered separately.

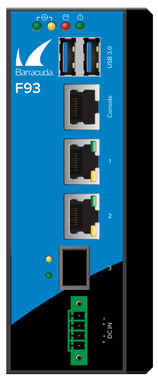
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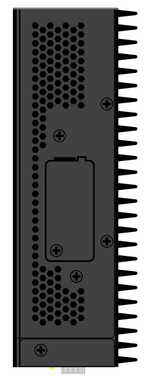
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e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

SPECIFICATIONS - DIN RAIL MOUNTABLE / RUGGED MODELS

F93A.R





INTERFACES	
Copper ethernet NICs (1 GbE RJ45)	2x
SFP fiber NICs (1 GbE)	1x
USB 3.0	2x
ESD protection	15KV
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	1.5
SD-WAN throughput [AES-128, TINA std hash, Mbps] [b]	240
SD-WAN throughput [AES-256, TINA std hash, Mbps] [b]	200
IPS throughput [Mbps] [c]	400
NGFW throughput [Mbps] [d]	400
Threat protection throughput [Mbps] [e]	380
Concurrent sessions	80,000
New sessions/s	8,000
Recommended number of concurrent users [f]	50-100
MEMORY	
RAM [GB]	4
MASS STORAGE	
Type	SSD
Size ([GB] or better)	100
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 61)	
Weight appliance [lbs] / [kg]	2.6 / 1.2
Appliance size: width x depth x height [in]	2.04 x 5.9 x 5.11
Appliance size: width x depth x height [mm]	52 x 150 x 130
Weight carton with appliance [lbs] / [kg]	4.8 / 2.2
Carton size: width x depth x height [in]	10 x 10 x 12
Carton size: width x depth x height [mm]	254 x 254 x 305
Form factor	Compact, DIN rail mount
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	-4 to +158 / -20 to +70
Storage temperature [°F] / [°C]	-67 to +185 / -55 to +85
Operating humidity (non-condensing)	5% to 95%
Magnetic isolation protection	1.5KV built-in

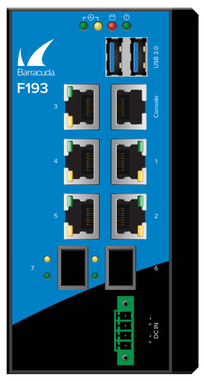
MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 11
DEFAULT POWER SUPPLY	
Power supply	Single
Power supply type	Phoenix 4-pin with lock
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply	Dual (via two optional PSUs)
Power supply type	External power brick
Power type [AC/DC]	DC
Input ratings [Volts]	12-36
Max. power draw [W]	60
Max. power draw @ 24V [Amps]	2.5
Max. heat dissipation [W]	60
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
Shock and vibration resistance	IEC 60068
	IEC 60950
	IEC 61000
	ISTA 2A
Protection classification	IP20
PACKAGING CONTENT	
Appliance	✓
DIN rail mount bracket	✓
Quick start guide	✓

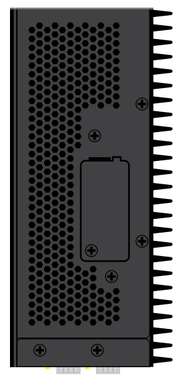
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e Threat protection throughput is measured with IPS, application control, Advanced Threat Protection, web filter, cloud-based antivirus, and TLS inspection enabled, based on BreakingPoint Realworld-IPS-Enterprise-Traffic-Mix, bidirectional across multiple ports.
f Depending on feature set; for more detailed information on sizing, please use the free sizing calculator on Barracuda Campus.
g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

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F193A.R





INTERFACES	
Copper ethernet NICs (1 GbE RJ45)	5x
SFP fiber NICs (1 GbE)	2x
USB 3.0	2x
ESD protection	15KV
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput [Gbps] [a]	2.1
SD-WAN throughput [AES-128, TINA std hash, Mbps] [b]	320
SD-WAN throughput [AES-256, TINA std hash, Mbps] [b]	300
IPS throughput [Mbps] [c]	790
NGFW throughput [Mbps] [d]	800
Threat protection throughput [Mbps] [e]	700
Concurrent sessions	100,000
New sessions/s	9,000
Recommended number of concurrent users [f]	75-150
MEMORY	
RAM [GB]	4
MASS STORAGE	
Type	SSD
Size ([GB] or better)	100
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 62)	
Weight appliance [lbs] / [kg]	3.1 / 1.4
Appliance size: width x depth x height [in]	2.67 x 5.9 x 5.11
Appliance size: width x depth x height [mm]	68 x 150 x 130
Weight carton with appliance [lbs] / [kg]	4.8 / 2.33
Carton size: width x depth x height [in]	10 x 10 x 12
Carton size: width x depth x height [mm]	254 x 254 x 305
Form factor	Compact, DIN rail mount
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	n/a
Operating temperature [°F] / [°C]	-4 to +158 / -20 to +70
Storage temperature [°F] / [°C]	-67 to +185 / -55 to +85
Operating humidity (non-condensing)	5% to 95%
Magnetic isolation protection	1.5KV built-in

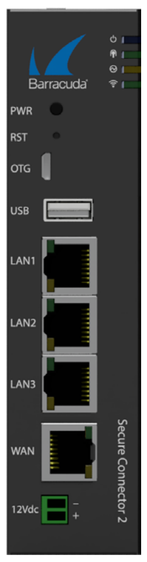
MTBF [SYSTEM]	
MTBF [yrs.] [g]	> 11
DEFAULT POWER SUPPLY	
Power supply	Single
Power supply type	Phoenix 4-pin with lock
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	DC
Input ratings [Volts]	12-36
Max. power draw [W]	60
Max. power draw @ 24V [Amps]	2.5
Max. heat dissipation [W]	60
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
Shock and vibration resistance	IEC 60068
	IEC 60950
	IEC 61000
	ISTA 2A
Protection classification	IP20
PACKAGING CONTENT	
Appliance	✓
DIN rail mount bracket	✓
Quick start guide	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Firewall throughput measured with large UDP packets (MTU1500), bi-directional across multiple ports.
b SD-WAN throughput is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
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g MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

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Secure Connector FSC20







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Micro-USB OTG	1
WiFi (access point / client mode)	-
SUPPORTED CELLULAR NETWORKS	
GSM / UMTS	-
4G / LTE	-
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	N/A
Site performance (up to) (AES-128, SHA) [Mbps][a]	30
MEMORY	
RAM [GB]	1
MASS STORAGE	
Type	Micro SD
Size [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 63)	
Weight appliance [lbs] / [kg]	1.21 / 0.55
Appliance size: width x depth x height [in]	1.5 x 5.5 x 5.9
Appliance size: width x depth x height [mm]	37 x 140 x 150
Weight carton with appliance [lbs] / [kg]	1.98 / 0.9
Carton size: width x depth x height [in]	2.6 x 9.1 x 10.8
Carton size: width x depth x height [mm]	65 x 230 x 275
Form factor	Compact, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

MTBF [SYSTEM]	
MTBF [yrs.][b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	AC
Input rating [Volts]	100-240
Input frequency [Hz]	50-60
Max. power draw [W]	40
Max. power draw @ 12V [Amps.]	3.33
Max. heat dissipation [W]	40
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
USB type A to MicroUSB cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
2x WiFi antenna	-
2x Cellular antenna with 1.5m cable	-

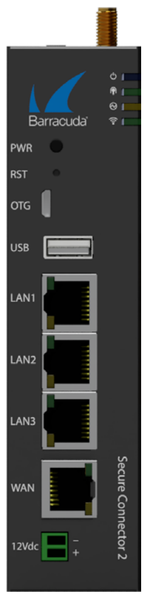
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.

b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC21







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Micro-USB OTG	1
WiFi (access point / client mode)	✓
SUPPORTED CELLULAR NETWORKS	
GSM / UMTS	-
4G / LTE	-
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	80
Site performance (up to) (AES-128, SHA) [Mbps][a]	30
MEMORY	
RAM [GB]	1
MASS STORAGE	
Type	Micro SD
Size [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 64)	
Weight appliance [lbs] / [kg]	1.21 / 0.55
Appliance size: width x depth x height [in]	1.5 x 5.5 x 5.9
Appliance size: width x depth x height [mm]	37 x 140 x 150
Weight carton with appliance [lbs] / [kg]	1.98 / 0.9
Carton size: width x depth x height [in]	2.6 x 9.1 x 10.8
Carton size: width x depth x height [mm]	65 x 230 x 275
Form factor	Compact, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

MTBF [SYSTEM]	
MTBF [yrs.][b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	AC
Input rating [Volts]	100-240
Input frequency [Hz]	50-60
Max. power draw [W]	40
Max. power draw @ 12V [Amps.]	3.33
Max. heat dissipation [W]	40
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
USB type A to MicroUSB cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
2x WiFi antenna	✓
2x Cellular antenna with 1.5m cable	-

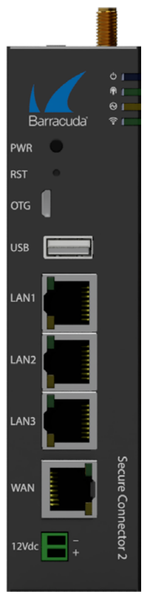
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.

b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC24







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Micro-USB OTG	1
WiFi (access point / client mode)	-
SUPPORTED CELLULAR NETWORKS	
GSM / UMTS	✓ (EMEA / APAC)
4G / LTE	✓ (EMEA / APAC)
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	N/A
Site performance (up to) (AES-128, SHA) [Mbps] [a]	30
MEMORY	
RAM [GB]	1
MASS STORAGE	
Type	Micro SD
Size [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 65)	
Weight appliance [lbs] / [kg]	1.21 / 0.55
Appliance size: width x depth x height [in]	1.5 x 5.5 x 5.9
Appliance size: width x depth x height [mm]	37 x 140 x 150
Weight carton with appliance [lbs] / [kg]	1.98 / 0.9
Carton size: width x depth x height [in]	2.6 x 9.1 x 10.8
Carton size: width x depth x height [mm]	65 x 230 x 275
Form factor	Compact, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

MTBF [SYSTEM]	
MTBF [yrs.] [b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	AC
Input rating [Volts]	100-240
Input frequency [Hz]	50-60
Max. power draw [W]	40
Max. power draw @ 12V [Amps.]	3.33
Max. heat dissipation [W]	40
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
USB type A to MicroUSB cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
2x WiFi antenna	-
2x Cellular antenna with 1.5m cable	✓

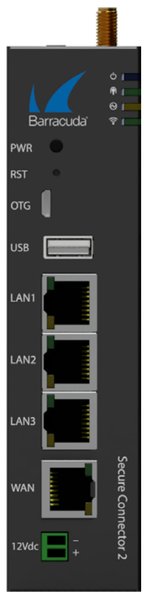
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.

b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC25







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Micro-USB OTG	1
WiFi (access point / client mode)	✓
SUPPORTED CELLULAR NETWORKS	
GSM / UMTS	✓ (EMEA / APAC)
4G / LTE	✓ (EMEA / APAC)
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	80
Site performance (up to) (AES-128, SHA) [Mbps][a]	30
MEMORY	
RAM [GB]	1
MASS STORAGE	
Type	Micro SD
Size [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 66)	
Weight appliance [lbs] / [kg]	1.21 / 0.55
Appliance size: width x depth x height [in]	1.5 x 5.5 x 5.9
Appliance size: width x depth x height [mm]	37 x 140 x 150
Weight carton with appliance [lbs] / [kg]	1.98 / 0.9
Carton size: width x depth x height [in]	2.6 x 9.1 x 10.8
Carton size: width x depth x height [mm]	65 x 230 x 275
Form factor	Compact, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	+30 to +105 / 0 to +40
Storage temperature [°F] / [°C]	-5 to +160 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

MTBF [SYSTEM]	
MTBF [yrs.][b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	AC
Input rating [Volts]	100-240
Input frequency [Hz]	50-60
Max. power draw [W]	40
Max. power draw @ 12V [Amps.]	3.33
Max. heat dissipation [W]	40
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
USB type A to MicroUSB cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
2x WiFi antenna	✓
2x Cellular antenna with 1.5m cable	✓

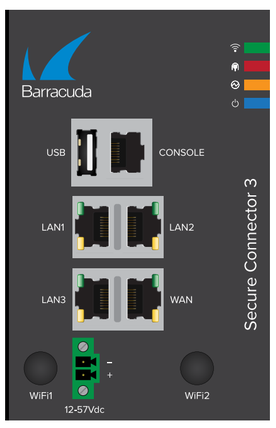
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

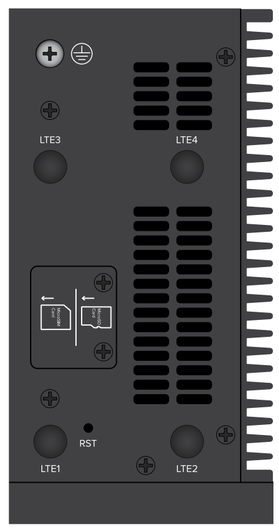
a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.

b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC30







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Serial console	RJ45
WiFi (access point / client mode)	N/A
SUPPORTED CELLULAR NETWORKS	
4G / LTE	N/A
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	N/A
Site performance (up to) (AES-128, SHA) [Mbps][a]	30
MEMORY	
RAM [GB]	2
MASS STORAGE	
Size On-board [GB]	8
Size Micro SD [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 67)	
Weight appliance [lbs] / [kg]	2.42 / 1.1
Appliance size: width x depth x height [in]	3.03 x 4.72 x 5.91
Appliance size: width x depth x height [mm]	77 x 120 x 150
Weight carton with appliance [lbs] / [kg]	t.b.a. / t.b.a.
Carton size: width x depth x height [in]	t.b.a.
Carton size: width x depth x height [mm]	t.b.a.
Form factor	Rugged, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	-4 to +158 / -20 to +70
Storage temperature [°F] / [°C]	-4 to +158 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

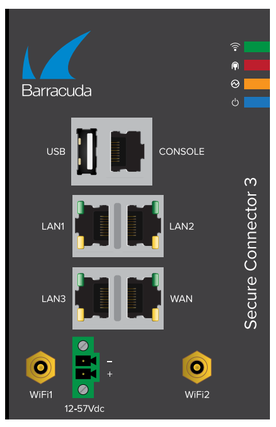
MTBF [SYSTEM]	
MTBF [yrs.][b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	DC
Input rating [Volts]	12-36
Max. power draw [W]	60
Max. power draw @ 12V [Amps.]	2.5
Max. heat dissipation [W]	60
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
Shock and vibration resistance	IEC 60068
	IEC 60950
	IEC 61000
	ISTA 2A
Protection classification	IP20 standard
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓

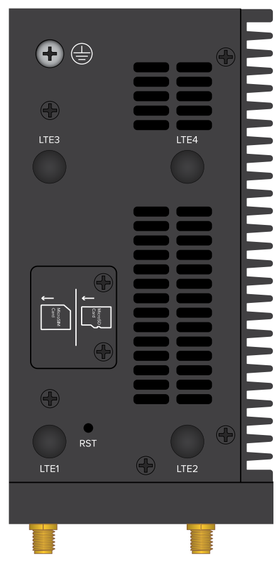
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC31







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Serial console	RJ45
WiFi (access point / client mode)	✓
SUPPORTED CELLULAR NETWORKS	
4G / LTE	N/A
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	80
Site performance (up to) (AES-128, SHA) [Mbps] [a]	30
MEMORY	
RAM [GB]	2
MASS STORAGE	
Size On-board [GB]	8
Size Micro SD [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 68)	
Weight appliance [lbs] / [kg]	2.42 / 1.1
Appliance size: width x depth x height [in]	3.03 x 4.72 x 5.91
Appliance size: width x depth x height [mm]	77 x 120 x 150
Weight carton with appliance [lbs] / [kg]	t.b.a. / t.b.a.
Carton size: width x depth x height [in]	t.b.a.
Carton size: width x depth x height [mm]	t.b.a.
Form factor	Rugged, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	-4 to +158 / -20 to +70
Storage temperature [°F] / [°C]	-4 to +158 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

MTBF [SYSTEM]	
MTBF [yrs.] [b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply type	Single, ext. power brick
Power type [AC/DC]	DC
Input rating [Volts]	12-36
Max. power draw [W]	60
Max. power draw @ 12V [Amps.]	2.5
Max. heat dissipation [W]	60
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
Shock and vibration resistance	IEC 60068
	IEC 60950
	IEC 61000
	ISTA 2A
Protection classification	IP20 standard
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
2x WiFi antenna	✓
4x Cellular antenna with 1.5m cable	✓

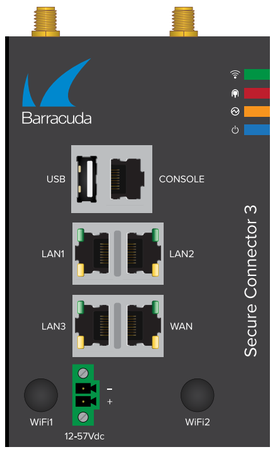
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

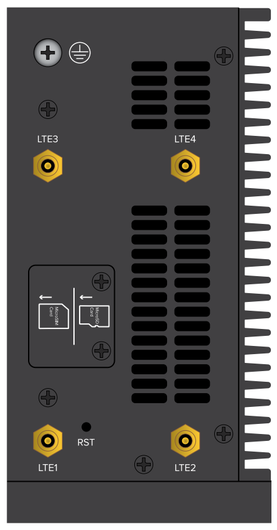
a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.

b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC34







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Serial console	RJ45
WiFi (access point / client mode)	N/A
SUPPORTED CELLULAR NETWORKS	
4G / LTE	✓
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	N/A
Site performance (up to) (AES-128, SHA) [Mbps] [a]	30
MEMORY	
RAM [GB]	2
MASS STORAGE	
Size On-board [GB]	8
Size Micro SD [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 69)	
Weight appliance [lbs] / [kg]	2.42 / 1.1
Appliance size: width x depth x height [in]	3.03 x 4.72 x 5.91
Appliance size: width x depth x height [mm]	77 x 120 x 150
Weight carton with appliance [lbs] / [kg]	t.b.a. / t.b.a.
Carton size: width x depth x height [in]	t.b.a.
Carton size: width x depth x height [mm]	t.b.a.
Form factor	Rugged, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	-4 to +158 / -20 to +70
Storage temperature [°F] / [°C]	-4 to +158 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

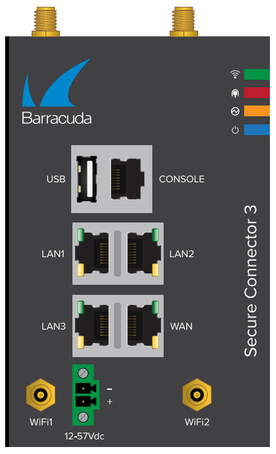
MTBF [SYSTEM]	
MTBF [yrs.] [b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply	Single, ext. power brick
Power type [AC/DC]	DC
Input rating [Volts]	12-36
Max. power draw [W]	60
Max. power draw @ 12V [Amps.]	2.5
Max. heat dissipation [W]	60
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
Shock and vibration resistance	IEC 60068
	IEC 60950
	IEC 61000
	ISTA 2A
Protection classification	IP20 standard
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
4x Cellular antenna with 1.5m cable	✓

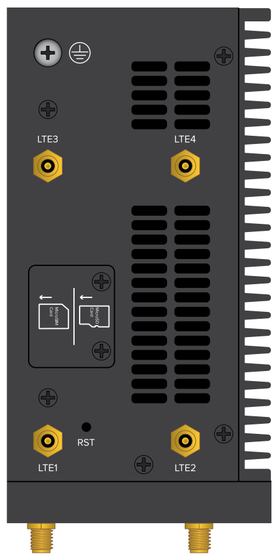
All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Secure Connector FSC35







INTERFACES	
WAN copper ethernet NICs (PoE-recipient; 1 GbE)	1x
LAN copper NICs (LAN switch; 1 GbE)	3x
USB 2.0	1
Serial console	RJ45
WiFi (access point / client mode)	✓
SUPPORTED CELLULAR NETWORKS	
4G / LTE	✓
PERFORMANCE [AS OF FIRMWARE RELEASE 9.0.X]	
Firewall throughput (UDP) [Mbps]	300
WiFi AP mode throughput (UDP) [Mbps]	80
Site performance (up to) (AES-128, SHA) [Mbps] [a]	30
MEMORY	
RAM [GB]	2
MASS STORAGE	
Size On-board [GB]	8
Size Micro SD [GB]	16
SIZE, WEIGHT, DIMENSIONS (ALSO SEE PAGE 70)	
Weight appliance [lbs] / [kg]	2.42 / 1.1
Appliance size: width x depth x height [in]	3.03 x 4.72 x 5.91
Appliance size: width x depth x height [mm]	77 x 120 x 150
Weight carton with appliance [lbs] / [kg]	t.b.a. / t.b.a.
Carton size: width x depth x height [in]	t.b.a.
Carton size: width x depth x height [mm]	t.b.a.
Form factor	Rugged, DIN rail
HARDWARE	
Cooling	Fanless
ENVIRONMENTAL	
Noise emission [db/A]	N/A
Operating temperature [°F] / [°C]	-4 to +158 / -20 to +70
Storage temperature [°F] / [°C]	-4 to +158 / -20 to +70
Operating humidity (non-condensing)	5% to 95%

This appliance is PoE-recipient compatible and, thus, has no external power brick included. However, an external power brick can be ordered as an option.

MTBF [SYSTEM]	
MTBF [yrs.] [b]	> 5
DEFAULT POWER SUPPLY	
AuxDC in voltage range (2-pin terminal block MC420 3.5mm) [V]	12 - 57
WAN Port PoE Voltage range [V]	37 - 54
Compatible PoE provider (PSE)	IEEE 802.3at (Type 2) PD
OPTIONAL POWER SUPPLY AND EFFICIENCY	
Power supply	Single, ext. power brick
Power type [AC/DC]	DC
Input rating [Volts]	12-36
Max. power draw [W]	60
Max. power draw @ 12V [Amps.]	2.5
Max. heat dissipation [W]	60
Max. heat dissipation [BTU]	205
Energy efficiency [average]	> 83%
Operating temperature [°F] / [°C]	+32 to +104 / 0 to +40
CERTIFICATIONS AND COMPLIANCE (ALSO SEE PAGE 99 FF)	
CE emissions	✓
CE electrical safety	✓
FCC emissions	✓
ROHS compliant	✓
Shock and vibration resistance	IEC 60068
	IEC 60950
	IEC 61000
	ISTA 2A
Protection classification	IP20 standard
PACKAGING CONTENT	
Appliance	✓
Straight network cable	✓
External power brick & cables	Optional
Quick start guide	✓
1x DIN rail bracket	✓
1x 2-pin power connector	✓
2x WiFi antenna	✓
4x Cellular antenna with 1.5m cable	✓

All performance values are measured under optimized conditions and are to be considered as „up to“ values and may vary depending on system configuration and infrastructure:

a Site performance is based on 1415 Byte UDP packets, bidirectional using BreakingPoint traffic generator.
b MTBF according to common usage. High load on SSD and extreme environmental conditions might reduce MTBF.

Errors and omissions excepted. Specifications subject to change without notice.

Additional hardware options

HARDWARE OPTION	F12A	F18B	F80B	F180B	F280C	F380B	F400C	F600D	F800D	F900C	F1000B
Built-in WiFi option	-	-	●	●	●	-	-	-	-	-	-
Spare power supply unit for sub-models with dual power supply	-	-	-	-	-	-	○	○	○	○	-
Additional SSD, swappable	-	-	-	-	-	-	-	-	-	-	○
L-shape rack mount bracket (2x)	○	○	○	●	●	●	●	●	●	●	●
Rail kit	-	-	-	-	-	○	○	●	●	●	●
USB modem	○	○	○	○	○	○	○	○	○	○	○

○ optional ● included

Built-in Wi-Fi option

Barracuda CloudGen Firewall appliances F80B, F180B, and F280C offer built-in Wi-Fi.



Figure 14 - Rear view on model F80B with Wi-Fi antennas mounted

ITEM	SPECIFICATION
Standards	802.11b/g/n
Operating frequency	802.11b/g/n ISM Band: 2.412 ~ 2.4835 GHz
Modulation	802.11b: DSSS (DBPSK, DQPSK, CCK)
	802.11g: OFDM (BPSK, QPSK, 16-QAM, 64-QAM)
	802.11n: OFDM (BPSK, QPSK, 16-QAM, 64-QAM)
Output power	802.11b: 17dBm ± 2dBm
	802.11g: 16dBm ± 2dBm
	802.11gn HT20: 15dBm ± 2dBm@MCS7
	802.11gn HT40: 14dBm ± 2dBm@MCS7
Receive sensitivity	802.11b: ≤ -85dBm@11Mbps
	802.11g: ≤ -76dBm@54Mbps
	802.11gn HT20: ≤ -75dBm@MCS7
	802.11gn HT40: ≤ -72dBm@MCS7
Wireless security	64/128-bits WEP
	WPA
	WPA2

Spare power supply unit

The spare power supply unit is available for model featuring standard dual power supply, i.e., F400C.F20, F600D.C20, F600D.F20, F600D.E20, all F800D and F900C sub-models.

Additional SSD, swappable

For CloudGen Firewall appliance F1000B.CE0, F1000B.CE2, F1000B.CE2, F1000B.CFE, and F1000B.CFEQ an additional 960GB SSD can be mounted accessing the front.

Barracuda L-shape rack mount bracket

The L-shape rack mount brackets are used for mounting desktop models in 1U Standard 19” rack slots. For CloudGen Firewall F12A, F18B, and F80B, the brackets are an optional item and, thus, to be ordered separately.



USB modem for enhanced connectivity

Connectivity is the most business-critical part of a network. Depending on the location and use case, the Barracuda USB modem provides multiple benefits to an organization's network:

- Acting as the **primary uplink option** is possibly the most obvious scenario. A use case can be connecting remote sites without wired uplinks as it provides a cost effective, rapidly deployable, and ultra-reliable way to get a site online.
- Acting as the **failover uplink** is the second way, the USB modem can push the connectivity of a site. As soon as the default cable or fiber link goes down, CloudGen Firewall automatically moves traffic that was configured as business critical to the uplink provided by the USB modem. To provide best possible Quality-of-Service, all traffic is shaped and prioritized as defined in the configuration. And when the default uplink is available again, all traffic returns to default uplink.
- Acting as **part of the SD-WAN orchestration** is the most versatile scenario. CloudGen Firewall utilizes the uplink provided by the modem as a regular part of the SD-WAN scenario and orchestrates traffic distribution according to the automatic quality measurements around available bandwidth and latency.

Who can benefit from Barracuda USB modems?

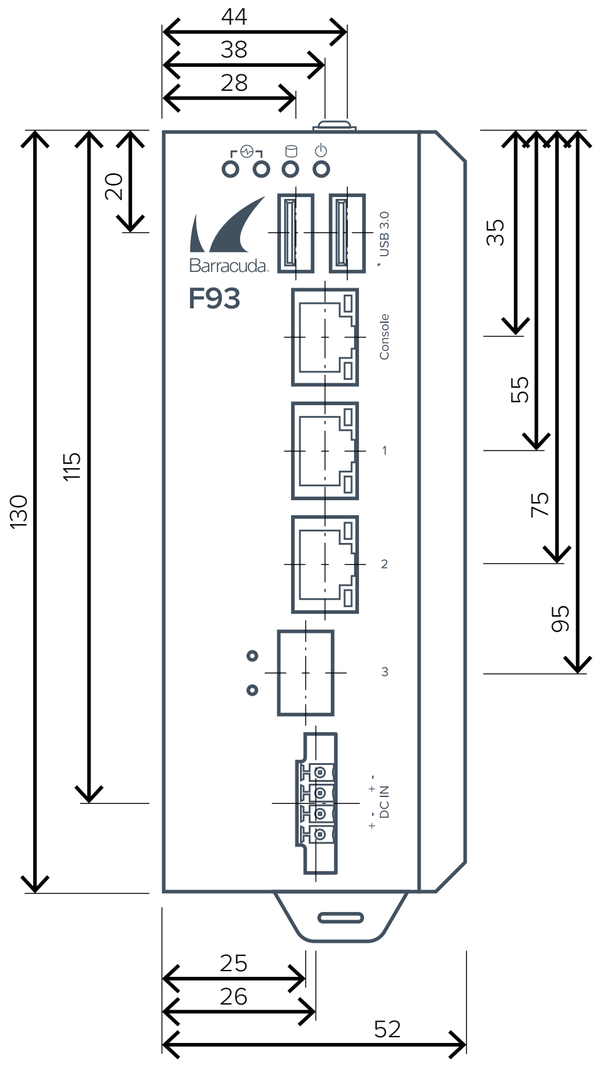
- Enterprises looking for a cost effective secondary link in order to quickly increase total overall bandwidth and to reduce traffic volume on the primary link
- Enterprises relying on high quality WAN backup and WAN connectivity for business critical traffic
- Branch offices and remote sites looking for a cost effective alternative to regular fixed line uplinks
- Branch offices and remote sites looking to bridge the gap until WAN connectivity become available
- Branch offices and remote sites residing in areas without a good selection of affordable or reliable Internet uplinks
- Construction sites, retail, rapid deployments, and portable businesses requiring quick access to Internet

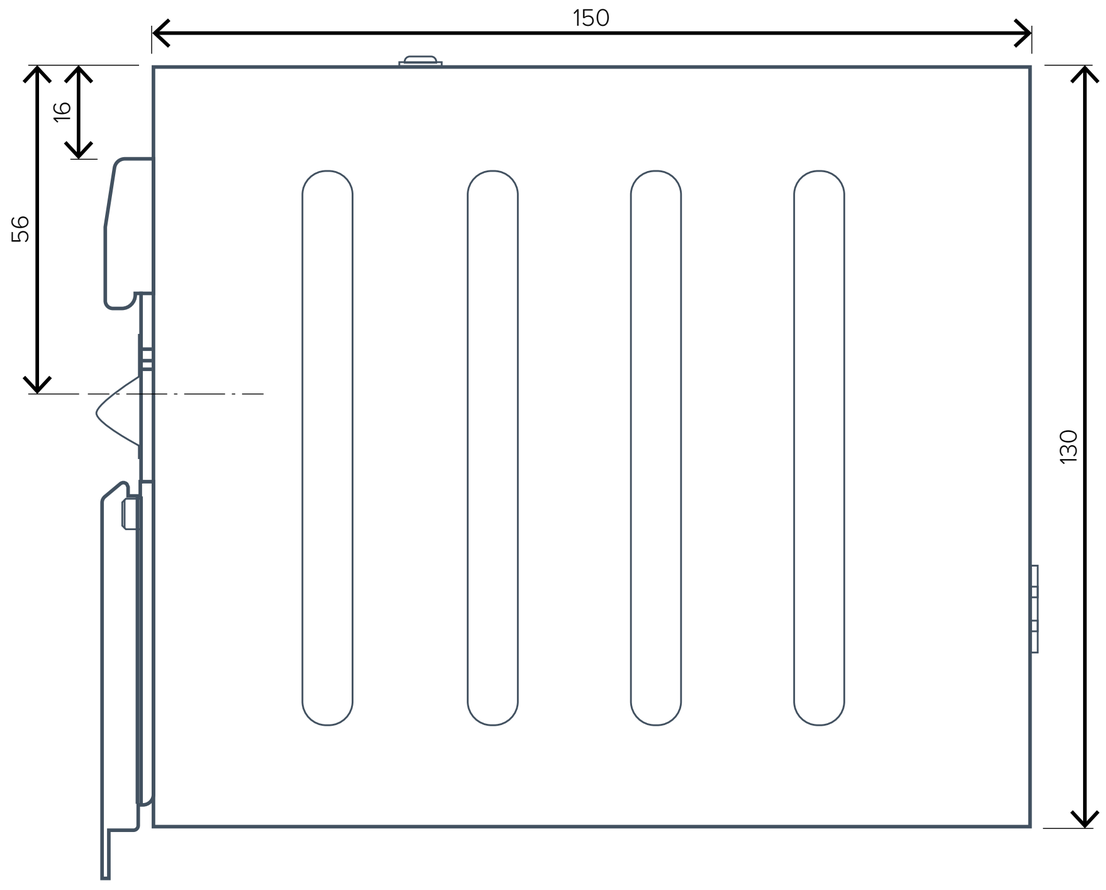
Note:

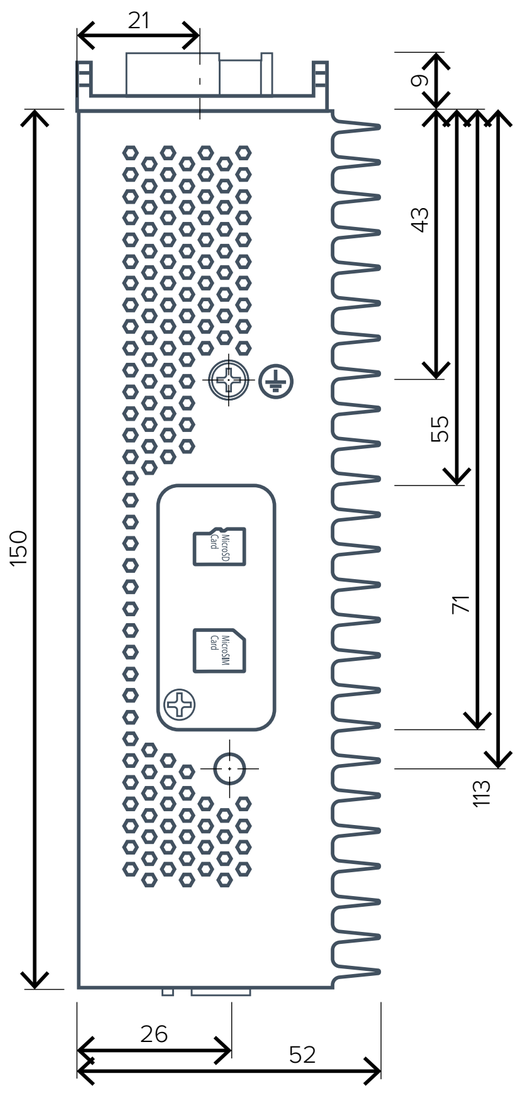
Barracuda cannot guarantee signal reception. In case your server rooms are located in a basement or in a place with insufficient signal reception make sure that the signal quality is sufficient, especially prior to purchasing large quantities. SIM card is not included and has to be obtained through a mobile phone provider.

	MODEM M40B
Region	EMEA / APAC
Supported carriers	Global (some network carriers might request individual certifications)
PERFORMANCE	
Download / Upload	up to 1.2 Gbps / up to 150 Mbps
SUPPORTED FREQUENCIES AND DATA RATES	
RF bands	LTE FDD: B1, B3, B25(B2), B66(B4), B26(B5/B18/B19), B7, B8, B12(B17), B13, B14(FirstNet), B20, B28, B29, B30, B32, B71
	LTE TDD: B38, B39, B40, B41, B42, B43, B46, B48 (CBRS/OnGo)
	3G B1, B2, B4, B5(B19), B8, B9
Data rates	Data only module
	LTE Cat. 18 3GPP Rel. 12 - Up to 1.2 Gbps DL w/4x4 MIMO +3 CA
	HSDPA Cat 24, HSUPA Cat 8
GSM	850/900/1800/1900 MHz
ENVIRONMENTAL DATA, SIZE, AND CERTIFICATIONS	
Operating temperature [°F] / [°C]	14 to 140 / -10 to +60
Size: width x depth x height [in] / [mm]	3.03 x 2.15 x 0.82 / 77 x 54.5 x 20.8
Net weight [g]	150
Approvals	FCC/IC, PTCRB 9 (North America)
	FCC Part 96 CBRS (USA)
	CE, GCF (Europe)
	AU IC-Tick (Australia)
ELECTRICAL DATA	
Power supply DC	5 VDC via USB Interface
SIM interface	3VDC 6 pin
USB Interface	Micro USB 2.0

CloudGen Firewall F93A.R



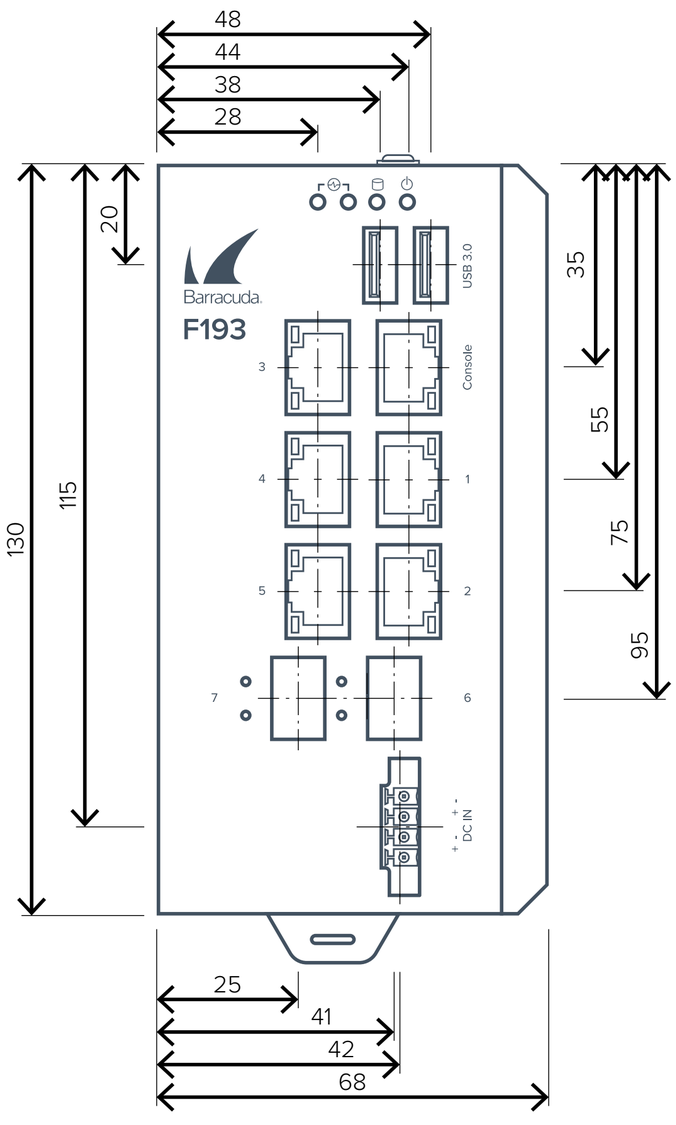


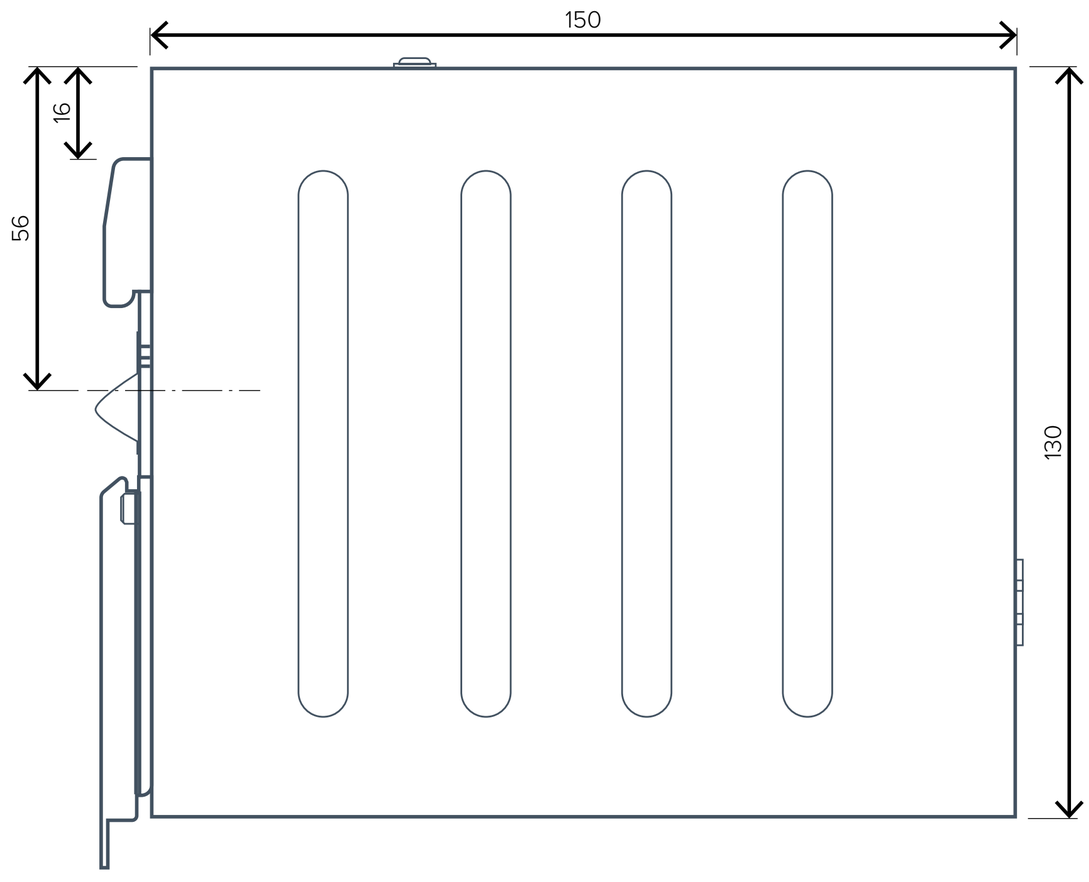


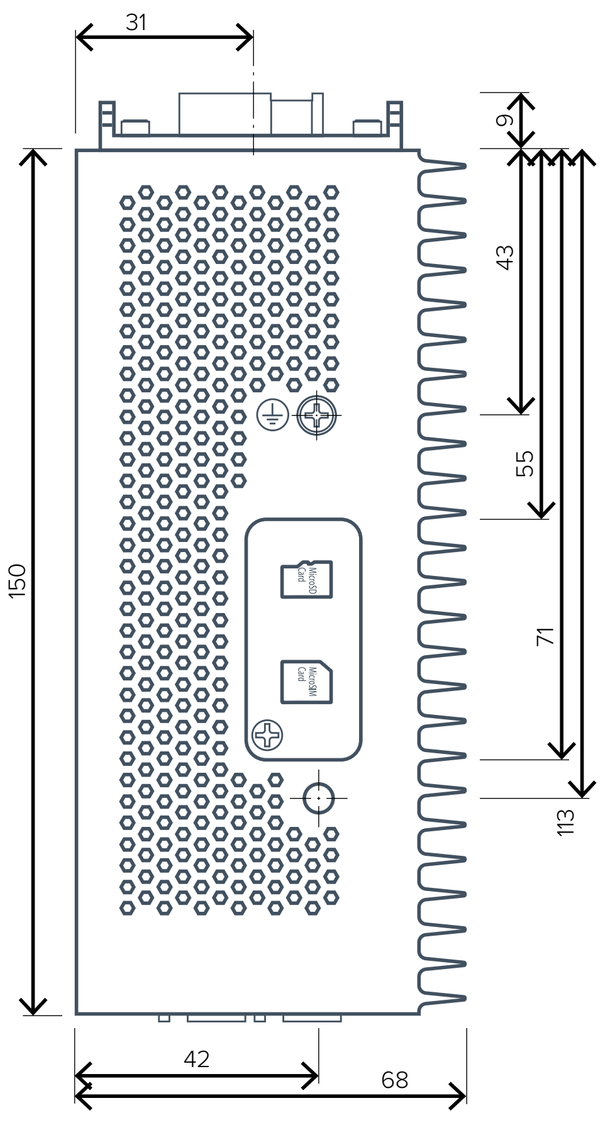


No scale illustration.
All dimensions in mm.

CloudGen Firewall F193A.R



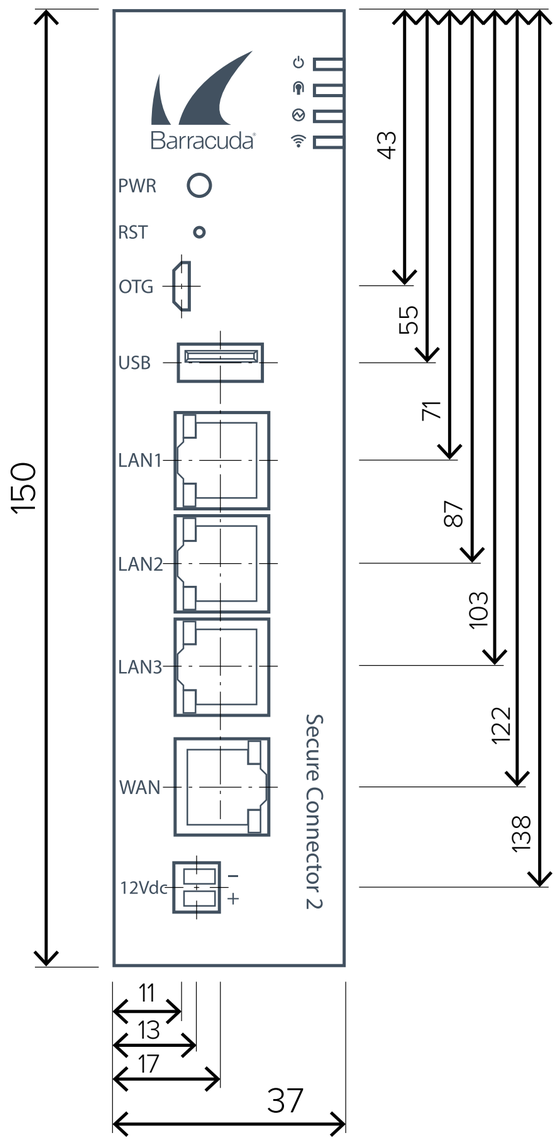


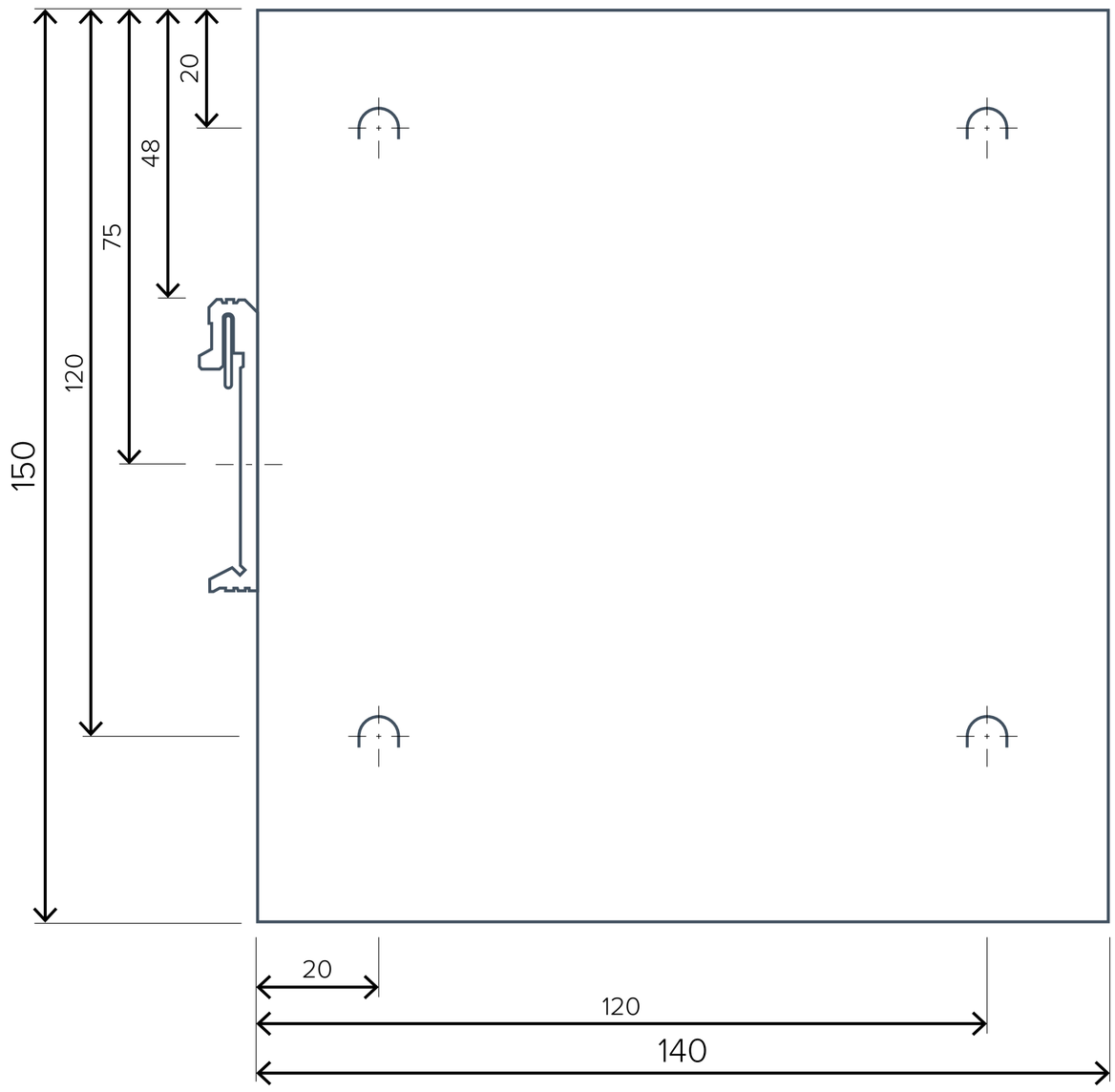


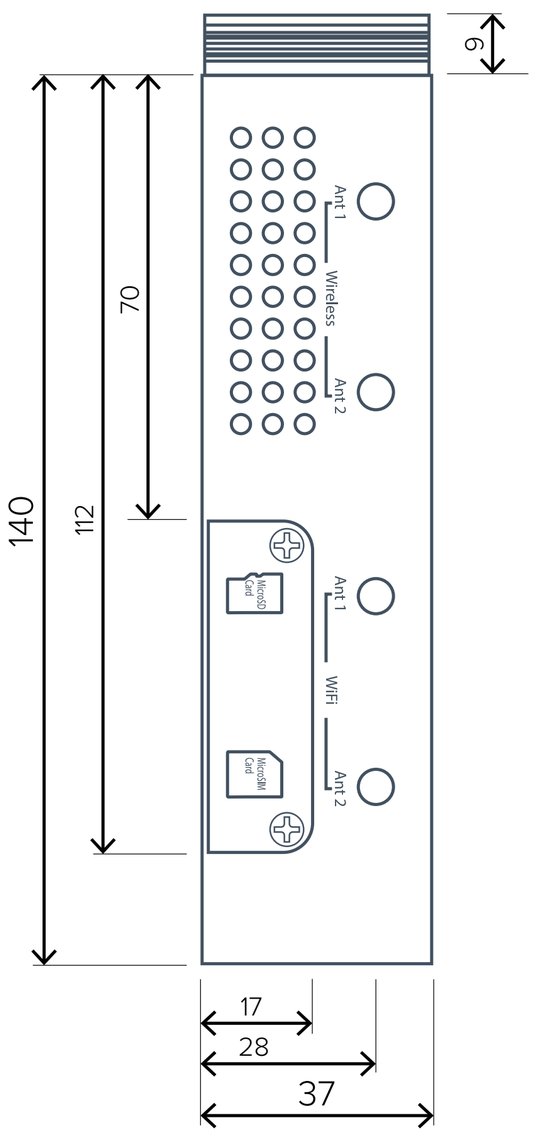


No scale illustration.
All dimensions in mm.

Secure Connector FSC20



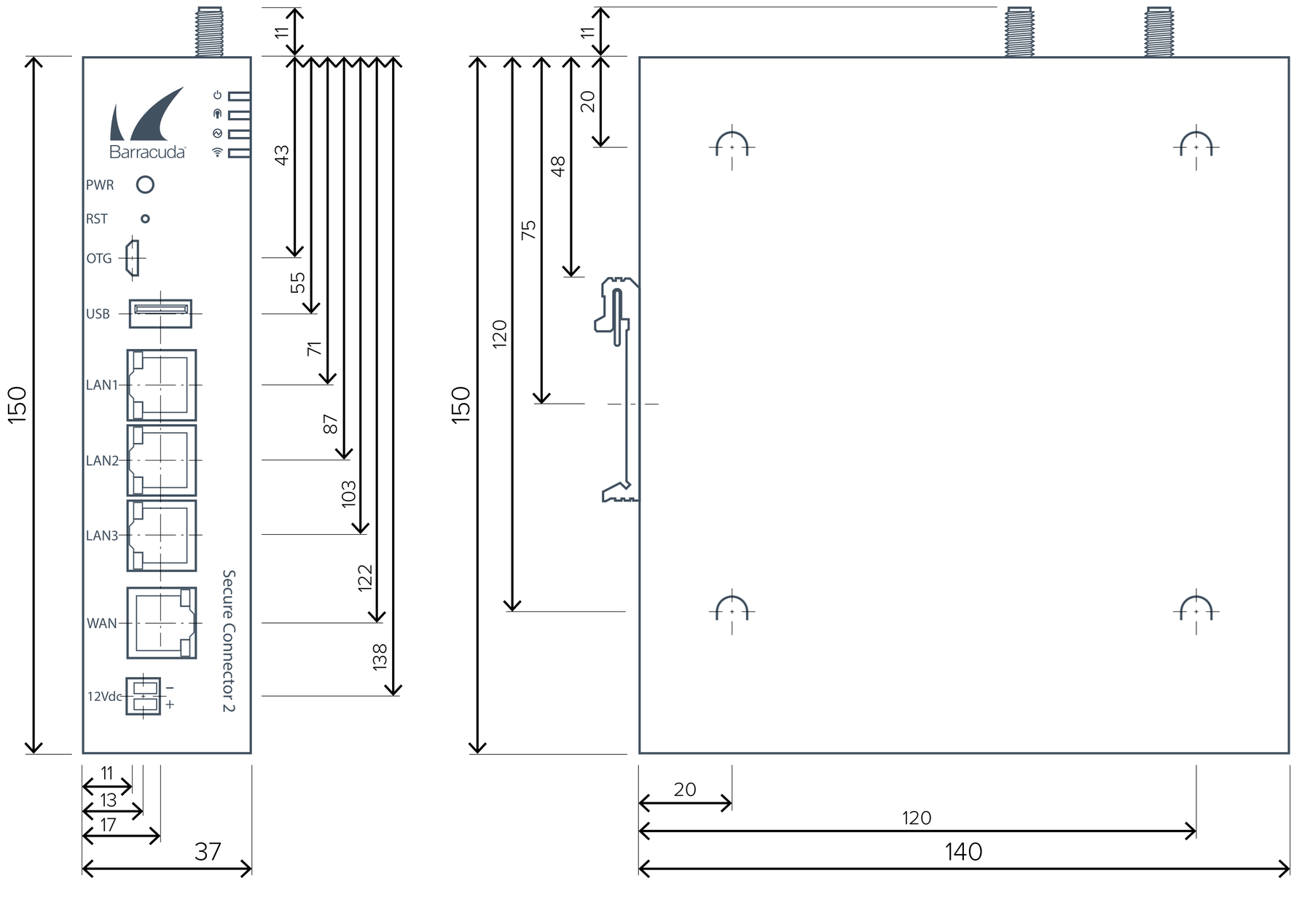


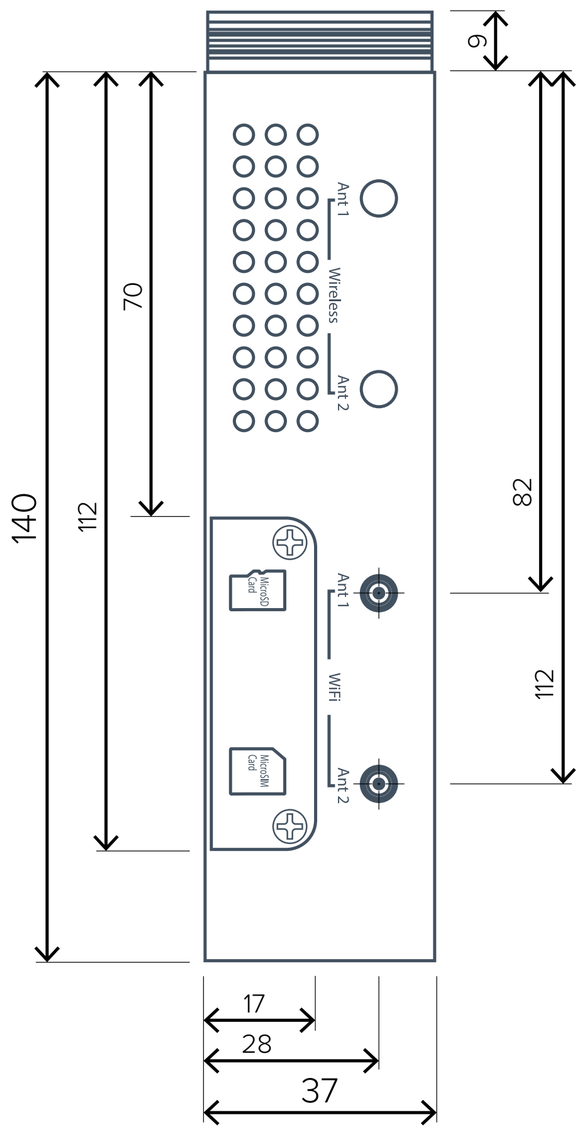




No scale illustration.
All dimensions in mm.

Secure Connector FSC21

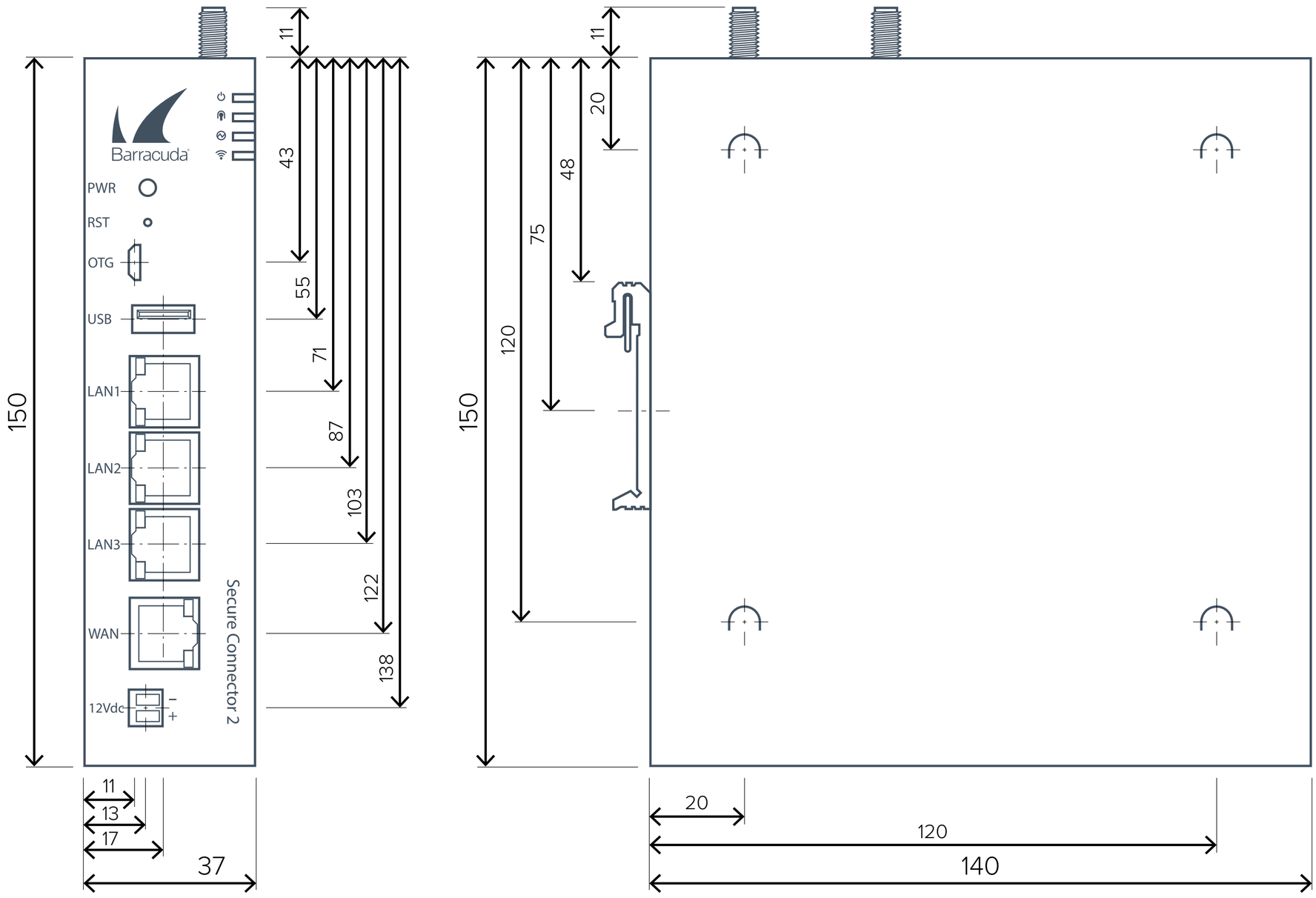


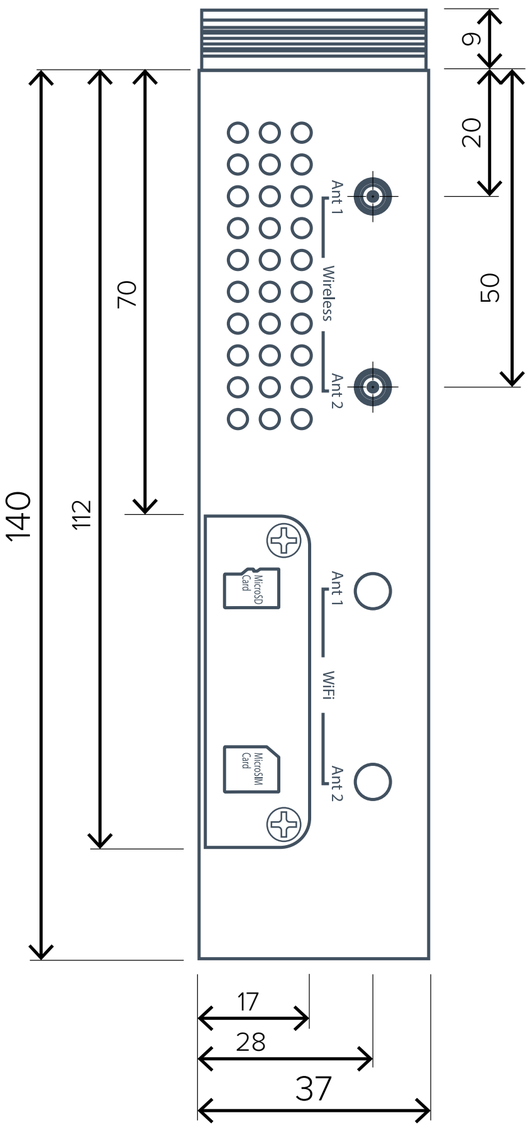




No scale illustration.
All dimensions in mm.

Secure Connector FSC24B

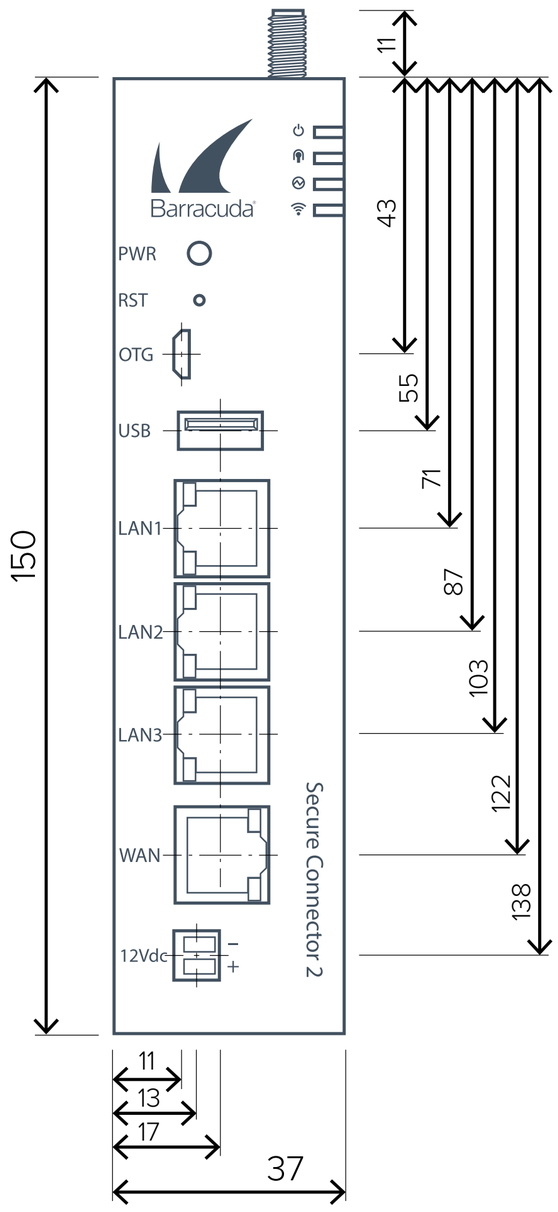


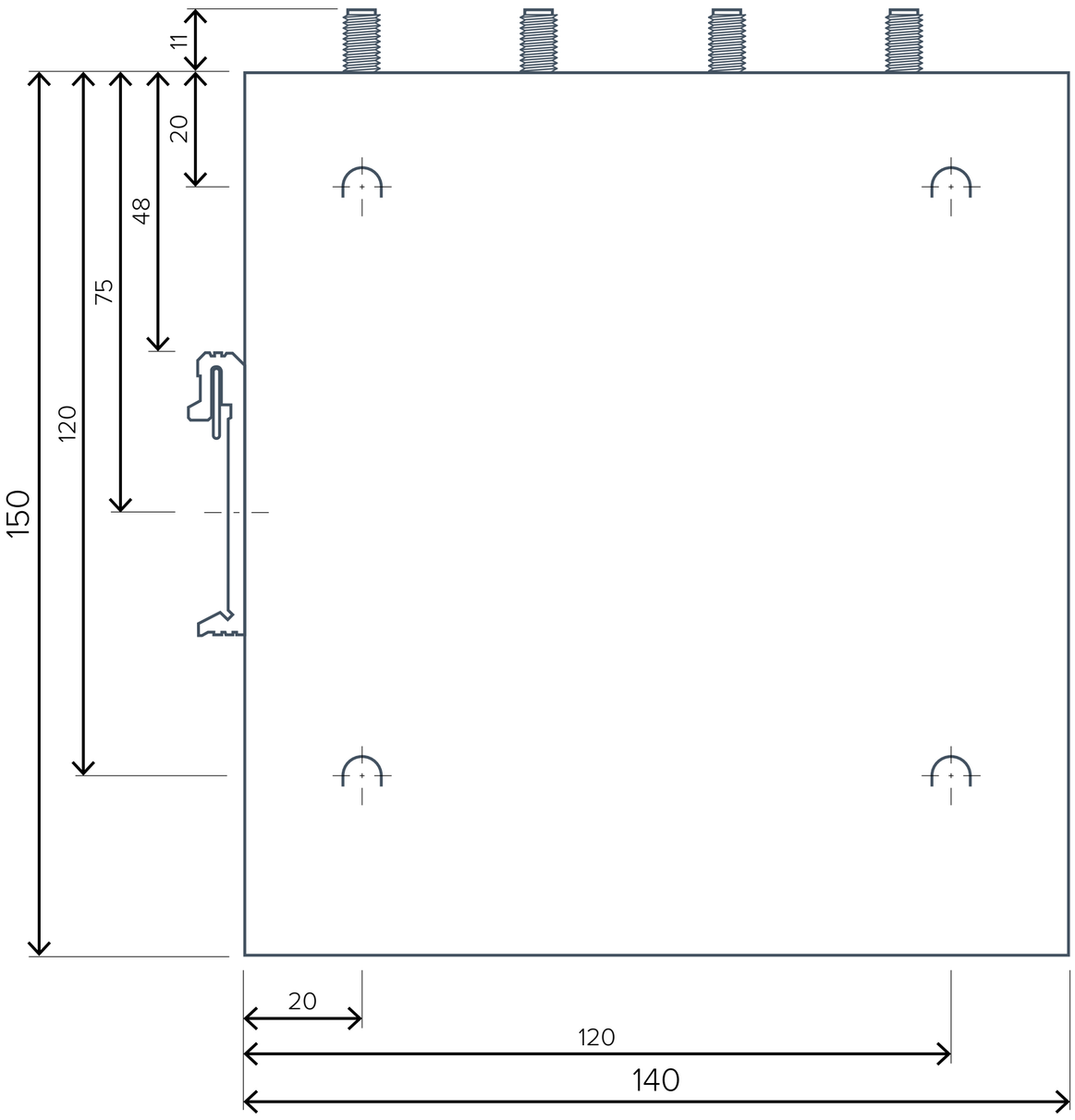


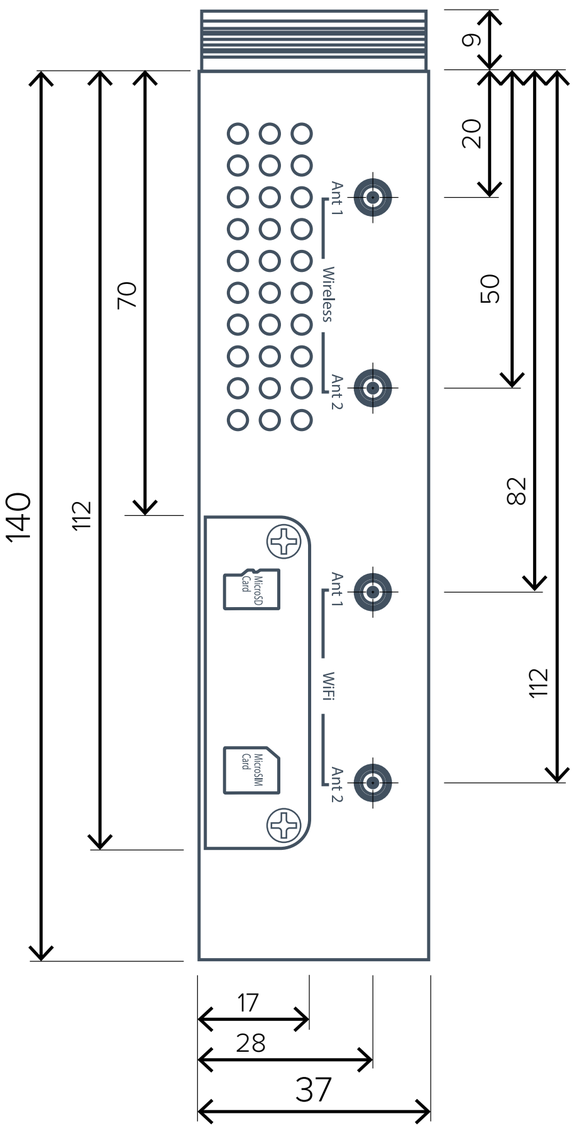


No scale illustration.
All dimensions in mm.

Secure Connector FSC25B



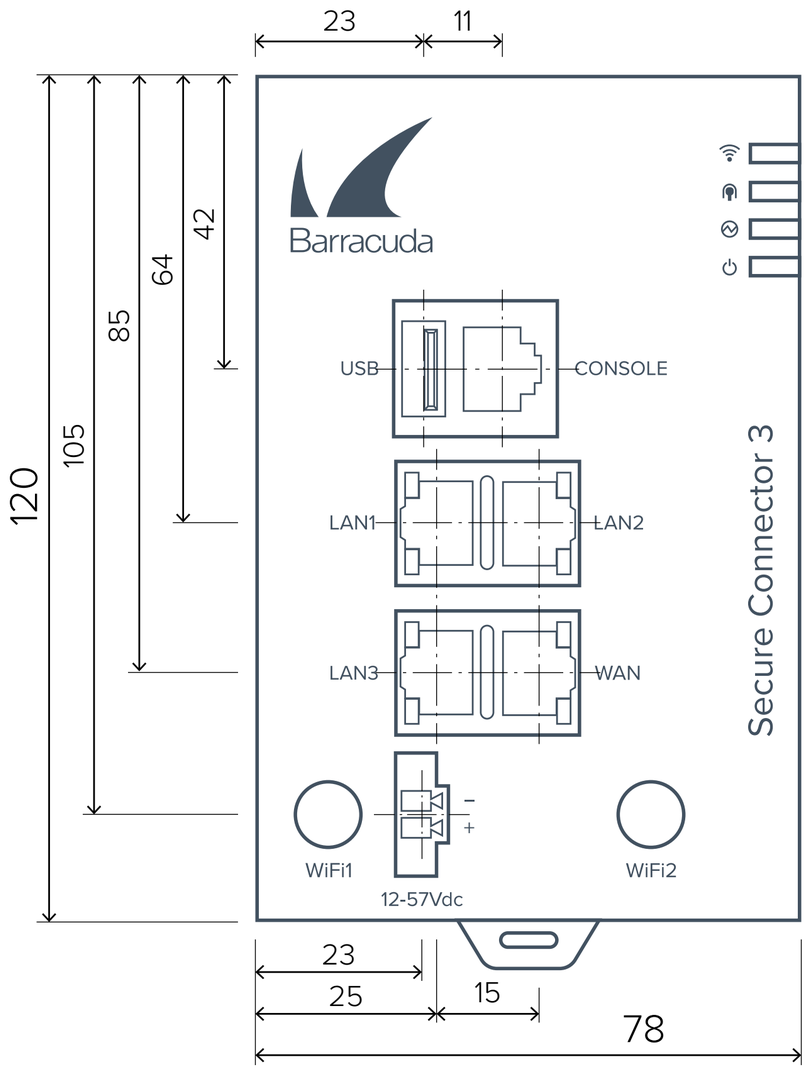


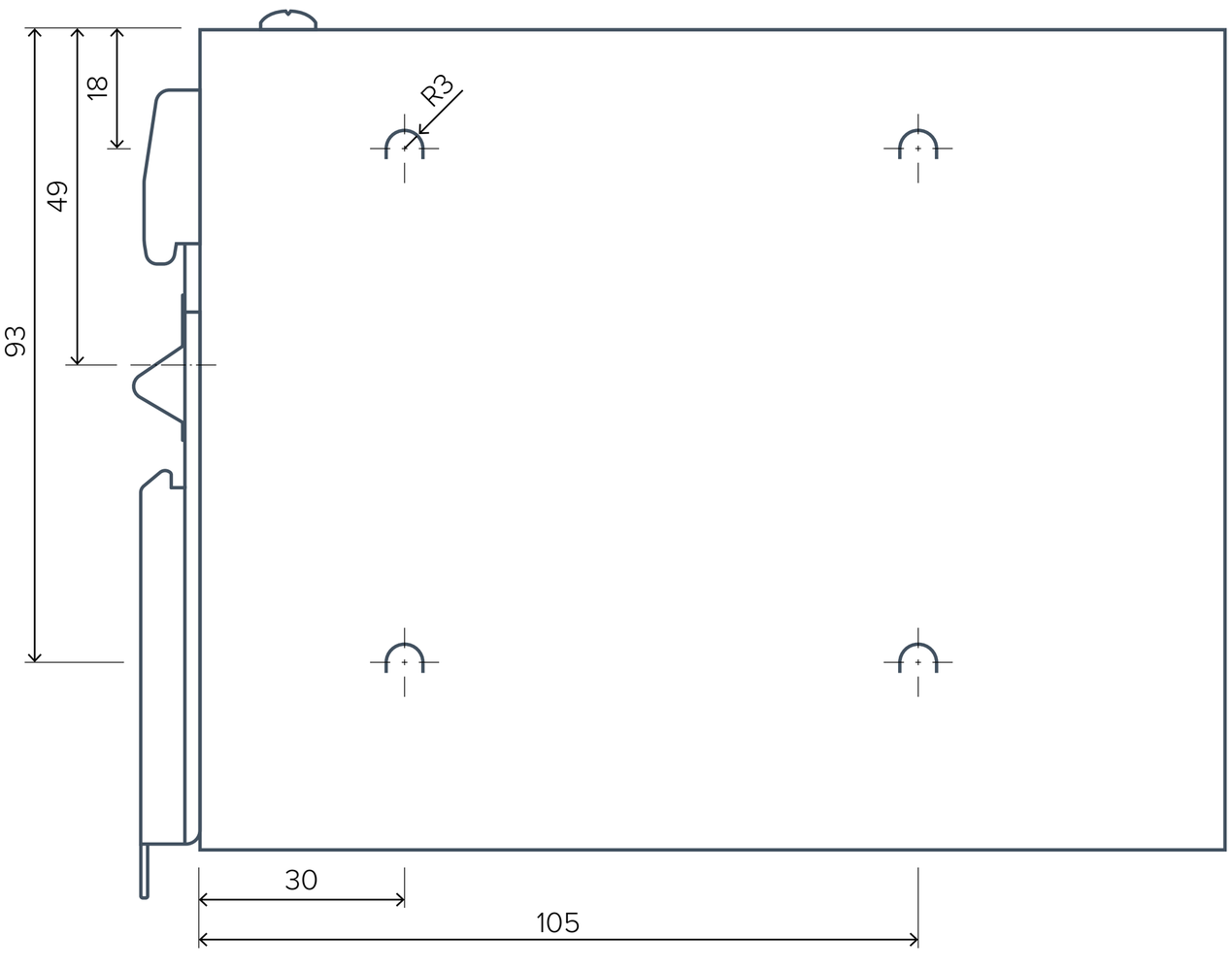


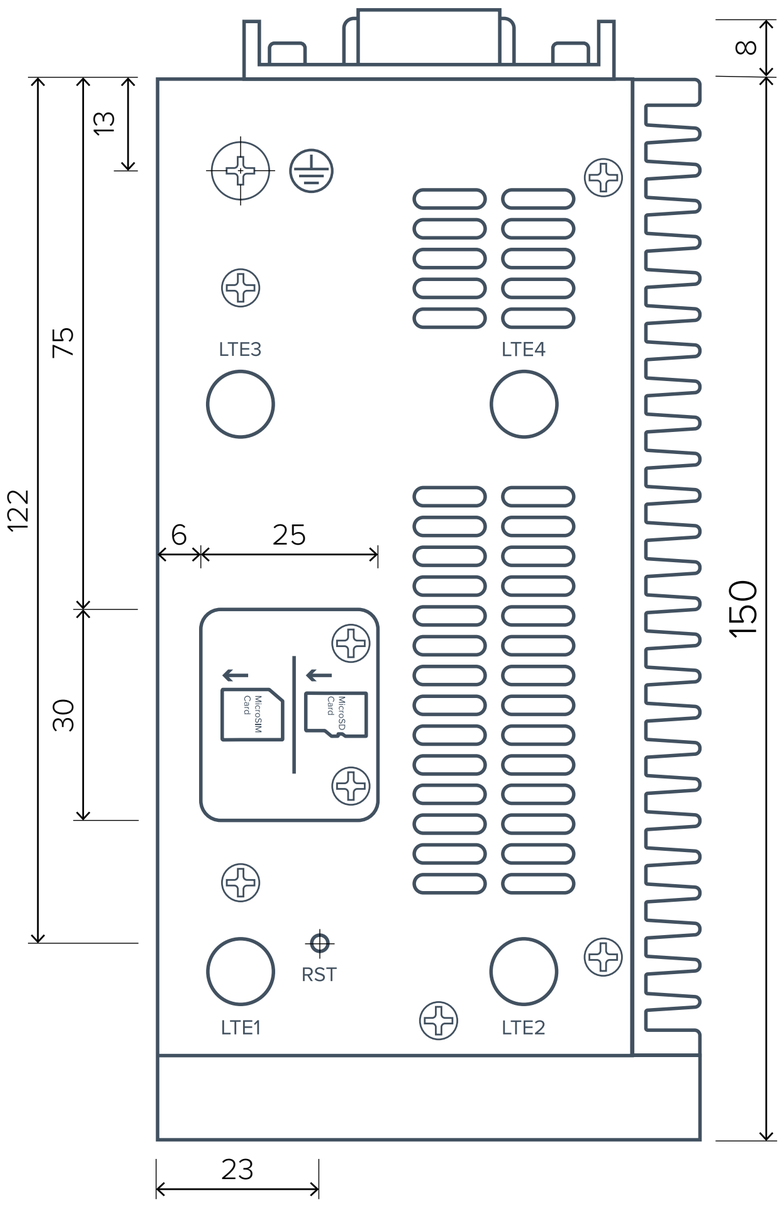


No scale illustration.
All dimensions in mm.

Secure Connector FSC30



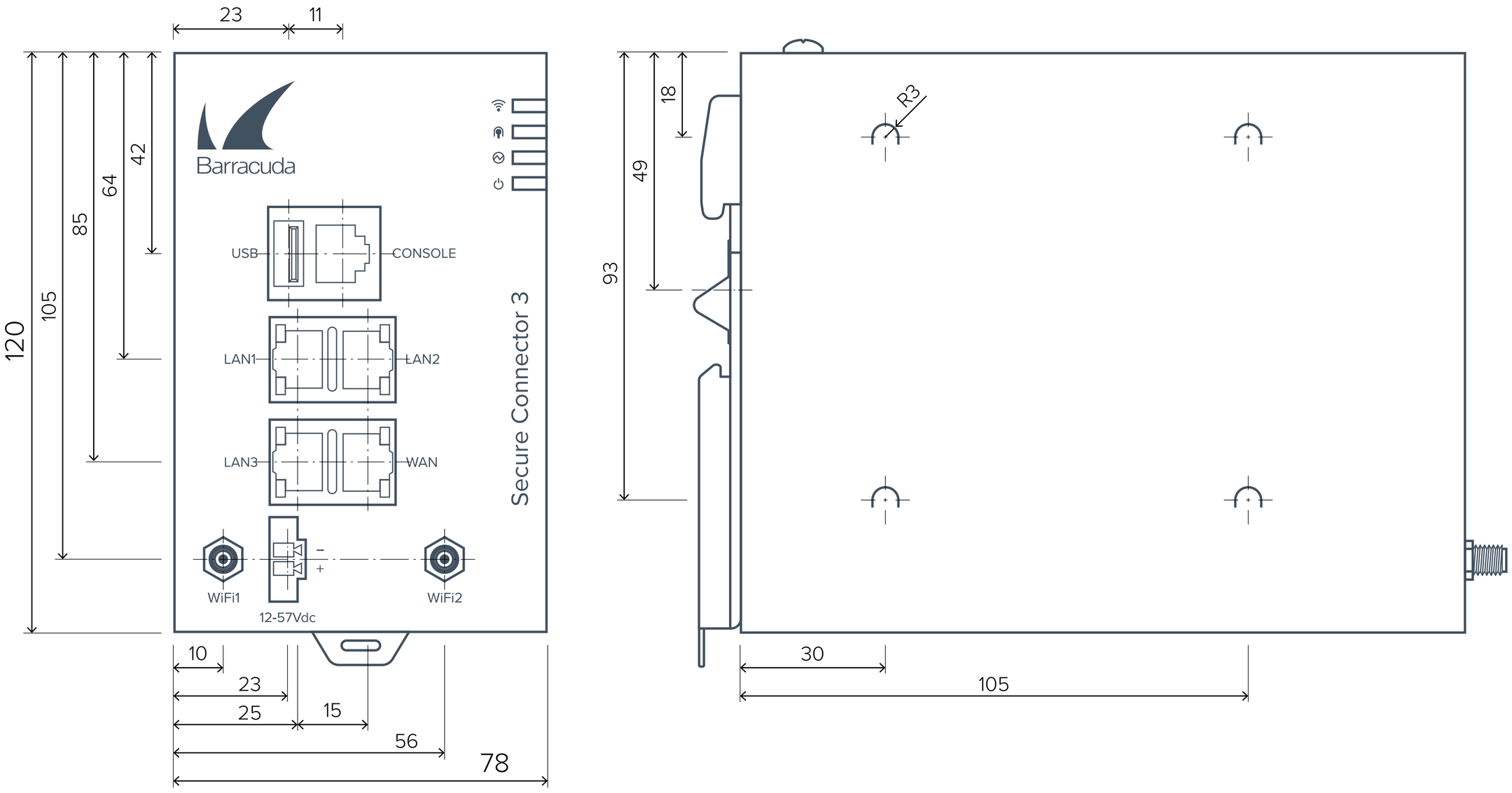


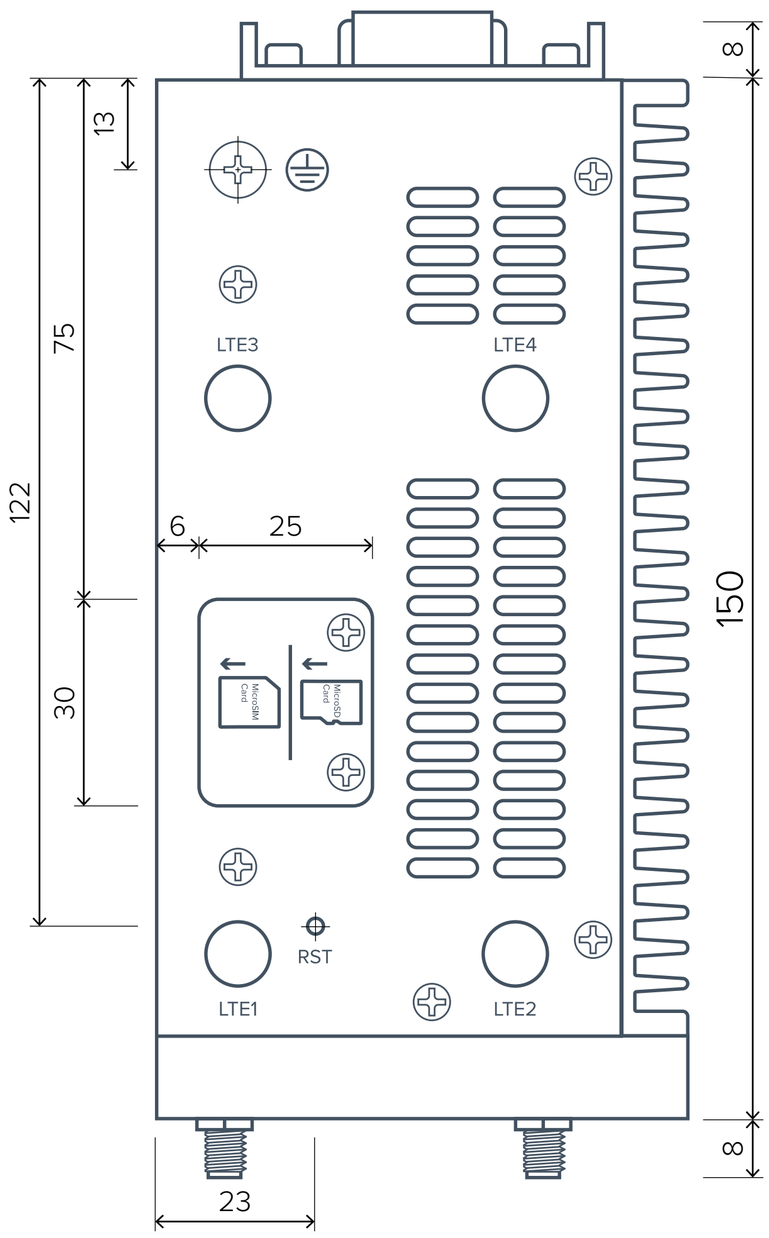




No scale illustration.
All dimensions in mm.

Secure Connector FSC31

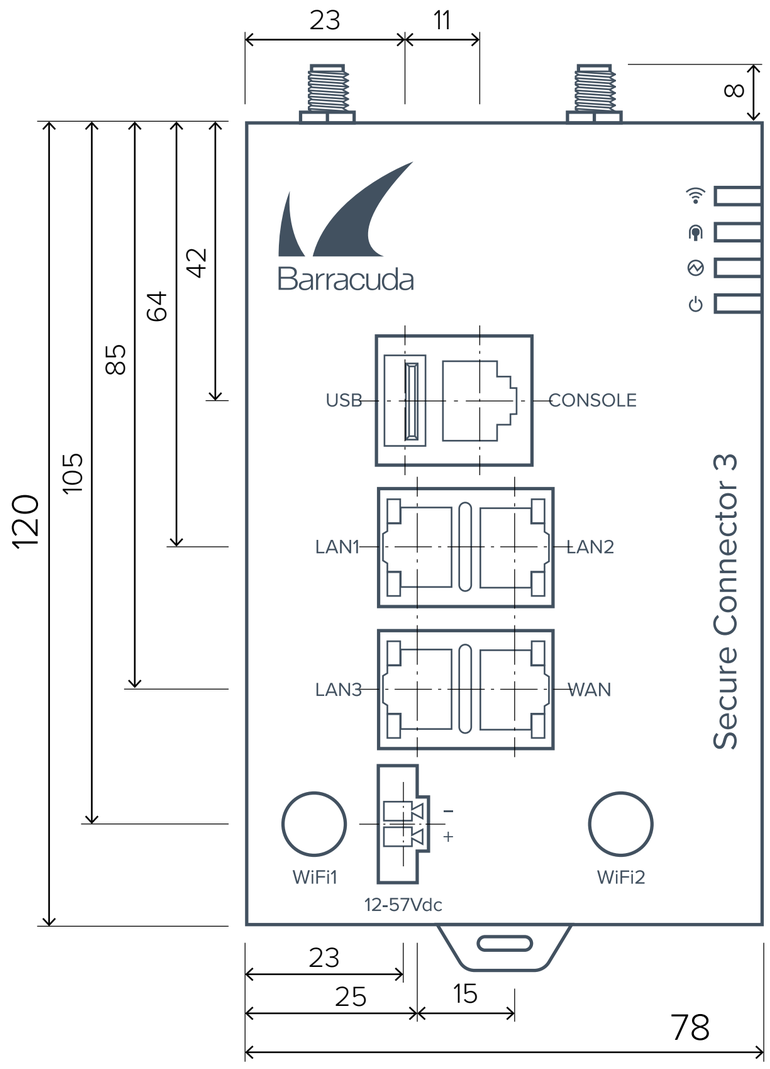


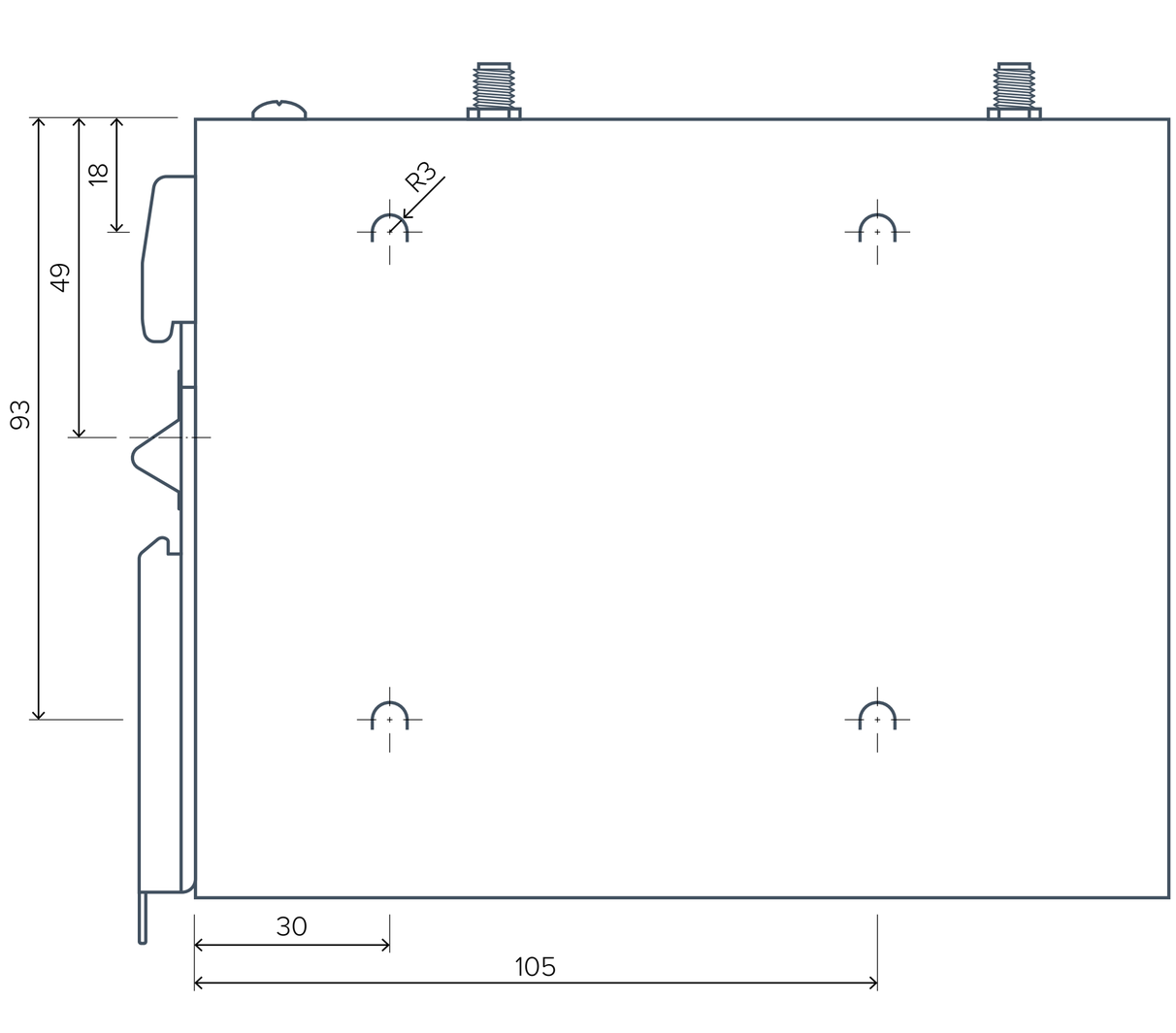


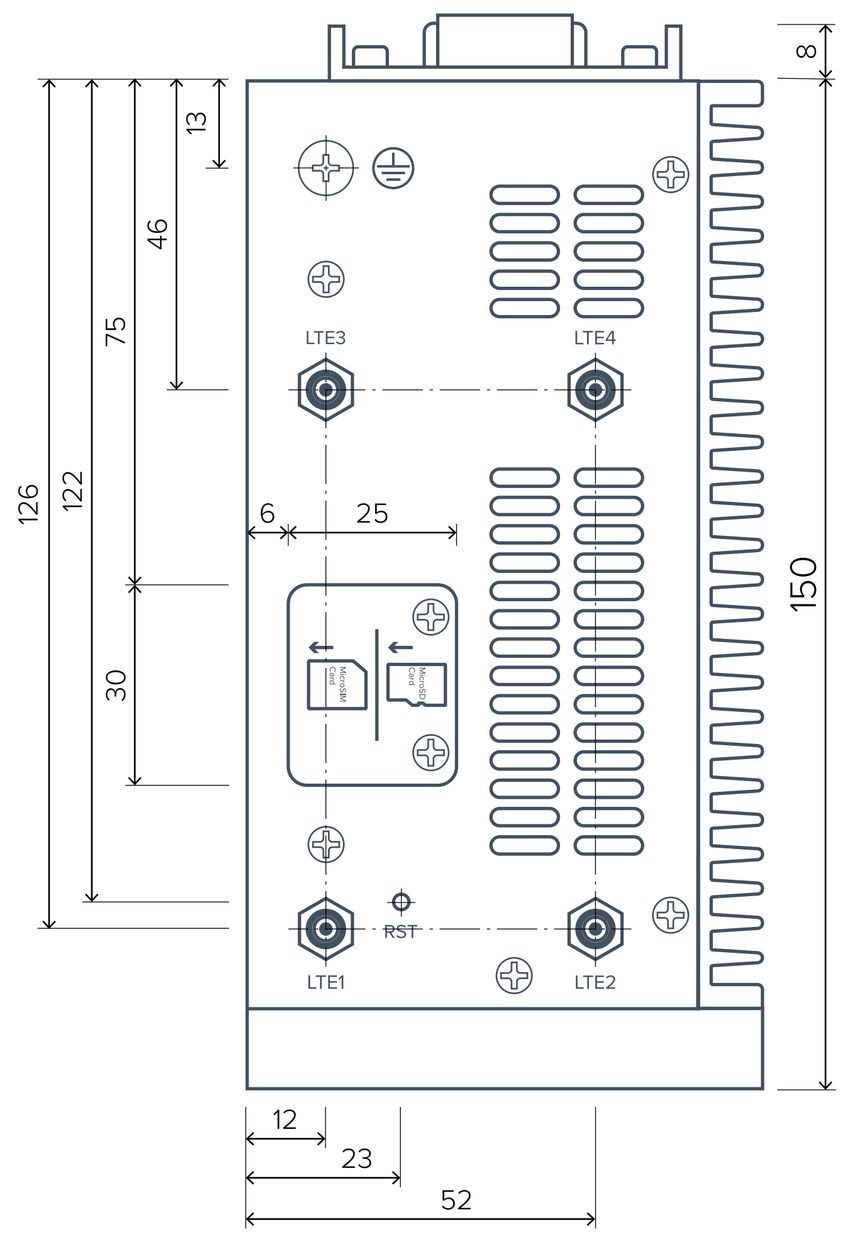


No scale illustration.
All dimensions in mm.

Secure Connector FSC34



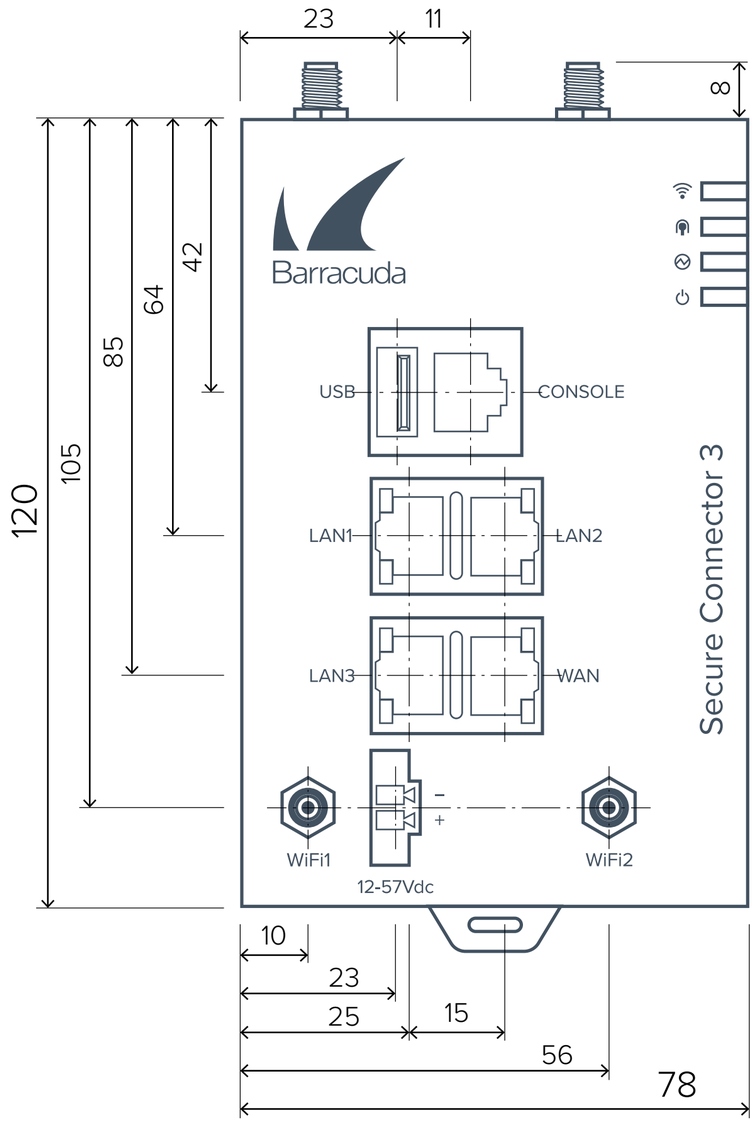


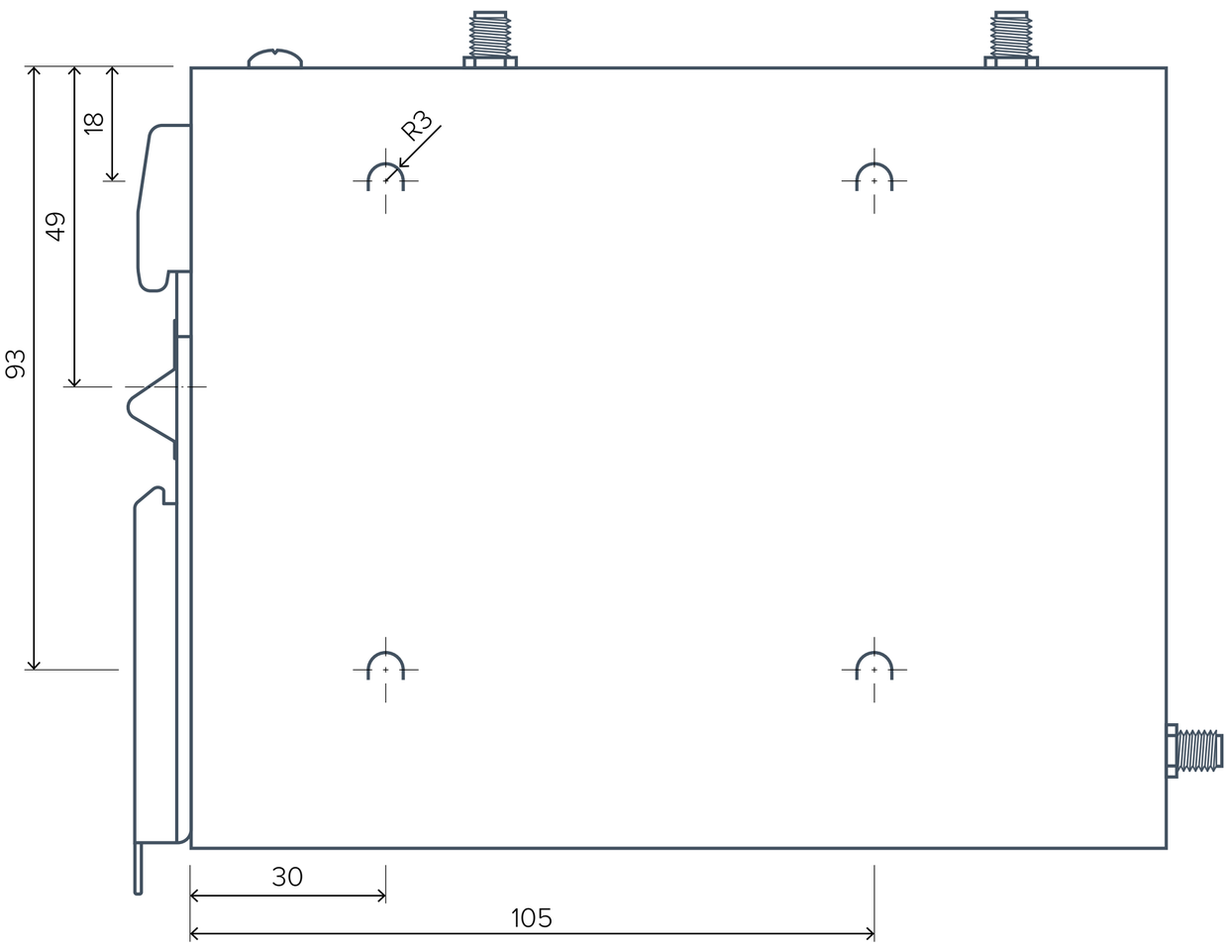


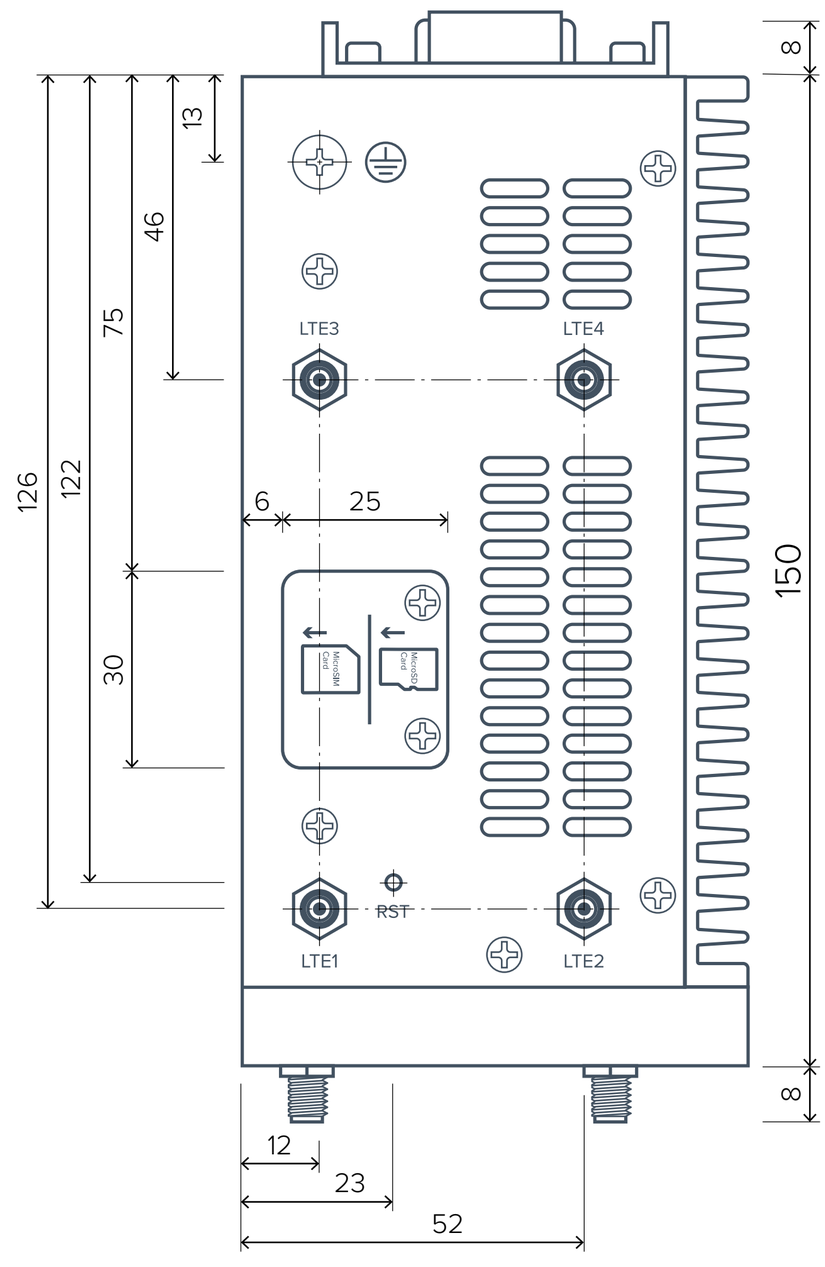


No scale illustration.
All dimensions in mm.

Secure Connector FSC35









No scale illustration.
All dimensions in mm.

Virtual appliances

As organizations have adopted virtualization for their server infrastructures, there has been a corresponding trend to extend the benefits of virtualization to the security layer. A CloudGen Firewall virtual appliance (VFC) provides the same powerful technology, comprehensive features, and ease-of-use found in a CloudGen Firewall hardware appliance. It is ideally suited for organizations that are standardizing hardware platforms or deploying virtual environments.

Beyond its powerful network firewall, IPS, SD-WAN, and remote access technologies, CloudGen Firewall VFC integrates a comprehensive set of next-generation firewall technologies, including application control, availability, and traffic flow optimization across the wide area network, web filtering, antivirus, anti-spam, and network access control enforcement.

> For more details on Barracuda virtual appliances, please visit barracuda.com/solutions/virtual.

All virtual editions are available for following hypervisors and public cloud offerings (for cloud specifics, please refer to page 12 ff.):

















EDITIONS	VFC1	VFC2	VFC4	VFC8	VFC16	VFC48
Suggested environments	Homeoffice, Kiosks, IoT/OT	Small & medium businesses	Medium to large businesses	Large businesses	Enterprise	Large enterprise
CAPACITY						
Recommended # of users/IPs	up to 50	up to 300	up to 2,000	up to 7,000	up to 10,000	more than 10,000
Allowed cores	1	2	4	8	16	48
AVAILABLE SUBSCRIPTIONS						
Barracuda Firewall Insights	Optional	Optional	Optional	Optional	Optional	Optional
Malware Protection	Optional	Optional	Optional	Optional	Optional	Optional
Advanced Threat Protection	Optional	Optional	Optional	Optional	Optional	Optional
Advanced Remote Access	Optional	Optional	Optional	Optional	Optional	Optional
Threat Protection Plan	Optional	Optional	Optional	Optional	Optional	Optional
Total Threat Protection Plan	Optional	Optional	Optional	Optional	Optional	Optional

Features and capabilities

BARRACUDA CLOUDGEN FIREWALL **FIREWALL**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Stateful packet forwarding (per rule)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Transparent proxy (TCP; per rule)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Inline graphical packet analyser	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
NAT (src, dst, nets), PAT	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Policy-based NAT (per rule)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Protocol support (IPv4, IPv6 [3])	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
IP-less configuration via named networks (IPv4, IPv6)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Wildcard network objects	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Gigabit performance	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Object oriented rule set	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Virtual rule sets	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Virtual rule test environment	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Realtime connection status	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Historical access caches	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Event triggered notification	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Load balancing for protected servers	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Multipath load balancing	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Firewall-to-firewall compression (stream & packet compression)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic rules with timer triggered deactivation (per rule)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Bridging mode / routing mode (mixed)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Virtual IP (proxyARP) support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Transparent IP to user mapping	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
User authentication	x.509, Microsoft® NTLM, RADIUS, RSA SecurID, LDAP/LDAPS, Microsoft® Active Directory®, TACACS+, local											
RPC protocol support (ONC-RPC, DCE-RPC)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
VoIP support (H.323, SIP, SCCP (skinny))	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Deep inspection of ICS / SCADA protocols	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DHCP relaying with packet loop protection & configurable agent-ID policy	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Standby mode	Active-Active (with external load balancer only) and Active-Passive											
Network notification on failover	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Key-based authentication	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Encrypted HA communication	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Provider/link failover	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Transparent failover without session loss	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

3 IPv6 firewall forwarding traffic, IPS, and application control - only in conjunction with administration via Barracuda Firewall Admin.

BARRACUDA CLOUDGEN FIREWALL **APPLICATION CONTROL**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Deep packet inspection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application behavior analysis	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Thousands of applications and protocols supported (Skype, BitTorrent, etc.)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Social media application support (Facebook, Google+, etc.)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Media streaming application support (YouTube, Netflix, etc.)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Proxy and anonymizer detection (Hide Me, Cyberghost, etc.)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application objects based on category, risk, properties, and popularity	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined categories such as business, conferencing, instant messaging, media streaming, etc.	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Interception of SSL/TLS encrypted traffic	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Inspection of SSL/TLS encrypted traffic	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Filtering of SSL/TLS encrypted traffic	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Creation of customized applications	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Deep application context	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Google SafeSearch enforcement	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Google Accounts enforcement	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application Based Provider Selection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Bandwidth and QoS assignment	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application logging	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application blocking	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application monitor and drill-down function	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Reporting	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **INTRUSION PREVENTION SYSTEM**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Inline intrusion prevention	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Regular online pattern updates	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Packet anomaly protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Packet reassembly	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
TCP stream reassembly	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
TCP checksum check	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
TCP split handshake protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
TCP stream segmentation check	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Generic patter filter	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Active ARP handling	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Malformed packet check	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SMB & NetBIOS evasion protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
HTML decoding	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
HTML decompression	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
HTML obfuscation protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
URL OBFUSCATION PROTECTION												
Escape encoding support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Microsoft %u encoding support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Path character transformations and expansions supported	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
RPC FRAGMENTATION PROTECTION												
MS-RPC (DCE) defragmentation supported (RFC 1151)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SUN-RPC (ONC) defragmentation supported (RFC 1151)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
FTP EVASION PROTECTION												
Detection of inserted spaces in FTP command lines	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Detection of additional telnet control sequences in FTP commands	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DENIAL OF SERVICE, SPOOFING & FLOODING PROTECTION												
IP spoofing protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Port scan protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Sniffing protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SYN/DoS/DDoS attack protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
LAND attack protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Teardrop / IP fragment attack protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
UDP flood protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ICMP fragment protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ICMP flood ping protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Reverse routing path check	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
IPS exceptions (allow listing)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
IPS EXCEPTIONS BASED ON												
Source / destination	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Port & port range	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Signature / CVE	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **MALWARE PROTECTION**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Single-pass mode	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Proxy mode	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Configurable archive recursion depth	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Quarantine functionality for proxy	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Configurable unknown archive policy	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Configurable maximum archive size	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Archiver package support	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Office file-types support	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Proactive detection of new threats	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Advanced heuristics detection techniques	✓ [4]	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Number of signatures	Billions [4]	Hundreds of thousands [5]										
Frequency of signature updates	Online [4]	Multiple updates per day [5]										
Dynamic, on-demand analysis of malware programs (sandbox)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]

BARRACUDA CLOUDGEN FIREWALL **ADVANCED THREAT PROTECTION**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Dynamic analysis of documents with embedded exploits (PDF, Office, etc.)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Detailed forensics for both, malware binaries, and web threats (exploits)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
High resolution malware analysis (monitoring, execution from the inside)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
TypoSquatting and link protection for emails	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Support for multiple operating systems (Windows, Android, etc.)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Flexible malware analysis in the cloud	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
SUPPORTED FILE TYPES												
Microsoft executables (exe, msi, dll, class, wsf)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Adobe PDF documents	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Android APK files	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
ZIP archives	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
RAR archives	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
macOS executables (dmg)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Microsoft Office (doc, docx, xls, xslx, ...)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Microsoft Office macro enabled (doc, docx, xls, xslx, ...)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
OpenOffice (odt, ods, rtf, ...)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Javascript (manual scan)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
Other archives (7z, lzh, bz, bz2, chm, cab, tar, gzip, gz)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
SUPPORTED PROTOCOLS												
HTTP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
HTTPS	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
FTP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
FTPS	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
SMTP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]
SMTPS	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [5]

4 Model F12A doesn't provide on-board malware protection but online malware protection as part of an active Advanced Threat Protection subscription. Hash calculation takes place on-board and the hash is then sent to BATP for verification.

5 Does not apply for virtual model VF10.

BARRACUDA CLOUDGEN FIREWALL **WEB FILTER**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Block/allow lists (per rule)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓[6]
Filter categories	95[6]											
Number of URLs categorized	>100 million[6]											
Alexa top 1 million coverage	> 90%[6]											
Temporal constraints	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓[6]
User specific / group specific restrictions	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓[6]
Cached online category database	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓[6]
Local update interval	N/A											
Online update interval	continuously[6]											

BARRACUDA CLOUDGEN FIREWALL **TRAFFIC INTELLIGENCE & SD-WAN**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
SD-WAN (incl. Traffic shaping inside encrypted tunnels)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Optimized direct internet uplink selection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Distribution of site-to-site encrypted traffic across up to 24 uplinks	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Quality of service (QoS)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Automatic backup uplink activation	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Automatic activation of alternate QoS policy upon main WAN failure and backup uplink activation	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic bandwidth and latency detection between peers	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Performance-based transport selection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Adaptive bandwidth protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Adaptive session balancing	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Traffic replication	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Firewall / encrypted traffic compression	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Zero-touch deployment	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	-
Data deduplication	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Link aggregation	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Maximum overall bandwidth per interface	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
On-the-fly reprioritization via firewall status GUI	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Ingress shaping per interface	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application-specific bandwidth assignment	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Application-based provider selection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
URL-filter-category specific provider selection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic forward error correction (FEC) for packet loss mitigation	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

6 Does not apply for virtual model VF10.

BARRACUDA CLOUDGEN FIREWALL **ROUTING & NETWORKING**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
HA capable with transparent session failover	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
GbE ethernet support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Max. number of physical interfaces	5	5	5	16	16	10	14	20	24	32	40	n/a
Integrated DSL modem	-	-	-	-	-	-	-	-	-	-	-	n/a
802.1q VLAN support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
xDSL support (PPPoE, PPTP (multi-link))	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DHCP client support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
ISDN support (EuroISDN (syncppp, rawip))	✓	✓	✓	✓	✓	-	-	-	-	-	-	-
Link monitoring (DHCP, xDSL, ISDN)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Policy routing support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Ethernet channel bonding	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Multiple networks on interface, IP aliases	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Multiple provider / WAN link support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Configurable MTU size (per route)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Jumbo frames (up to 9,000 bytes)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
IPinIP and GRE tunnels	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
PPTP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
BGP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Virtual routing and forwarding (VRF) instances	10	10	10	10	10	10	10	10	15	20	25	✓[7]
Dynamic routing of encrypted traffic	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic routing (BGP, OSPF, RIP)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **REMOTE ACCESS**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Encryption support	AES-128/256, 3DES/ DES, CAST, Blowfish, Null											
Private CA (up to 4,096 bit RSA)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
External PKI support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
x.509v3 policy extensions (fully recognized)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Certificate revocation (OCSP, CRL)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Site-to-site encrypted SD-WAN with traffic intelligence	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic mesh remote encrypted connectivity	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Traffic compression	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Star (hub and spoke) remote access network topology	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Client remote access	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Microsoft® domain logon (Pre-logon)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Strong user authentication	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Replay protection	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
NAT traversal	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
HTTPS and SOCKS proxy compatible	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Redundant gateways	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Native IPsec for third-party connectivity	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
PPTP/L2TP (IPsec; remote access client only)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic routing (OSPF, BGP) over encrypted remote access	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

7 For detailed information regarding VRF instances on virtual deployments, please check Barracuda Campus.

BARRACUDA CLOUDGEN FIREWALL **SYSTEM MANAGEMENT**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Central management	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Local management	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Comprehensive GUI-based configuration management	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
WebUI-based configuration management	-	✓	✓	✓	✓	✓	✓	-	-	-	-	-[8]
Command-line interface (CLI) available	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SSH-based access	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Multiple administrators	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Role-based administrators	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Real-time accounting and visualization	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Easy roll-out and recovery	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
USB installation and recovery	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Zero-touch deployment	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	-
Full life-cycle management	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
In-band management	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dedicated management interface	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Serial interfaces	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Central management interface	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
All management via encrypted remote access connections	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **LOGGING/MONITORING/ACCOUNTING**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
System health, activity monitoring	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Human readable log files	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Statistics	-	-	-	✓	✓	✓	✓	✓	✓	✓	✓	✓
Active event notification	Email / Execute program / SNMP trap / Apple push notification service / Slack notification											
Real-time accounting and reporting	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Syslog streaming (fully GUI configurable)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **ADDITIONAL FUNCTIONS**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
SNMP queries	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SMS control	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
NTP4 time server and clients	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **DNS**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Multi-domain support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DNS operation types	Primary, secondary, forwarder, cacher											
Split DNS	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Health probing	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DNS doctoring	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DNS translation	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DNS sinkholing (a.k.a. DNS interception)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Detect and block DNS tunneling	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

8 WebUI-based configuration management is available for deployments in Amazon Web Services (BYOL and PAYG), Microsoft Azure (BYOL and PAYG), and Google Cloud Platform (BYOL)

BARRACUDA CLOUDGEN FIREWALL **AUTHORITATIVE DNS SERVER**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Local DNS cache	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Inbound link balancing	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Multi-domain support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Zone transfer (allows / prevent)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Time-to-live (TTL) enforcement	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
A server record support (A)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Name server record support (NS)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Mail server record support (MX)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
TXT / SPF record support (TXT)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Canonical name support (CNAME)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Services available record support (SRV)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Pointer resource record support (PTR)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Customizable DNS record support (OTHER)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Health checks per IP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Configurable health check interval	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Configurable update interval for dynamic IPs	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Support for static uplinks	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Support for dynamic uplinks	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **DHCP**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
DHCP server	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
DHCP relay	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Lease DB visualization & management	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Multi-homing, multi-netting	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Class-based filtering	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Dynamic DNS support	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **MAIL SECURITY**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Supported protocols	SMTP, SMTP with StartTLS, SMTPS, POP3, POP3S [12]											
SSL Interception	-	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [9]
DNS block list	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓ [9]
Antivirus for email	-	optional [9]										
Advanced Threat Protection for email	✓	optional [9]										

9 Does not apply for virtual model VF10.

BARRACUDA CLOUDGEN FIREWALL **WEB PROXY**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Supports cache hierarchies (parenting, neighboring)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Cache hierarchies supporting protocols	ICP, HTCP, CARP, Cache Digest, WCCP											
Proxying and caching (HTTP, FTP, and others)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Proxying for SSL (no inspection)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Transparent caching	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
HTTP server acceleration	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Caching of DNS lookups	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Central user authentication	Native NTLM, RADIUS, RSA ACE, LDAP, MS Active Directory, TACACS+											
Support for external virus scanning (ICAP)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **REST API EXTENSIONS**	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
Please note that the following is a non-exhaustive list. For more details, please refer to campus.barracuda.com.												
REST for all common access rule operations	Create / delete / list / change											
REST calls for network objects (stand-alone + CC)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
REST calls for service objects (CC + stand-alone)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
REST calls for enabling and activating IPS	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
REST calls to allow you to manage box administrators	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
REST calls to allow you to manage tokens	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
CLI tool to enable REST by default on cloud firewalls	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

BARRACUDA CLOUDGEN FIREWALL **CLOUD-SPECIFICS**	MICROSOFT AZURE	AMAZON WEB SERVICES	GOOGLE CLOUD PLATFORM
In addition to supporting features as mentioned above in column "Virtual", the public cloud editions support unique capabilities.			
Cloud-SDK support	✓	✓	✓
Auto Scaling Cluster	-	✓	-
Cold Standby Cluster	-	✓	-
Log File Streaming and Custom Metrics for AWS CloudWatch	-	✓	-
Log File Streaming to Azure Monitor Agent (AMA)	✓	-	-
Azure Virtual WAN support	✓	-	-

ADVANCED REMOTE ACCESS **REMOTE & NETWORK ACCESS CLIENTS**	
ARCHITECTURE	
Integrated remote access client	✓
Integrated health agent and managed personal firewall	✓[13]
Full NAC policy support	✓[13]
Customizable user interface	✓
Low power consumption network stack	✓
SUPPORTED OPERATING SYSTEMS	**PLEASE SEE BARRACUDA CAMPUS FOR DETAILS**
Microsoft Windows	✓ (see Barracuda Campus for details)
Linux	✓ (see Barracuda Campus for details)
macOS	✓ (see Barracuda Campus for details)
MANAGEMENT	
Central management of configuration	✓
Diagnostic log	✓
System diagnostics report	✓
Status monitoring	✓
Attack access cache	✓
Packet log (capture)	✓
Groups	✓
Silent client setup	✓
Password protection of settings	✓[10], [11]
AUTHENTICATION SUPPORT	
Microsoft® Certificate Management (Crypto API)	✓[10]
Microsoft® Active Directory	✓[10]
LDAP	✓[12]
RADIUS	✓[12]
MSNT	✓[10], [12]
RSAACE	✓[12]
SAML	✓
External X509 certificates	✓
Azure AD	✓
SMS PASSCODE	✓[12]
RSA tokens	✓[12]
Smart cards	✓[13]
Microsoft domain logon support (prelogon)	✓[13]
Two-factor authentication (RSA SecurID, Radius, TOTP)	✓[13]
PERSONAL FIREWALL CAPABILITIES	
Dynamic adapter object & user object handling	✓
RPC handling	✓
Multiple rule sets support	✓
Client side policy enforcement	✓
Application control	✓
Adapter control	✓
User context enforcement	✓
NetBIOS protection	✓
DoS attack protection	✓
Executable scripts	✓

10 Only for Microsoft operating systems.
11 Also prevents changes to client settings by users with administrator rights.
12 Queried by Barracuda CloudGen Firewall remote access server on behalf of client.
13 For manufacturer with Microsoft Crypto Service Provider.

BARRACUDA FIREWALL CONTROL CENTER **CONFIGURATION MANAGEMENT**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Tenants	1 [14]	2 [14]	5 [14]
Configuration groups [15]	3	Unlimited	Unlimited
Maximum managed gateways [recommended]	Unlimited [20]	Unlimited [200]	Unlimited [1,000+; depending on HW]
Configuration templates (repositories)	✓	✓	✓
Shared configuration data	✓	✓	✓
Zero-touch deployment	✓	✓	✓
Operating system parameters	✓	✓	✓
Networking/routing parameters	✓	✓	✓
FW/SD-WAN/remote access policies, application gateway parameters	✓	✓	✓
Flat file data storage	✓	✓	✓
Database characteristics (transaction orientation, locking, etc.)	✓	✓	✓
Backup and restore functionality	✓	✓	✓
Gateway configuration archive for speed install	✓	✓	✓
Configuration update monitoring	✓	✓	✓
Full RCS versioning	✓	✓	✓
Graphical tunnel interface for SD-WAN	✓	✓	✓
Dynamic mesh site-to-site SD-WAN support	✓	✓	✓
Barracuda Network Access Client policy management	✓	✓	✓
Multi-release management	-	✓	✓
Multi-platform management	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **STATUS MONITORING**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Gateway health state	✓	✓	✓
Launch pad functionality	✓	✓	✓
Customizable layout	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **TRUST CENTER**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Gateway x.509 certificate CA	✓	✓	✓
Gateway SSH key management	✓	✓	✓
Server for management tunnels to gateways	✓	✓	✓
Virtual IP addresses for gateways (ProxyARP)	✓	✓	✓
Dynamic gateway IP address support	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **LICENSE CENTER**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
License timestamp server	✓	✓	✓
License status display	✓	✓	✓
Central event message list	✓	✓	✓
Event forwarding (SNMP, mail)	✓	✓	✓
Event log	✓	✓	✓

14 Additional tenants optionally available.
15 “Configuration Groups“ (“cluster“ in the firmware) refers to an administratively bundled group of CloudGen Firewall appliances and not to a load sharing cluster.

BARRACUDA FIREWALL CONTROL CENTER **CENTRAL SOFTWARE UPDATE**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Real-time version display	✓	✓	✓
Kernel and OS updates	✓	✓	✓
Barracuda CloudGen Firewall updates & log viewer	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **SECURE REMOTE EXEC. ENVIRONMENT (SSHV2)**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Job scheduling	✓	✓	✓
Script management	✓	✓	✓
Execution log viewer	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **ADMINISTRATIVE MODEL**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Fully GUI-based access (Barracuda Firewall Admin management tool)	✓	✓	✓
Strong authentication & AES encryption	✓	✓	✓
Configurable role-based administration	✓	✓	✓
Adjustable view on configuration tree	✓	✓	✓
Configurable administrative domains	-	✓	✓
Multiple domains per administrator	-	✓	✓
Configurable access on OS level	✓	✓	✓
Configurable access notification	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **REPORTING AND ACCOUNTING**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
Historical reports on gateway activity	✓	✓	✓
Customer-based gateway activity reports	✓	✓	✓
Policy distribution	✓	✓	✓
Control Center resource utilization	✓	✓	✓
Gateway-resource utilization	✓	✓	✓
Central log host	✓	✓	✓
Streaming/relaying to external log host	✓	✓	✓
Barracuda Report Server integration	✓	✓	✓

BARRACUDA FIREWALL CONTROL CENTER **ADDITIONAL FUNCTIONS**	**STANDARD EDITION (VC400 / VCC400)**	**ENTERPRISE EDITION (VC610 / VCC610)**	**GLOBAL EDITION (VC820)**
NTP4 time server for gateways	✓	✓	✓
Integrated DNS server	✓	✓	✓
High availability	Optional	Optional	HA license included
SIEM syslog interface	✓	✓	✓
Public key infrastructure	-	✓	✓
Revision control system	✓	✓	✓
Access monitor	✓	✓	✓

BARRACUDA FIREWALL INSIGHTS	F12	F18	F80	F180	F280	F380	F400	F600	F800	F900	F1000	VIRTUAL
AVAILABLE DASHBOARDS												
SD-WAN dashboard	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SD-WAN tunnel status dashboard	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Security and web traffic dashboard	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Network traffic dashboard	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
GENERAL REPORT TYPES												
Customizable reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
On-demand reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Scheduled reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
PRE-DEFINED REPORTS												
Predefined productivity reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined web activity reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined safety and liability reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined network activity reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined threat and security reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined infection activity reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Predefined traffic reports	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
CLOUDGEN FIREWALL DASHBOARD												
Overview of allowed and blocked sessions along with an explanation	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Threats overview by user, source, and destination	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Web activity and productivity: Categories, users, and domains accessed by number of requests, bandwidth, and browse time	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SUMMARY REPORTS												
Safety and liability	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Network activity	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Threat summary	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Web traffic summary	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Total usage	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SAFETY AND LIABILITY REPORTS (BASED ON USER AND REQUESTS)												
Traffic to adult-rated sites	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Anonymizer sites	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
File-sharing and P2P	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Intolerance and hate	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Spyware	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Violence and terrorism	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Based on user and requests	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SECURITY REPORTS BY SUBTYPE (BASED ON USER, TIME, SOURCE IP, AND DESTINATION)												
ATP	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
IPS	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Virus	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Malware	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Spyware	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Blocked file content	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
OT, IIOT, AND SCADA REPORTS												
Traffic summary	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
Traffic per protocol	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓
SCADA traffic per hour or day (S7, S7+, DNP3, Modbus, IEC60870-5-104 traffic)	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓

Available subscriptions and plans

Availability matrix

CLOUDGEN FIREWALL	F12A	F18B	F80B	F180B	F280C	F380B	F400C	F600D	F800D	F900C	F1000B	F93A.R	F193A.R	SC2X	SC3X	VFC [16]	PUBLIC CLOUD [16] BYOL	PUBLIC CLOUD [16] PAYG
AVAILABLE SOFTWARE/FEATURE SUBSCRIPTIONS																		
Energize Updates (EU)	Mandatory															–	–	
Virtual subscription (incl. EU)	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	Mandatory	✓
Barracuda Firewall Insights	Optional													–	–	Optional		✓
Malware Protection	Optional [17]													–	–	Optional		–
Advanced Threat Protection	Optional													–	–	Optional		–
Advanced Remote Access	–	Optional												–	–	Optional		✓
Threat Protection Plan	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	Optional		–
Total Threat Protection Plan	–	–	–	–	–	–	–	–	–	–	–	–	–	–	–	Optional		–
AVAILABLE HARDWARE/SUPPORT SUBSCRIPTIONS																		
Warranty Extension	Optional															–	–	–
Instant Replacement	Optional															–	–	–
Premium Support	on request						Optional							–	–	Optional		
On-site cold spare unit	Optional													–	–	–	–	–

High Availability (“HA”):

All subscriptions have to be licensed separately for the HA partner. For further information, please contact your local partner or Barracuda Sales at sales@barracuda.com.

Energize Updates

Barracuda Energize Updates help you secure your investment in the ever-changing IT world. Benefit from security updates to patch or repair any security vulnerabilities, keep your Barracuda product up-to-date and fully functional at all times, and get access to our award-winning support.

Energize Updates are available for all CloudGen Firewall hardware and virtual models.

Purchasing at least 12 months of Energize Updates is required with every CloudGen Firewall.

Energize Updates includes:

- Enhanced support providing 24x7 technical support via phone, live chat, online portal, and e-mail
- Firmware maintenance including new firmware updates with feature enhancements and bug fixes
- Early Release Firmware program (optional)
- Unlimited number of remote access connections
- Security updates to patch/repair any security vulnerabilities
- URL filter based on Barracuda Web Filter online URL categorization in single-pass as well as in proxy mode
- Regular updates for Application Control database
- IPS signature and pattern updates
- Barracuda CloudGen Access support.

16 For virtual and public cloud deployments, two dedicated subscription plans are available; please see page 90 for more details.
17 For model F12A, malware protection utilizes cloud-based malware protection as part of an active Advanced Threat Protection subscription.

Barracuda Firewall Insights

Barracuda Firewall Insights allows to consolidate security, application flow, and connectivity information from hundreds or even thousands of firewalls on the extended WAN – regardless of whether they are hardware, virtual, or cross-cloud-based deployments.

For a Firewall Insights deployment, every device requires an active Firewall Insights subscription and access to the central Firewall Insights server.

Firewall Insights server is available as a virtual image for KVM, VMWare, and Hyper-V with the following requirements:

SSD data size: Unlimited (min. 2 TB)

RAM: Unlimited (min. 32 GB)

CPU cores: Unlimited (min. 8)

IOPS: Unlimited (min. 24,000)

On-Site Cold Spare Unit

The cold spare unit provides Barracuda customers a cold standby appliance of the same type as the main unit.

This cold standby unit can be activated quickly in case the active unit fails for any reason. The cold standby appliance includes a “Cold Standby License” for CloudGen Firewall firmware only; no productive use for firewalling or other functions is possible. In this way, the firmware of the appliance can be upgraded to the patch level that corresponds to the main unit (fully licensed unit). If the main unit fails, the on-site cold spare unit may be used to temporarily host the license and backup file (“par” file, including the license) of the defective main unit for a period of up to 15 days.

If the defective unit is covered under Instant Replacement or is still under warranty, Barracuda Networks will ship the customer a replacement unit of the same type as the defective unit. The former cold spare unit inherits the license features of the former main unit by a swap with a new license issued, effectively transforming the cold spare to the new main unit. The shipped unit includes a cold spare license and effectively become the new cold spare.

The customer needs to ship the defective unit to Barracuda Networks or certify destruction. If the customer fails to do so, Barracuda reserves the right to charge the customer for a full CloudGen Firewall deployment.

Warranty Extension

Provides an extended warranty, and ships a replacement unit on the next business day (best effort) with standard mail upon notification of a failed unit.

Must be purchased within 60 days of hardware purchase and is a continuous subscription from date of activation. Available for up to 60 months.

Instant Replacement

One hundred percent uptime is important in corporate environments, but sometimes equipment can fail. In the rare case that a Barracuda product fails, Barracuda ships a replacement unit on the same or next business day. And by means of the Hardware Refresh Program, we ensure that customers benefit from the latest hardware improvements and firmware capabilities:

- Enhanced support providing phone and email support 24/7
- Free hardware refresh after four years of continuous IR coverage.

Must be purchased within 60 days of hardware purchase and is a continuous subscription from date of activation.

Comparison “Warranty Extension - Instant Replacement”

	WARRANTY EXTENSION	INSTANT REPLACEMENT
Replacement	Next business day (best effort)	Same day or next business day
Shipment	Standard	Express
Support	Basic support (with EU)	Enhanced support
Max. subscription term	up to 60 months	not restricted
Free hardware refresh after 4 years	-	✓

Premium Support

Premium Support ensures that an organisation's network is running at its peak performance by providing the highest level of 24/7 technical support for mission-critical environments. A dedicated Premium Support Account Manager and a team of technical engineers provide fast solutions to high-priority support issues, thereby ensuring that Barracuda Networks equipment maintains continuous uptime.

Key benefits of Premium Support:

- Dedicated phone and email support 24/7
- Priority response time to resolve mission-critical issues
- Priority Level Agreement (PLAs) to guarantee that issues are handled, resolved, and closed quickly
- Dedicated Support Account Manager who is familiar with the customer's environment
- Proactive ticket monitoring and reporting to provide comprehensive information and control

> **Note:**
>
> Available for all CloudGen Firewall hardware and virtual models. Premium Support for CloudGen Firewall hardware appliances can only be purchased in combination with Instant Replacement. Premium Support may be purchased on CloudGen Firewall virtual appliances without Instant Replacement.
>
> For more information on Premium Support, please visit www.barracuda.com/support.

Advanced Remote Access

This optional subscription adds a customizable and easy-to-use browser-based remote access, sophisticated Network Access Control (NAC) functionality, and CudaLaunch support.

CudaLaunch is a simple-to-use remote connectivity application specifically designed to securely extend the company network to BYOD and mobile devices. The app is available for Windows, macOS, iOS, and Android, can be downloaded from the App Stores.

The Barracuda **Network Access Client** provides a sophisticated remote access client for Windows, macOS, and Linux that provides richer performance and functionality than standard IPsec client software. The Barracuda Network Access Client, when used with a CloudGen Firewall, provides centrally managed Network Access Control (NAC) and an advanced Personal Firewall. This enforces client health and security policies for remote users connecting to the corporate network.

For CloudGen Firewall deployments in public cloud offerings like Amazon Web Services and/or Azure with Pay-As-You-Go licencing, this subscription is included.

User Session Limits

- Unlimited concurrent CudaLaunch sessions
- Multiple concurrent remote access sessions by the same user

Advanced Threat Protection

Prevent malicious files—even unknown ones—from entering the organization. Avoid network breaches, identify zero-day malware exploits, targeted attacks, advanced persistent threats and other advanced malware that routinely bypass traditional signature based IPS and antivirus engines before they do harm to your network.

Compatibility and licensing:

Available for CloudGen Firewall models F18B and higher, as well as all CloudGen Firewall virtual appliances.

In case the monthly file capacity is reached, the system stops forwarding files to the ATP cloud for the rest of the current month.

When used on firmware 8.3.1 (or lower) an active Malware Protection subscription is required. For firmware 8.3.2 (or higher), ATP is a standalone subscription.

Environment and number of files inspected per month

HARDWARE	# OF FILES
F18	108,000
F80	108,000
F180	108,000
F280	216,000
F380	260,000
F400	324,000
F600	540,000
F800	750,000
F900	1,000,000
F1000	on request

VIRTUAL AND PUBLIC CLOUD	# OF FILES
VFC1	108,000
VFC2	216,000
VFC4	324,000
VFC8	648,000
VFC16	750,000
VFC48	1,000,000

Malware Protection

The Malware Protection subscription provides gateway-based protection against malware, viruses, spyware, and other unwanted programs inside SMTP/S, HTTP/S, POP3/S, FTP, and SFTP traffic.

Key Benefits of Malware Protection:

- Configurable archive recursion depth
- Quarantine functionality for proxy
- Configurable unknown archive policy
- Configurable maximum archive size
- Archiver package support
- Office file-types support
- Proactive detection of new threats
- Advanced heuristics detection techniques
- Hundreds of thousands signatures

CloudGen Firewall model F12A features online malware protection as part of this subscription.

Compatibility and licensing:

Available for CloudGen Firewall models F12A and higher, as well as all CloudGen Firewall virtual appliances. Unlimited user license if purchased with a CloudGen Firewall hardware appliance. If purchased for a virtual appliance the number of protected IPs (capacity) applies.

In High Availability (HA) environments each unit needs to be licensed separately.

Subscription plans for virtual and cloud deployments

For your convenience, Barracuda offers pre-configured plans Threat Protection and Total Threat Protection (listed to the right) for virtual and cloud deployments. Of course, you still may configure subscriptions “à la carte” as required.

	THREAT PROTECTION	TOTAL THREAT PROTECTION
SUPPORTED PLATFORMS		
Virtual appliances	✓	✓
Microsoft Azure	✓	✓
Amazon Web Services (aws)	✓	✓
Google Cloud Platform (GCP)	✓	✓
SUBSCRIPTIONS		
Energize Updates (EU)	✓	✓
Advanced Threat Protection	✓	✓
Barracuda Firewall Insights	✓	✓
Malware Protection	–	✓
Advanced Remote Access	–	✓

Ordering information

Barracuda CloudGen Firewall

Calculation of co-terminus subscriptions:
To allow customers to consolidate their maintenance and subscription offerings to a single end or renewal date, daily rates for all subscription types are offered. These daily rates should be used to extend expiring subscriptions to coincide with the dates of subscriptions expiring in the future. Barracuda does credit early termination of subscriptions using these daily rates.

Hardware appliances - Entry level / branch offices

CLOUDGEN FIREWALL F12A	SKU
Barracuda CloudGen Firewall F12A hardware unit	BNGF12A
Energize Updates (monthly)	BNGF12a-e<duration>
Instant Replacement (monthly)	BNGF12a-h<duration>
Warranty Extension (monthly)	BNGF12a-we<duration>
Premium Support (monthly)	BNGF12a-p<duration>
Advanced Threat Protection (monthly)	BNGF12a-a<duration>
Firewall Insights (monthly)	BNGF12a-fi<duration>
Cold spare F12A	BNGF12A--c
L-shape Rack Mount Bracket (2x)	BPRAC-05
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F180B	SKU
Barracuda CloudGen Firewall F180B hardware unit	BNGF180B
Energize Updates (monthly)	BNGF180a-e<duration>
Instant Replacement (monthly)	BNGF180a-h<duration>
Warranty Extension (monthly)	BNGF180a-we<duration>
Premium Support (monthly)	BNGF180a-p<duration>
Malware Protection (monthly)	BNGF180a-m<duration>
Advanced Threat Protection (monthly)	BNGF180a-a<duration>
Advanced Remote Access (monthly)	BNGF180a-vp<duration>
Firewall Insights (monthly)	BNGF180a-fi<duration>
Cold spare F180B	BNGF180B--c
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F18B	SKU
Barracuda CloudGen Firewall F18B hardware unit	BNGF18B
Energize Updates (monthly)	BNGF18a-e<duration>
Instant Replacement (monthly)	BNGF18a-h<duration>
Warranty Extension (monthly)	BNGF18a-we<duration>
Premium Support (monthly)	BNGF18a-p<duration>
Malware Protection (monthly)	BNGF18a-m<duration>
Advanced Threat Protection (monthly)	BNGF18a-a<duration>
Advanced Remote Access (monthly)	BNGF18a-vp<duration>
Firewall Insights (monthly)	BNGF18a-fi<duration>
Cold spare F18B	BNGF18B--c
L-shape Rack Mount Bracket (2x)	BPRAC-04
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F280C	SKU
Barracuda CloudGen Firewall F280C hardware unit	BNGF280C
Energize Updates (monthly)	BNGF280a-e<duration>
Instant Replacement (monthly)	BNGF280a-h<duration>
Warranty Extension (monthly)	BNGF280a-we<duration>
Premium Support (monthly)	BNGF280a-p<duration>
Malware Protection (monthly)	BNGF280a-m<duration>
Advanced Threat Protection (monthly)	BNGF280a-a<duration>
Advanced Remote Access (monthly)	BNGF280a-vp<duration>
Firewall Insights (monthly)	BNGF280a-fi<duration>
Cold spare F280C	BNGF280C--c
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F80B	SKU
Barracuda CloudGen Firewall F80B hardware unit	BNGF80B
Energize Updates (monthly)	BNGF80a-e<duration>
Instant Replacement (monthly)	BNGF80a-h<duration>
Warranty Extension (monthly)	BNGF80a-we<duration>
Premium Support (monthly)	BNGF80a-p<duration>
Malware Protection (monthly)	BNGF80a-m<duration>
Advanced Threat Protection (monthly)	BNGF80a-a<duration>
Advanced Remote Access (monthly)	BNGF80a-vp<duration>
Firewall Insights (monthly)	BNGF80a-fi<duration>
Cold spare F80B	BNGF80B--c
L-shape Rack Mount Bracket (2x)	BNGF80B.RK015
Barracuda External Power Supply Adapter	BNGF80B.PA008
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

Hardware appliances - Mid-range

CLOUDGEN FIREWALL F380B	SKU
Barracuda CloudGen Firewall F380B hardware unit	BNGF380B
Energize Updates (monthly)	BNGF380a-e<duration>
Instant Replacement (monthly)	BNGF380a-h<duration>
Warranty Extension (monthly)	BNGF380a-we<duration>
Premium Support (monthly)	BNGF380a-p<duration>
Malware Protection (monthly)	BNGF380a-m<duration>
Advanced Threat Protection (monthly)	BNGF380a-a<duration>
Advanced Remote Access (monthly)	BNGF380a-vp<duration>
Firewall Insights (monthly)	BNGF380a-fi<duration>
Cold spare F380B	BNGF380B--c
Rail kit	BNGF380B.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F400C STANDARD MODEL	SKU
Barracuda CloudGen Firewall F400C standard model hardware unit	BNGF400C
Energize Updates (monthly)	BNGF400a-e<duration>
Instant Replacement (monthly)	BNGF400a-h<duration>
Warranty Extension (monthly)	BNGF400a-we<duration>
Premium Support (monthly)	BNGF400a-p<duration>
Malware Protection (monthly)	BNGF400a-m<duration>
Advanced Threat Protection (monthly)	BNGF400a-a<duration>
Advanced Remote Access (monthly)	BNGF400a-vp<duration>
Firewall Insights (monthly)	BNGF400a-fi<duration>
Cold spare F400C standard model	BNGF400C--c
Rail kit	BNGF400C.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F400C.F20	SKU
Barracuda CloudGen Firewall F400C.F20 hardware unit	BNGF400C.F20
Energize Updates (monthly)	BNGF400a.F20-e<duration>
Instant Replacement (monthly)	BNGF400a.F20-h<duration>
Warranty Extension (monthly)	BNGF400a.F20-we<duration>
Premium Support (monthly)	BNGF400a.F20-p<duration>
Malware Protection (monthly)	BNGF400a.F20-m<duration>
Advanced Threat Protection (monthly)	BNGF400a.F20-a<duration>
Advanced Remote Access (monthly)	BNGF400a.F20-vp<duration>
Firewall Insights (monthly)	BNGF400a.F20-fi<duration>
Spare power supply	BNGF400C.PS022
Cold spare F400C.F20	BNGF400C.F20--c
Rail kit	BNGF400C.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F600D.C10	SKU
Barracuda CloudGen Firewall F600D.C10 hardware unit	BNGF600D.C10
Energize Updates (monthly)	BNGF600a.C10-e<duration>
Instant Replacement (monthly)	BNGF600a.C10-h<duration>
Warranty Extension (monthly)	BNGF600a.C10-we<duration>
Premium Support (monthly)	BNGF600a.C10-p<duration>
Malware Protection (monthly)	BNGF600a.C10-m<duration>
Advanced Threat Protection (monthly)	BNGF600a.C10-a<duration>
Advanced Remote Access (monthly)	BNGF600a.C10-vp<duration>
Firewall Insights (monthly)	BNGF600a.C10-fi<duration>
Cold spare F600D.C10	BNGF600D.C10--c
Replacement / spare network module 8x1 GbE Copper	BNGF600D.ET089
Replacement / spare network module 8x1 GbE SFP	BNGF600D.ET074
Replacement / spare network module 2x10 GbE SFP+	BNGF600D.ET091
Rail kit	BNGF600D.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F600D.C20	SKU
Barracuda CloudGen Firewall F600D.C20 hardware unit	BNGF600D.C20
Energize Updates (monthly)	BNGF600a.C20-e<duration>
Instant Replacement (monthly)	BNGF600a.C20-h<duration>
Warranty Extension (monthly)	BNGF600a.C20-we<duration>
Premium Support (monthly)	BNGF600a.C20-p<duration>
Malware Protection (monthly)	BNGF600a.C20-m<duration>
Advanced Threat Protection (monthly)	BNGF600a.C20-a<duration>
Advanced Remote Access (monthly)	BNGF600a.C20-vp<duration>
Firewall Insights (monthly)	BNGF600a.C20-fi<duration>
Spare power supply	BNGF600D.PS022
Cold spare F600D.C20	BNGF600D.C20--c
Replacement / spare network module 8x1 GbE Copper	BNGF600D.ET089
Replacement / spare network module 8x1 GbE SFP	BNGF600D.ET074
Replacement / spare network module 2x10 GbE SFP+	BNGF600D.ET091
Rail kit	BNGF600D.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F600D.F10	SKU
Barracuda CloudGen Firewall F600D.F10 hardware unit	BNGF600D.F10
Energize Updates (monthly)	BNGF600a.F10-e<duration>
Instant Replacement (monthly)	BNGF600a.F10-h<duration>
Warranty Extension (monthly)	BNGF600a.F10-we<duration>
Premium Support (monthly)	BNGF600a.F10-p<duration>
Malware Protection (monthly)	BNGF600a.F10-m<duration>
Advanced Threat Protection (monthly)	BNGF600a.F10-a<duration>
Advanced Remote Access (monthly)	BNGF600a.F10-vp<duration>
Firewall Insights (monthly)	BNGF600a.F10-fi<duration>
Cold spare F600D.F10	BNGF600D.F10--c
Replacement / spare network module 8x1 GbE Copper	BNGF600D.ET089
Replacement / spare network module 8x1 GbE SFP	BNGF600D.ET074
Replacement / spare network module 2x10 GbE SFP+	BNGF600D.ET091
Rail kit	BNGF600D.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F600D.F20	SKU
Barracuda CloudGen Firewall F600D.F20 hardware unit	BNGF600D.F20
Energize Updates (monthly)	BNGF600a.F20-e<duration>
Instant Replacement (monthly)	BNGF600a.F20-h<duration>
Warranty Extension (monthly)	BNGF600a.F20-we<duration>
Premium Support (monthly)	BNGF600a.F20-p<duration>
Malware Protection (monthly)	BNGF600a.F20-m<duration>
Advanced Threat Protection (monthly)	BNGF600a.F20-a<duration>
Advanced Remote Access (monthly)	BNGF600a.F20-vp<duration>
Firewall Insights (monthly)	BNGF600a.F20-fi<duration>
Spare power supply	BNGF600D.PS022
Cold spare F600D.F20	BNGF600D.F20--c
Replacement / spare network module 8x1 GbE Copper	BNGF600D.ET089
Replacement / spare network module 8x1 GbE SFP	BNGF600D.ET074
Replacement / spare network module 2x10 GbE SFP+	BNGF600D.ET091
Rail kit	BNGF600D.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F600D.E20	SKU
Barracuda CloudGen Firewall F600D.E20 hardware unit	BNGF600D.E20
Energize Updates (monthly)	BNGF600a.E20-e<duration>
Instant Replacement (monthly)	BNGF600a.E20-h<duration>
Warranty Extension (monthly)	BNGF600a.E20-we<duration>
Premium Support (monthly)	BNGF600a.E20-p<duration>
Malware Protection (monthly)	BNGF600a.E20-m<duration>
Advanced Threat Protection (monthly)	BNGF600a.E20-a<duration>
Advanced Remote Access (monthly)	BNGF600a.E20-vp<duration>
Firewall Insights (monthly)	BNGF600a.E20-fi<duration>
Spare power supply	BNGF600D.PS022
Cold spare F600D.E20	BNGF600D.E20--c
Replacement / spare network module 8x1 GbE Copper	BNGF600D.ET089
Replacement / spare network module 8x1 GbE SFP	BNGF600D.ET074
Replacement / spare network module 2x10 GbE SFP+	BNGF600D.ET091
Rail kit	BNGF600D.RK017
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

Hardware appliances - High-end

CLOUDGEN FIREWALL F800D.CCC	SKU
Barracuda CloudGen Firewall F800D.CCC hardware unit	BNGF800D.CCC
Energize Updates (monthly)	BNGF800a.CCC-e<duration>
Instant Replacement (monthly)	BNGF800a.CCC-h<duration>
Warranty Extension (monthly)	BNGF800a.CCC-we<duration>
Premium Support (monthly)	BNGF800a.CCC-p<duration>
Malware Protection (monthly)	BNGF800a.CCC-m<duration>
Advanced Threat Protection (monthly)	BNGF800a.CCC-a<duration>
Advanced Remote Access (monthly)	BNGF800a.CCC-vp<duration>
Firewall Insights (monthly)	BNGF800a.CCC-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F800D.CCC	BNGF800D.CCC--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F900C.CCC	SKU
Barracuda CloudGen Firewall F900C.CCC hardware unit	BNGF900C.CCC
Energize Updates (monthly)	BNGF900a.CCC-e<duration>
Instant Replacement (monthly)	BNGF900a.CCC-h<duration>
Warranty Extension (monthly)	BNGF900a.CCC-we<duration>
Premium Support (monthly)	BNGF900a.CCC-p<duration>
Malware Protection (monthly)	BNGF900a.CCC-m<duration>
Advanced Threat Protection (monthly)	BNGF900a.CCC-a<duration>
Advanced Remote Access (monthly)	BNGF900a.CCC-vp<duration>
Firewall Insights (monthly)	BNGF900a.CCC-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F900C.CCC	BNGF900C.CCC--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
Replacement / spare network module 2x40 GbE QSFP+	BNGM809a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F800D.CCF	SKU
Barracuda CloudGen Firewall F800D.CCF hardware unit	BNGF800D.CCF
Energize Updates (monthly)	BNGF800a.CCF-e<duration>
Instant Replacement (monthly)	BNGF800a.CCF-h<duration>
Warranty Extension (monthly)	BNGF800a.CCF-we<duration>
Premium Support (monthly)	BNGF800a.CCF-p<duration>
Malware Protection (monthly)	BNGF800a.CCF-m<duration>
Advanced Threat Protection (monthly)	BNGF800a.CCF-a<duration>
Advanced Remote Access (monthly)	BNGF800a.CCF-vp<duration>
Firewall Insights (monthly)	BNGF800a.CCF-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F800D.CCF	BNGF800D.CCF--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F900C.CCE	SKU
Barracuda CloudGen Firewall F900C.CCE hardware unit	BNGF900C.CCE
Energize Updates (monthly)	BNGF900a.CCE-e<duration>
Instant Replacement (monthly)	BNGF900a.CCE-h<duration>
Warranty Extension (monthly)	BNGF900a.CCE-we<duration>
Premium Support (monthly)	BNGF900a.CCE-p<duration>
Malware Protection (monthly)	BNGF900a.CCE-m<duration>
Advanced Threat Protection (monthly)	BNGF900a.CCE-a<duration>
Advanced Remote Access (monthly)	BNGF900a.CCE-vp<duration>
Firewall Insights (monthly)	BNGF900a.CCE-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F900C.CCE	BNGF900C.CCE--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
Replacement / spare network module 2x40 GbE QSFP+	BNGM809a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F800D.CCE	SKU
Barracuda CloudGen Firewall F800D.CCE hardware unit	BNGF800D.CCE
Energize Updates (monthly)	BNGF800a.CCE-e<duration>
Instant Replacement (monthly)	BNGF800a.CCE-h<duration>
Warranty Extension (monthly)	BNGF800a.CCE-we<duration>
Premium Support (monthly)	BNGF800a.CCE-p<duration>
Malware Protection (monthly)	BNGF800a.CCE-m<duration>
Advanced Threat Protection (monthly)	BNGF800a.CCE-a<duration>
Advanced Remote Access (monthly)	BNGF800a.CCE-vp<duration>
Firewall Insights (monthly)	BNGF800a.CCE-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F800D.CCE	BNGF800D.CCE--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F900C.CFE	SKU
Barracuda CloudGen Firewall F900C.CFE hardware unit	BNGF900C.CFE
Energize Updates (monthly)	BNGF900a.CFE-e<duration>
Instant Replacement (monthly)	BNGF900a.CFE-h<duration>
Warranty Extension (monthly)	BNGF900a.CFE-we<duration>
Premium Support (monthly)	BNGF900a.CFE-p<duration>
Malware Protection (monthly)	BNGF900a.CFE-m<duration>
Advanced Threat Protection (monthly)	BNGF900a.CFE-a<duration>
Advanced Remote Access (monthly)	BNGF900a.CFE-vp<duration>
Firewall Insights (monthly)	BNGF900a.CFE-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F900C.CFE	BNGF900C.CFE--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
Replacement / spare network module 2x40 GbE QSFP+	BNGM809a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F900C.CFEQ	SKU
Barracuda CloudGen Firewall F900C.CFEQ hardware unit	BNGF900C.CFEQ
Energize Updates (monthly)	BNGF900a.CFEQ-e<duration>
Instant Replacement (monthly)	BNGF900a.CFEQ-h<duration>
Warranty Extension (monthly)	BNGF900a.CFEQ-we<duration>
Premium Support (monthly)	BNGF900a.CFEQ-p<duration>
Malware Protection (monthly)	BNGF900a.CFEQ-m<duration>
Advanced Threat Protection (monthly)	BNGF900a.CFEQ-a<duration>
Advanced Remote Access (monthly)	BNGF900a.CFEQ-vp<duration>
Firewall Insights (monthly)	BNGF900a.CFEQ-fi<duration>
Spare power supply	BNGIRPS2a
Cold spare F900C.CFEQ	BNGF900C.CFEQ--c
Replacement / spare network module 8x1 GbE Copper	BNGM806a
Replacement / spare network module 8x1 GbE SFP	BNGM807a
Replacement / spare network module 4x10 GbE SFP+	BNGM808a
Replacement / spare network module 2x40 GbE QSFP+	BNGM809a
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F1000B.CE0	SKU
Barracuda CloudGen Firewall F1000B.CE0 hardware unit	BNGF1000B.CE0
Energize Updates (monthly)	BNGF1000a.CE0-e<duration>
Instant Replacement (monthly)	BNGF1000a.CE0-h<duration>
Warranty Extension (monthly)	BNGF1000a.CE0-we<duration>
Premium Support (monthly)	BNGF1000a.CE0-p<duration>
Malware Protection (monthly)	BNGF1000a.CE0-m<duration>
Advanced Threat Protection (monthly)	BNGF1000a.CE0-a<duration>
Advanced Remote Access (monthly)	BNGF1000a.CE0-vp<duration>
Firewall Insights (monthly)	BNGF1000a.CE0-fi<duration>
Cold spare F1000B.CE0	BNGF1000B.CE0--c
Additional SSD, swappable	BNGF1000B.CE0SSD157
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F1000B.CE2	SKU
Barracuda CloudGen Firewall F1000B.CE2 hardware unit	BNGF1000B.CE2
Energize Updates (monthly)	BNGF1000a.CE2-e<duration>
Instant Replacement (monthly)	BNGF1000a.CE2-h<duration>
Warranty Extension (monthly)	BNGF1000a.CE2-we<duration>
Premium Support (monthly)	BNGF1000a.CE2-p<duration>
Malware Protection (monthly)	BNGF1000a.CE2-m<duration>
Advanced Threat Protection (monthly)	BNGF1000a.CE2-a<duration>
Advanced Remote Access (monthly)	BNGF1000a.CE2-vp<duration>
Firewall Insights (monthly)	BNGF1000a.CE2-fi<duration>
Cold spare F1000B.CE0	BNGF1000B.CE2--c
Additional SSD, swappable	BNGF1000B.CE0SSD157
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F1000B.CFE	SKU
Barracuda CloudGen Firewall F1000B.CFE hardware unit	BNGF1000B.CFE
Energize Updates (monthly)	BNGF1000a.CFE-e<duration>
Instant Replacement (monthly)	BNGF1000a.CFE-h<duration>
Warranty Extension (monthly)	BNGF1000a.CFE-we<duration>
Premium Support (monthly)	BNGF1000a.CFE-p<duration>
Malware Protection (monthly)	BNGF1000a.CFE-m<duration>
Advanced Threat Protection (monthly)	BNGF1000a.CFE-a<duration>
Advanced Remote Access (monthly)	BNGF1000a.CFE-vp<duration>
Firewall Insights (monthly)	BNGF1000a.CFE-fi<duration>
Cold spare F1000B.CFE	BNGF1000B.CFE--c
Additional SSD, swappable	BNGF1000B.CE0SSD157
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F1000B.CFEQ	SKU
Barracuda CloudGen Firewall F1000B.CFEQ hardware unit	BNGF1000B.CFEQ
Energize Updates (monthly)	BNGF1000a.CFEQ-e<duration>
Instant Replacement (monthly)	BNGF1000a.CFEQ-h<duration>
Warranty Extension (monthly)	BNGF1000a.CFEQ-we<duration>
Premium Support (monthly)	BNGF1000a.CFEQ-p<duration>
Malware Protection (monthly)	BNGF1000a.CFEQ-m<duration>
Advanced Threat Protection (monthly)	BNGF1000a.CFEQ-a<duration>
Advanced Remote Access (monthly)	BNGF1000a.CFEQ-vp<duration>
Firewall Insights (monthly)	BNGF1000a.CFEQ-fi<duration>
Cold spare F1000B.CFEQ	BNGF1000B.CFEQ--c
Additional SSD, swappable	BNGF1000B.CE0SSD157
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

Hardware appliances - DIN-rail compatible

CLOUDGEN FIREWALL F93A.R	SKU
Barracuda CloudGen Firewall F93A.R hardware unit	BNGF93A.R
Energize Updates (monthly)	BNGF93a.R-e<duration>
Instant Replacement (monthly)	BNGF93a.R-h<duration>
Warranty Extension (monthly)	BNGF93a.R-we<duration>
Premium Support (monthly)	BNGF93a.R-p<duration>
Malware Protection (monthly)	BNGF93a.R-m<duration>
Advanced Threat Protection (monthly)	BNGF93a.R-a<duration>
Advanced Remote Access (monthly)	BNGF93a.R-vp<duration>
Firewall Insights (monthly)	BNGF93a.R-fi<duration>
Cold spare F93A.R	BNGF93A.R--c
External power supply unit	BNGF93A.PA009
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

CLOUDGEN FIREWALL F193A.R	SKU
Barracuda CloudGen Firewall F193A.R hardware unit	BNGF193A.R
Energize Updates (monthly)	BNGF193a.R-e<duration>
Instant Replacement (monthly)	BNGF193a.R-h<duration>
Warranty Extension (monthly)	BNGF193a.R-we<duration>
Premium Support (monthly)	BNGF193a.R-p<duration>
Malware Protection (monthly)	BNGF193a.R-m<duration>
Advanced Threat Protection (monthly)	BNGF193a.R-a<duration>
Advanced Remote Access (monthly)	BNGF193a.R-vp<duration>
Firewall Insights (monthly)	BNGF193a.R-fi<duration>
Cold spare F193A.R	BNGF193A.R--c
External power supply unit	BNGF193A.PA009
USB modem 4G/LTE (EMEA / APAC)	CGF-M40B
USB modem 4G/LTE Instant Replacement (monthly)	CGF-M40-IR<duration>
USB modem 4G/LTE Warranty Extension (monthly)	CGF-M40-WE<duration>

SECURE CONNECTOR 20	SKU
Barracuda Secure Connector FSC20 hardware unit	BNGFSC20a
Pool license Energize Updates (monthly)	BNGFSC2p-e<duration>
Instant Replacement (monthly)	BNGFSC20a-h<duration>
Warranty Extension (monthly)	BNGFSC20a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 21	SKU
Barracuda Secure Connector FSC21 hardware unit	BNGFSC21a
Pool license Energize Updates (monthly)	BNGFSC2p-e<duration>
Instant Replacement (monthly)	BNGFSC21a-h<duration>
Warranty Extension (monthly)	BNGFSC21a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 24 (EMEA / APAC)	SKU
Barracuda Secure Connector FSC24 hardware unit	BNGFSC24a
Pool license Energize Updates (monthly)	BNGFSC2p-e<duration>
Instant Replacement (monthly)	BNGFSC24a-h<duration>
Warranty Extension (monthly)	BNGFSC24a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 25 (EMEA / APAC)	SKU
Barracuda Secure Connector FSC25 hardware unit	BNGFSC25a
Pool license Energize Updates (monthly)	BNGFSC2p-e<duration>
Instant Replacement (monthly)	BNGFSC24a-h<duration>
Warranty Extension (monthly)	BNGFSC24a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 30	SKU
Barracuda Secure Connector FSC30 hardware unit	BNGFSC30a
Pool license Energize Updates (monthly)	BNGFSC3p-e<duration>
Instant Replacement (monthly)	BNGFSC30a-h<duration>
Warranty Extension (monthly)	BNGFSC30a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 31	SKU
Barracuda Secure Connector FSC31 hardware unit	BNGFSC31a
Pool license Energize Updates (monthly)	BNGFSC3p-e<duration>
Instant Replacement (monthly)	BNGFSC31a-h<duration>
Warranty Extension (monthly)	BNGFSC31a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 34	SKU
Barracuda Secure Connector FSC34 hardware unit	BNGFSC34a
Pool license Energize Updates (monthly)	BNGFSC3p-e<duration>
Instant Replacement (monthly)	BNGFSC34a-h<duration>
Warranty Extension (monthly)	BNGFSC34a-we<duration>
Power supply	BNGFSCAPSUa

SECURE CONNECTOR 35	SKU
Barracuda Secure Connector FSC35 hardware unit	BNGFSC35a
Pool license Energize Updates (monthly)	BNGFSC3p-e<duration>
Instant Replacement (monthly)	BNGFSC35a-h<duration>
Warranty Extension (monthly)	BNGFSC35a-we<duration>
Power supply	BNGFSCAPSUa

Virtual and public cloud deployments

BARRACUDA CLOUDGEN FIREWALL VFC1	SKU
Barracuda CloudGen Firewall VFC1	CGF-VFC-1C-Acc
Energize Updates (monthly)	CGF-VFC-1C-EU-<duration>
Premium Support (monthly)	CGF-VFC-1C-PS-<duration>
Malware Protection (monthly)	CGF-VFC-1C-MP-<duration>
Advanced Threat Protection (monthly)	CGF-VFC-1C-ATP-<duration>
Advanced Remote Access (monthly)	CGF-VFC-1C-ARA-<duration>
Firewall Insights (monthly)	CGF-VFC-1C-FI-<duration>
Threat Protection plan (monthly)	CGF-VFC-1C-TP-<duration>
Total Threat Protection plan (monthly)	CGF-VFC-1C-TTP-<duration>

BARRACUDA CLOUDGEN FIREWALL VFC2	SKU
Barracuda CloudGen Firewall VFC2	CGF-VFC-2C-Acc
Energize Updates (monthly)	CGF-VFC-2C-EU-<duration>
Premium Support (monthly)	CGF-VFC-2C-PS-<duration>
Malware Protection (monthly)	CGF-VFC-2C-MP-<duration>
Advanced Threat Protection (monthly)	CGF-VFC-2C-ATP-<duration>
Advanced Remote Access (monthly)	CGF-VFC-2C-ARA-<duration>
Firewall Insights (monthly)	CGF-VFC-2C-FI-<duration>
Threat Protection plan (monthly)	CGF-VFC-2C-TP-<duration>
Total Threat Protection plan (monthly)	CGF-VFC-2C-TTP-<duration>

BARRACUDA CLOUDGEN FIREWALL VFC4	SKU
Barracuda CloudGen Firewall VFC4	CGF-VFC-4C-Acc
Energize Updates (monthly)	CGF-VFC-4C-EU-<duration>
Premium Support (monthly)	CGF-VFC-4C-PS-<duration>
Malware Protection (monthly)	CGF-VFC-4C-MP-<duration>
Advanced Threat Protection (monthly)	CGF-VFC-4C-ATP-<duration>
Advanced Remote Access (monthly)	CGF-VFC-4C-ARA-<duration>
Firewall Insights (monthly)	CGF-VFC-4C-FI-<duration>
Threat Protection plan (monthly)	CGF-VFC-4C-TP-<duration>
Total Threat Protection plan (monthly)	CGF-VFC-4C-TTP-<duration>

BARRACUDA CLOUDGEN FIREWALL VFC8	SKU
Barracuda CloudGen Firewall VFC8	CGF-VFC-8C-Acc
Energize Updates (monthly)	CGF-VFC-8C-EU-<duration>
Premium Support (monthly)	CGF-VFC-8C-PS-<duration>
Malware Protection (monthly)	CGF-VFC-8C-MP-<duration>
Advanced Threat Protection (monthly)	CGF-VFC-8C-ATP-<duration>
Advanced Remote Access (monthly)	CGF-VFC-8C-ARA-<duration>
Firewall Insights (monthly)	CGF-VFC-8C-FI-<duration>
Threat Protection plan (monthly)	CGF-VFC-8C-TP-<duration>
Total Threat Protection plan (monthly)	CGF-VFC-8C-TTP-<duration>

BARRACUDA CLOUDGEN FIREWALL VFC16	SKU
Barracuda CloudGen Firewall VFC16	CGF-VFC-16C-Acc
Energize Updates (monthly)	CGF-VFC-16C-EU-<duration>
Premium Support (monthly)	CGF-VFC-16C-PS-<duration>
Malware Protection (monthly)	CGF-VFC-16C-MP-<duration>
Advanced Threat Protection (monthly)	CGF-VFC-16C-ATP-<duration>
Advanced Remote Access (monthly)	CGF-VFC-16C-ARA-<duration>
Firewall Insights (monthly)	CGF-VFC-16C-FI-<duration>
Threat Protection plan (monthly)	CGF-VFC-16C-TP-<duration>
Total Threat Protection plan (monthly)	CGF-VFC-16C-TTP-<duration>

BARRACUDA CLOUDGEN FIREWALL VFC48	SKU
Barracuda CloudGen Firewall VFC48	CGF-VFC-48C-Acc
Energize Updates (monthly)	CGF-VFC-48C-EU-<duration>
Premium Support (monthly)	CGF-VFC-48C-PS-<duration>
Malware Protection (monthly)	CGF-VFC-48C-MP-<duration>
Advanced Threat Protection (monthly)	CGF-VFC-48C-ATP-<duration>
Advanced Remote Access (monthly)	CGF-VFC-48C-ARA-<duration>
Firewall Insights (monthly)	CGF-VFC-48C-FI-<duration>
Threat Protection plan (monthly)	CGF-VFC-48C-TP-<duration>
Total Threat Protection plan (monthly)	CGF-VFC-48C-TTP-<duration>

Barracuda Firewall Control Center

Virtual Edition

FIREWALL CONTROL CENTER VC400	SKU
Barracuda Firewall Control Center VC400 - Standard Edition	BNCVC400a
Energize Updates (monthly)	BNCVC400a-e<duration>
Premium Support (monthly)	BNCVC400a-p<duration>
Additional Tenant (Range) (monthly)	BNC400-b1<duration>

FIREWALL CONTROL CENTER VC820	SKU
Barracuda Firewall Control Center VC820 - Global Edition	BCCVC820a
Energize Updates (monthly)	BCCVC820a-e<duration>
Premium Support (monthly)	BCCVC820a-p<duration>
Additional Tenant (Range) (monthly)	BNC-b1<duration>

FIREWALL CONTROL CENTER VC610	SKU
Barracuda Firewall Control Center VC610 - Enterprise Edition	BNCVC610a
Energize Updates (monthly)	BNCVC610a-e<duration>
Premium Support (monthly)	BNCVC610a-p<duration>
Additional Tenant (Range) (monthly)	BNC-b1<duration>

Microsoft Azure

FIREWALL CONTROL CENTER VCC400	SKU
Barracuda Firewall Control Center VCC400 - Standard Edition	BNCCAZ400a
Virtual subscription (incl. Energize Updates; monthly)	BNCCAZ400a-v<duration>
Premium Support (monthly)	BNCCAZ400a-p<duration>
Additional Tenant (Range) (monthly)	BNC400-b1<duration>

FIREWALL CONTROL CENTER VCC610	SKU
Barracuda Firewall Control Center VCC610 - Enterprise Edition	BNCCAZ610a
Virtual subscription (incl. Energize Updates; monthly)	BNCCAZ610a-v<duration>
Premium Support (monthly)	BNCCAZ610a-p<duration>
Additional Tenant (Range) (monthly)	BNC-b1<duration>

Amazon Web Services (AWS)

FIREWALL CONTROL CENTER VCC400	SKU
Barracuda Firewall Control Center VCC400 - Standard Edition	BNCCAW400a
Virtual subscription (incl. Energize Updates; monthly)	BNCCAW400a-v<duration>
Premium Support (monthly)	BNCCAW400a-p<duration>
Additional Tenant (Range) (monthly)	BNC400-b1<duration>

FIREWALL CONTROL CENTER VCC610	SKU
Barracuda Firewall Control Center VCC610 - Enterprise Edition	BNCCAW610a
Virtual subscription (incl. Energize Updates; monthly)	BNCCAW610a-v<duration>
Premium Support (monthly)	BNCCAW610a-p<duration>
Additional Tenant (Range) (monthly)	BNC-b1<duration>

Google Cloud Platform (GCP)

FIREWALL CONTROL CENTER VCC400	SKU
Barracuda Firewall Control Center VCC400 - Standard Edition	BNCCLD400a
Virtual subscription (incl. Energize Updates; monthly)	BNCCLD400a-v<duration>
Premium Support (monthly)	BNCCLD400a-p<duration>
Additional Tenant (Range) (monthly)	BNC400-b1<duration>

FIREWALL CONTROL CENTER VCC610	SKU
Barracuda Firewall Control Center VCC610 - Enterprise Edition	BNCCLD610a
Virtual subscription (incl. Energize Updates; monthly)	BNCCLD610a-v<duration>
Premium Support (monthly)	BNCCLD610a-p<duration>
Additional Tenant (Range) (monthly)	BNC-b1<duration>

Barracuda Firewall Insights

Firewall Insights Server (Virtual Edition)

FIREWALL INSIGHTS SERVER	SKU
Firewall Insights Server	BNGFISa

Firewall Insights Server Subscription

FIREWALL INSIGHTS SERVER SUBSCRIPTION	SKU
Firewall Insights Server Subscription (monthly)	BNGFISa-e<duration>

Certificates

CE Declaration of Conformity
Barracuda Networks

We,
Manufacturer's Name: Barracuda Networks
Manufacturer's Address: 5225 Hellyer Ave. Suite 150
San Jose, CA 95138
USA

Hereby, declare under our sole responsibility that the requirements set out in the Directives 2014/35/EU, 2014/30/EU, 2014/53/2014, 2011/65/EU, 2012/19/EU has been fully fulfilled on our product indication below:

Barracuda CloudGen Firewall

The object of the declaration described above is in conformity with the relevant Union harmonization legislation:

Electrical Safety (LVD) 2014/35/EU
Electromagnetic compatibility directive (EMC) 2014/30/EU
Radio Equipment Directive (RED) 2014/53/EU
Restriction of Hazardous Substances Directive (RoHS) 2011/65/EU
Waste Electrical and Electronic Equipment Directive (WEEE) 2012/19/EU

The following standards and technical specifications have been applied:

EN 55032:2015 + AC:2016 Class A
EN 55024:2010+AS:2015 Class A
EN 61000-3-2:2014 Class A
EN 61000-3-3:2013
EN 300 328 V2.1.1
EN 301 893 V2.1.1
EN 301 489-1 V2.2.0
EN 301 489-17 V3.2.0
EN 62311:2008
EN 60950-1:2006+A11:2009+A1:2010+A12:2011+A2:2013

Signed for and on behalf of:

Signature, Date, Place : _____ February 1, 2019, USA
Name and Job Title : Ken Martin / SVP, World Wide Manufacturing Ops.

February 21, 2020

To Whom It May Concern:

Barracuda Networks Inc. (”Barracuda”) hereby confirm that the Barracuda CloudGen Firewall complies with the UN Manual Test and Criteria, Part III, subsection 38.3, Revision 6, Amendment 1 (38.3). This is based on documents gathered from our supply chain which integrates the lithium cell battery into the system.

Thank you for your attention to this matter.

Best Regards,

Ken Martin
SVP Worldwide Manufacturing Operations
Barracuda Networks Inc.



Document version 5.6
Applies for firmware version 9.0.x

Barracuda Networks, Inc.
barracuda.com

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