



We did...



LIGHTBOX Series  
Next Generation Firewall

[www.quedra.com](http://www.quedra.com)

## Quedra LightBox

Quedra LightBox Series is the next generation Network Security solution that provides advanced network security and access solution for small, medium and medium-large businesses and edge offices. With its experience in network technologies, Quedra offers both flexible access and access control features and advanced products against all kinds of new generation network security threats.

### Key Features :

- Easy setup with innate SD-WAN features
- All of the Next Generation Firewall features
- VPN support for remote access
- Rich Routing capabilities
- Configuration suitable for all types of networks with different operating modes
- Control panel where you can view all network objects and their states simultaneously
- Real-time network attack prevention (IPS)
- Gateway based Anti Virus and Anti Spam
- Deep packet inspection with DPI technology
- Application Security
- Protection for all types of DoS, BotNET attacks
- IP Based and MAC based filtering
- WAN Load Balance, FailOver support
- Server Load Balance support
- Bandwidth upgrade with LACP

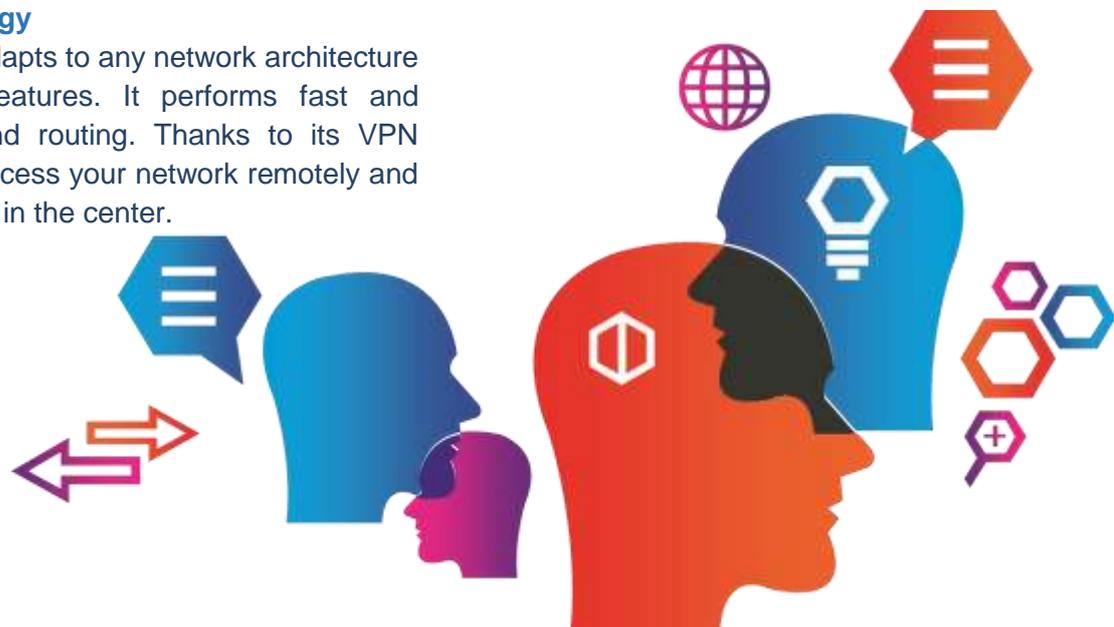


### Next Generation Network Security

Quedra LightBox NGFW product offers high performance solutions with its rich network features ranging from Layer 2 to Layer 7. It provides full compatibility with your network thanks to its configuration flexibility. It strengthens your network with security functions, increasing overall network security.

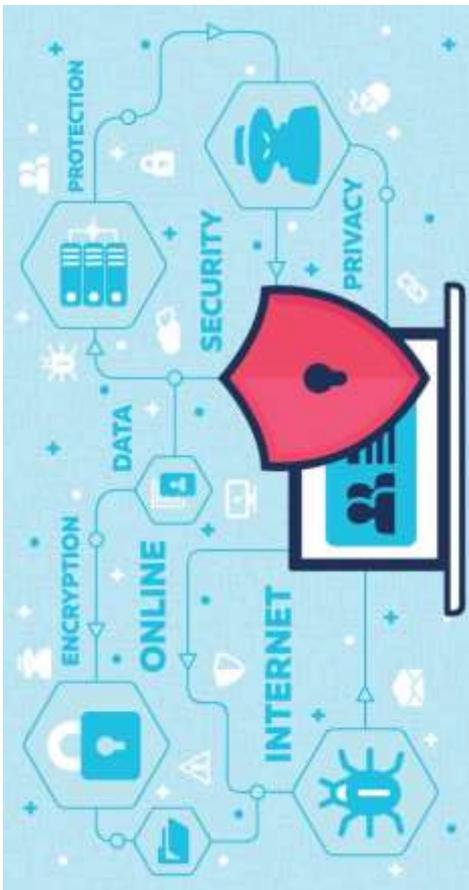
### Flexable Network Topology

Quedra LightBox Series adapts to any network architecture thanks to its SDWAN features. It performs fast and performance switching and routing. Thanks to its VPN features, you can easily access your network remotely and control your branches as if in the center.



### HotSpot and Internet Access Control

- Guest user management
- Multi-language support in access control
- Welcome page customization
- Time and usage limitation
- Multiple device support for one user
- Local user authentication
- User authentication via SMS
- User authentication with TR ID number
- User authentication with external databases



### Network and Security Layers

- Stateful Package Inspection - SPI
- Network Address Translation - NAT
- Policy Based Routing – PBR
- IP:MAC mapping
- Static Routing
- Destination, Source and Port based Routing
- Bandwidth Management
- Static and Dynamic IP
- DHCP Server and Client
- PPPoE / IPoE Support
- DNS Proxy Support
- VLAN Support
- VPN (IPSec, SSLVPN, OpenVPN)
- Load Balance and Failover Support
- URL Filtering
- Category and word Based Filtering
- Customizable address, word, file based filtering
- Virus, Trojan plug-in and Malware blocking
- Autonomous Security Database Signature Update
- Application Filtering
- Signature-Based Category-Based Intrusion Detection and Prevention

### Logging and Reports

- SysLog support
- All network activity logs
- Detailed activity logs
- Instant system information
- Records in accordance with TR Law No. 5651
- Ability to transfer recordings to different media
- Accuracy and integrity preservation



## HARDWARE AND PERFORMANCE

	LB30	LB60	LB100	LB300
				
<b>Interfaces</b>	4xGigabit Ethernet (RJ45)	4xGigabit Ethernet (RJ45)	6x2.5Gigabit Ethernet (RJ45)	6x2.5Gigabit Ethernet (RJ45)
<b>Sessions</b>	150.000	200.000	500.000	900.000
<b>New Sessions/Sec</b>	15.000	20.000	40.000	90.000
<b>Firewall Throughput</b>	900Mbps	1200Mbps	2000Mbps	3000Mbps
<b>UTM/NGFW Throughput</b>	90Mbps	120Mbps	350Mbps	400Mbps
<b>IPS Throughput</b>	100Mbps	100Mbps	400Mbps	400Mbps
<b>Antivirus Throughput</b>	80Mbps	80Mbps	350Mbps	350Mbps
<b>IPSEC VPN Throughput</b>	90Mbps	90Mbps	450Mbps	450Mbps
<b>SSL VPN Throughput</b>	60Mbps	60Mbps	300Mbps	300Mbps
<b>IPSEC VPN Tunnels</b>	10	30	50	100
<b>SSL VPN Tunnels</b>	10	30	50	100
<b>Firewall Rules</b>	1000	2000	5000	5000
<b>Internal Storage</b>	240GB SSD	240GB SSD	256GB SSD	256GB SSD
<b>Working Temperature</b>	-10°C-- 60°C(14F~140F) 30%--90% Hum	-10°C-- 60°C(14F~140F) 30%--90% Hum	-10°C-- 50°C(14F~122F) 30%--90% Hum	-10°C-- 50°C(14F~122F) 30%--90% Hum
<b>Measurements (Device)</b>	135mm*127mm*39mm	135mm*127mm*39mm	177mm*125mm*55mm	177mm*125mm*55mm
<b>Measurements (Box)</b>	305mm*205mm*75mm	305mm*205mm*75mm	305mm*205mm*75mm	305mm*205mm*75mm
<b>Weight (Kg)</b>	Net 0.6kg / Gross 1.2kg	Net 0.6kg / Gross 1.2kg	Net 1.3kg / Gross 2.0kg	Net 1.3kg / Gross 2.0kg

### SPECIFICATIONS

<b>Operating Modes</b>	<b>VPN - Virtual Private Network</b>	<b>Management Interface Features</b>
<ul style="list-style-type: none"> <li>OSI Layer 2 Transparent</li> <li>OSI Layer 3 Routing + Stealth Mode</li> <li>Virtual Wire</li> </ul>	<ul style="list-style-type: none"> <li>SSL VPN <ul style="list-style-type: none"> <li>&gt; Certificate Verification</li> <li>User Credentials Verification (+ 2FA )</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>HTML5 Responsive Web Interface <ul style="list-style-type: none"> <li>&gt; SSL Certificate based authentication</li> <li>&gt; 2FA - Two-Factor Authentication</li> <li>&gt; Customizing the Service Port</li> </ul> </li> </ul>
<b>Routing</b>	<ul style="list-style-type: none"> <li>&gt; Authentication: <ul style="list-style-type: none"> <li>BLAKE2*, RSA*, SHA*, MD*, SHAKE*</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>Out of Band Management Plane <ul style="list-style-type: none"> <li>&gt; Resource Reservation</li> </ul> </li> </ul>
<ul style="list-style-type: none"> <li>IPv4 / IPv6 Static Routing</li> <li>PBR - Policy Based Routing</li> <li>OSPF - Open Shortest Path First Protocol</li> <li>BGP - Border Gateway Protocol</li> <li>RIP / RIPng - Routing Information Protocol</li> <li>PIM SM/SSM IGMP v2/v3 Multicast Routing</li> <li>Routing Monitor</li> </ul>	<ul style="list-style-type: none"> <li>&gt; Encryption: <ul style="list-style-type: none"> <li>AES*, ARIA*, CAMELLIA*, SEED*, SM4*</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>SSH Console</li> <li>Physical Console (Monitor, Keyboard)</li> <li>Serial Console (If exists on hardware)</li> <li>Incident Notification Service <ul style="list-style-type: none"> <li>&gt; SMS, Email, Browser Notification</li> </ul> </li> </ul>
<b>Network Interface Specifications</b>	<b>Services</b>	<b>User Authentication Methods</b>
<ul style="list-style-type: none"> <li>Loopback Interface, IEEE802.1Q VLAN support</li> <li>Link Aggregation : <ul style="list-style-type: none"> <li>&gt; LACP, Failover, Load Balance, Round Robin</li> </ul> </li> <li>Bridging / STP / Ethernet Bypass</li> <li>Virtual Extensible LAN (VXLAN)</li> <li>NAT64, IPv6 6to4 Tunneling</li> <li>Static ARP</li> <li>PPP ve PPPoE Connection Interface</li> <li>3G/4G/LTE Modem Support</li> </ul>	<ul style="list-style-type: none"> <li>Live Dashboard</li> <li>Automated Update System</li> <li>Offline Update</li> <li>Automatic Configuration Backup</li> <li>DHCPv4/v6 Server, Relay and Monitor</li> <li>Authenticated http/https Proxy</li> <li>Quedra Shared Management-Virtual System</li> <li>QoS - Effective Bandwidth Management</li> <li>Time and Quota Adjustable Hotspot(Captive)</li> </ul>	<ul style="list-style-type: none"> <li>Mernis (NVI)</li> <li>SMS</li> <li>Local User</li> <li>HTTP (API)</li> <li>LDAP</li> <li>RADIUS</li> <li>POP3 / IMAP</li> <li>SSO: Negotiate Kerberos - Active Directory</li> <li>TACACS +</li> </ul>
<b>Security Specifications</b>	<ul style="list-style-type: none"> <li>Bandwidth Monitor</li> </ul>	<b>Product Certifications</b>
<ul style="list-style-type: none"> <li>Zone Based Firewall</li> <li>Application Security (AppID)</li> <li>Honeypot Trapping</li> <li>Traffic Rate Limiting</li> <li>Multi-Policy, Section and Profile Support</li> <li>Time Based Security Policy Management</li> <li>IPS - Intrusion Detection and Prevention</li> <li>SPI - Statefull Packet Inspection</li> <li>DPI - Deep Packet Inspection</li> <li>http / https Web Filtering (SNI / DPI)</li> <li>DNS Query Filtering</li> <li>Interface Based Anti Spoofing (Sym and Asym)</li> <li>MAC Based Quarantine</li> <li>MAC - IP Matching Control</li> <li>ARP Poisoning Protection</li> <li>Flood Intrusion Prevention</li> <li>Gateway Anti Virüs / Anti Malware ***</li> <li>SSH Inspection, Anti Botnet</li> <li>DoS Prevention - Connection Limiting</li> <li>XFF Scan - Trusted Proxy Servers</li> <li>Service Based Timeout Control</li> </ul>	<ul style="list-style-type: none"> <li>Quedra Registry Service</li> <li>Quedra Announcement Service</li> <li>NetFlow Export Service</li> <li>RADIUS Server and Proxy</li> <li>Domain Based http/https Forwarding</li> <li>https SSL Offload Service</li> <li>SNMP v2/v3 Service</li> <li>RRD Service <ul style="list-style-type: none"> <li>&gt; Number of Active Users and Bandwidth</li> </ul> </li> <li>http/https Caching</li> <li>Domain Based Bandwidth Limiting</li> <li>Log Timestamping</li> <li>Timestamp Integration</li> <li>Syslog (TCP/UDP/TLS) - supported formats; <ul style="list-style-type: none"> <li>&gt; RAW, CEF, EWMM, GELF, JSON, WELF, CIM</li> </ul> </li> <li>Black Hole Service</li> <li>Campus Information Service</li> <li>LLDP Service</li> <li>GEO-IP Service</li> <li>Quedra Central Management/Logging Integration</li> </ul>	<ul style="list-style-type: none"> <li>Common Criteria EAL4 +</li> <li>TRtest Product Conformity Certificate</li> <li>MIT (Made in Turkiye)</li> </ul> <b>IPsec VPN</b> <ul style="list-style-type: none"> <li>Encryption: <ul style="list-style-type: none"> <li>&gt; AES / CAMELIA / NULL_ENC / SERPENT</li> <li>&gt; TWOFISH / DES / 3DES</li> </ul> </li> <li>Authentication: <ul style="list-style-type: none"> <li>&gt; MD5, SHA1, SHA256, SHA384, SHA512, AES</li> </ul> </li> <li>Wildcard ID Support</li> <li>NAT Traversal Support</li> <li>PKI - Public Key Infrastructure Support</li> <li>PSK - Pre Shared Key Support</li> </ul> <b>Email Security</b> <ul style="list-style-type: none"> <li>Gateway Antispam ***</li> <li>Anti Virus / Anti Malware ***</li> <li>Email Rate Limiting</li> <li>RBL, MX, SPF, DKIM, DMARC Check</li> <li>Email Quarantine</li> <li>Gray Listing, Phishing Check</li> <li>Category and Rule Based Filtering</li> </ul>



Quedra  
Creates **Technology**  
to  
Make **Life**  
Easier