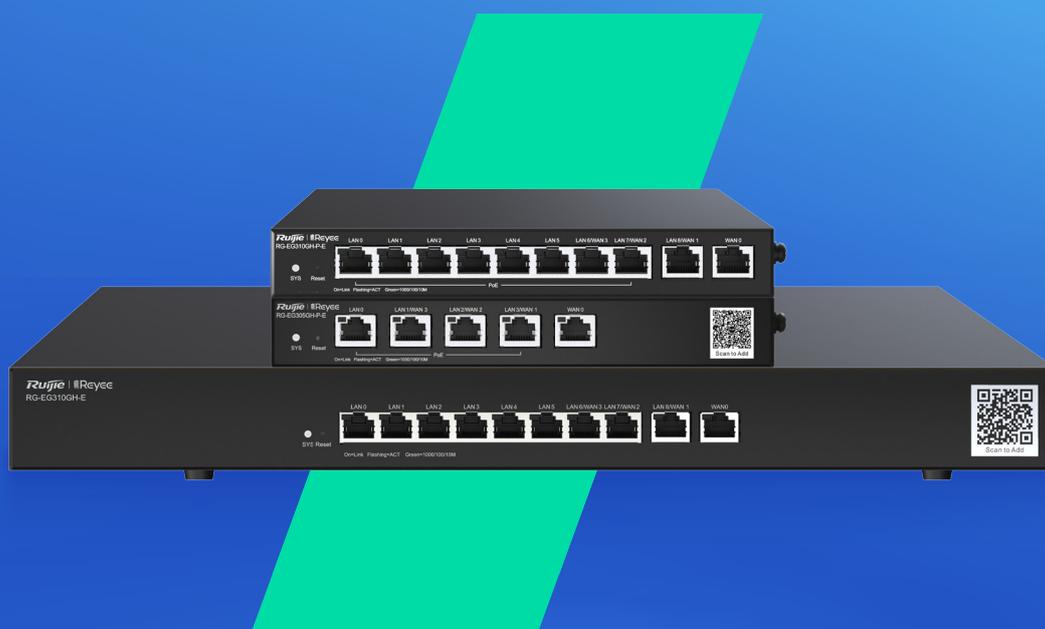# RG-EG300GH-E Series
## Reyee 5/10-Port High Performance Cloud Managed Office Router

DATASHEET



## Highlights

- High-performance router for office network

- Provide powerful VPN for branches and remote workers

- Provide traffic visualization monitoring, everything in a glance

- New efficient way of bandwidth management based on application and user

- Unbreakable multi-WAN, intelligent load balancing

# / Highlight Features

## High-performance VPN Router for Office Network

RG-EG100 Series — 600 Mbps — ↑ **256**%

RG-EG300 Series — 1.5 Gbps

Ruijie | Reyee
RG-EG310GH-P-E

SYS · Reset

LAN0 LAN1 LAN2 LAN3 LAN4 LAN5 LAN6/WAN3 LAN7/WAN2 LAN8/WAN1 WAN0

PoE

On=Link Flashing=ACT Green=1000/100/10M

- **300** Concurrent Clients
- **Max. 4** WAN Ports
- **64** VPN Tunnels
- **Load** Balancing
- **Free Cloud** Management

## Provide Powerful VPN for Branches and Remote Workers

Retail Store

Up to **64** Tunnels
Corporate HQ

Retail Store

Retail Store

Retail Store
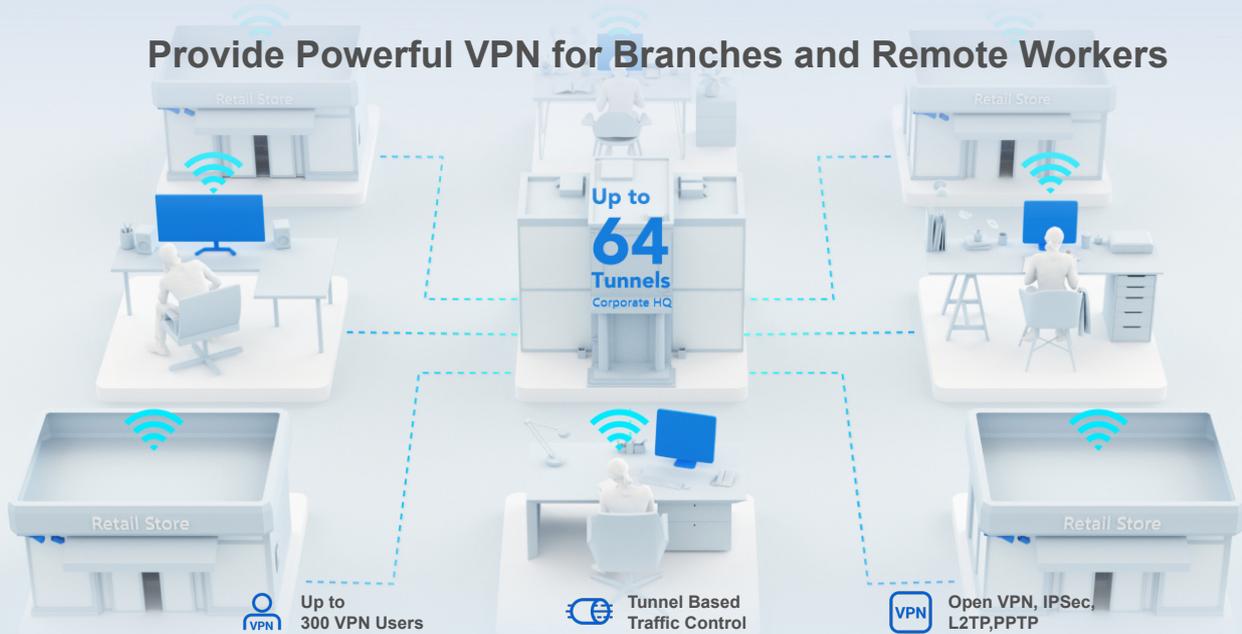
- **Up to 300 VPN Users**
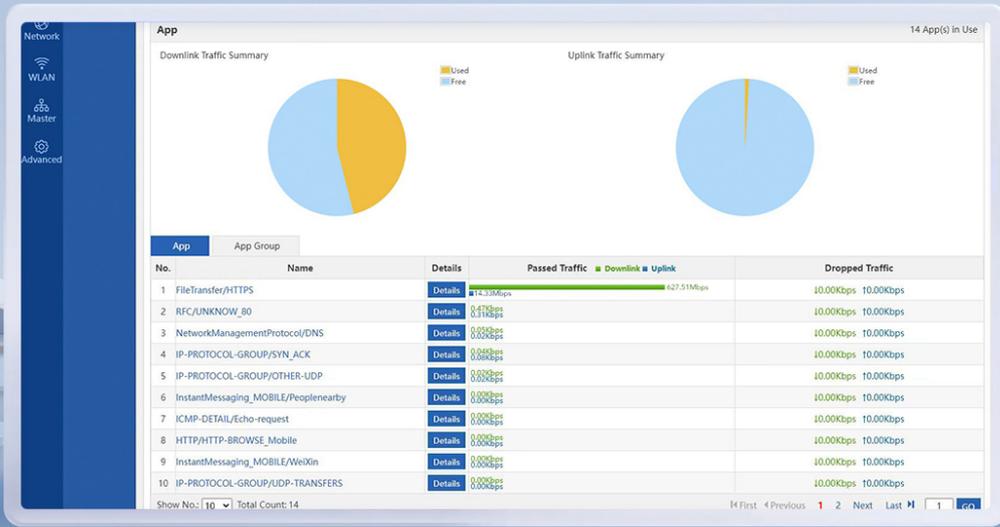- **Tunnel Based Traffic Control**
- **Open VPN, IPSec, L2TP, PPTP**

# / Highlight Features

## Who is Eating Your Internet Speed?

Traffic visualization monitoring for you. No matter traffic user ranking, or traffic application ranking, everything in a glance
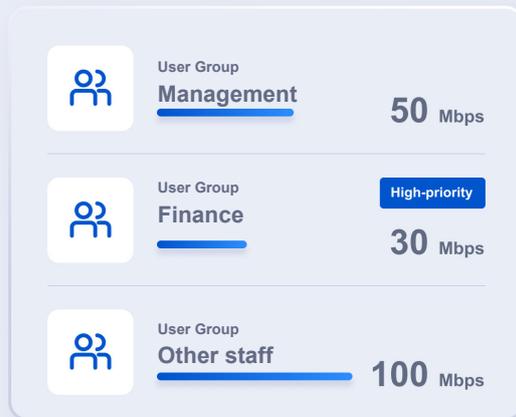


## New Efficient Way of Bandwidth Management

### Application Based Bandwidth Management

| | | |
|---|---|---|
| zoom | Video Conference | **High-priority** **20** Mbps |
| YouTube | HD Video | **5** Mbps |
| Social Media | | **5** Mbps |

### User Based Bandwidth Management

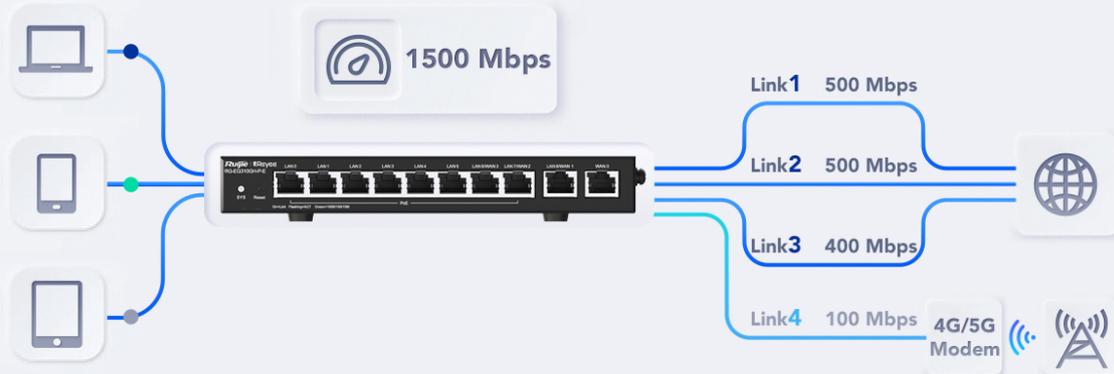| | | |
|---|---|---|
| User Group **Management** | | **50** Mbps |
| User Group **Finance** | **High-priority** | **30** Mbps |
| User Group **Other staff** | | **100** Mbps |

# Highlight Features

## Unbreakable Multi-WAN, Intelligent Load Balancing

Supports load balancing, redundancy link, and source IP based PBR(Policy based routing).
Preventing login failures due to IP address changes for services such as e-banking.



**1500 Mbps**

Link**1**  500 Mbps
Link**2**  500 Mbps
Link**3**  400 Mbps
Link**4**  100 Mbps  4G/5G Modem
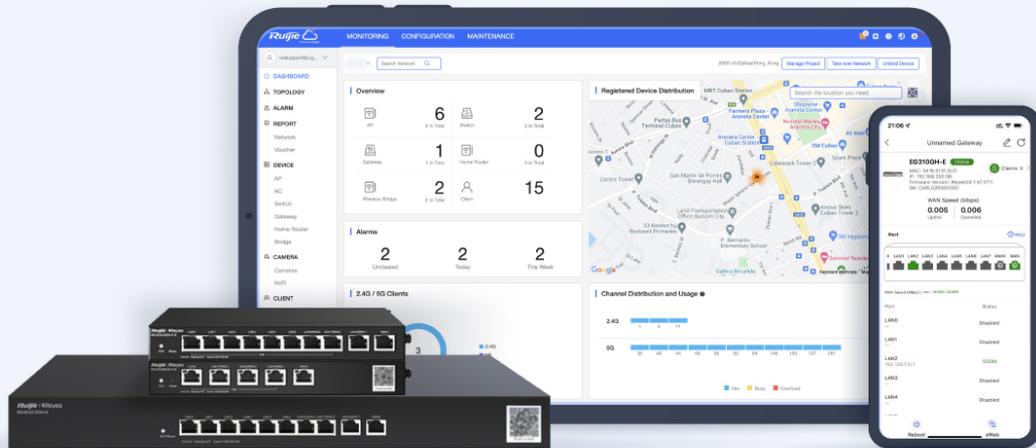
Seamless Failover

Aggregated Bandwidth

Automatic Setup

Customizable Link Weight

## Cloud, Make Your Business Easy

- Reyee free DDNS
- Cloud portal authentication
- Remote monitoring and maintenance
- Upgrade firmware via Cloud
- APP library dynamic update
- Customized APP library via APP

# Specifications

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| **Basic** | | | |
| Number of Fixed WAN Ports | 1 | 1 | 1 |
| Number of Fixed LAN Ports | 1 | 6 | 6 |
| Number of WAN Ports | 4 | 4 | 4 |
| Number of LAN Ports | 4 | 9 | 9 |
| WAN Port Rate | 1x10/100/1000BASE-T Ports | 1x10/100/1000BASE-T Ports | 1x10/100/1000BASE-T Ports |
| LAN Port Rate | 4x10/100/1000BASE-T Ports | 9x10/100/1000BASE-T Ports | 9x10/100/1000BASE-T Ports |
| Number of LAN/WAN Ports | 3 | 3 | 3 |
| Number of 10/100/1000BASE-T Ports | 5 | 10 | 10 |
| Number of 10/100/1000/2500BASE-T Ports | N/A | N/A | N/A |
| Number of 100/1000/2.5G/5G/10GBASE-T Ethernet port | N/A | N/A | N/A |
| Number of 1 Gbps Optical Ports (SFP) | N/A | N/A | N/A |
| Number of 10 Gbps Optical Ports (SFP+) | N/A | N/A | N/A |
| Total Number of RJ45 Ports | 5 | 10 | 10 |
| Total Number of Optical Ports | N/A | N/A | N/A |
| Management Port | N/A | N/A | N/A |
| PoE | Support AT/AF, 4 LAN ports support PoE, MAX 60W | N/A | Support AT/AF, 8 LAN ports support PoE, MAX 110W |
| PoE Standard | IEEE802.3af，IEEE802.3at | N/A | IEEE802.3af，IEEE802.3at |
| Max. PoE Power Budget | 60W | N/A | 110W |
| Max. Number of PoE Ports | 4 | N/A | 8 |
| Max. Power Output per PoE Port | 30W | N/A | 30W |
| Dimensions (W x D x H) | 202mm x 108mm x 28mm | 440mm x 200mm x 43.6mm | 202mm x 108mm x 28mm |
| Net Weight | 1.2Kg | 2.4Kg | 1.50Kg |
| **Hardware Specifications** | | | |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| Flash Memory | 256MB | 256MB | 256MB |
| SDRAM | 512MB | 512MB | 512MB |
| CPU | 1.35GHz*2 | 1.35GHz*2 | 1.35GHz*2 |
| Mounting | Desk-type | 1U rack-type | Desk-type |
| LEDs | System:<br>SYS(Green)<br>Per RJ45 Ports:<br>LINK/ACT(Green) | System:<br>SYS(Green)<br>Per RJ45 Ports:<br>LINK/ACT(Green) | System:<br>SYS(Green)<br>Per RJ45 Ports:<br>LINK/ACT(Green) |
| Reset Buttons | Yes | Yes | Yes |
| DC Power Connector Size | Outer Diameter: 6.0 mm<br>Inner Diameter: 2.0 mm<br>Length: 10 mm | N/A | Outer Diameter: 6.0 mm<br>Inner Diameter: 2.0 mm<br>Length: 10 mm |
| Cooling | Natural cooling | Natural cooling | Natural cooling |
| Number of Fans | Fanless | Fanless | Fanless |
| Airflow | N/A | N/A | N/A |
| Fan Status Monitoring | N/A | N/A | N/A |
| Operating Temperature | 0~40℃ | 0~40℃ | 0~40℃ |
| Storage Temperature | -40~70℃ | -40~70℃ | -40~70℃ |
| Operating Humidity | 10%~90%(non-condensing) | 10%~90%(non-condensing) | 10%~90%(non-condensing) |
| Storage Humidity | 5%~95%(non-condensing) | 5%~95%(non-condensing) | 5%~95%(non-condensing) |
| IP Rating | N/A | N/A | N/A |
| Power Supply Surge Protection | Common Mode：±6KV<br>Differential mode： ±6KV | Common Mode：±6KV<br>Differential mode： ±6KV | Common Mode：±4KV<br>Differential mode： ±4KV |
| Port Surge Protection | Common Mode：±4KV | Common Mode：±4KV | Common Mode：±4KV |
| Recommended Concurrent Clients | 350 | 350 | 350 |
| Hard Disk Drive | N/A | N/A | N/A |
| USB | N/A | N/A | N/A |
| Max. Power Consumption | ＜80W | ＜25W | ＜130W |
| PoE | Support AT/AF, 4 LAN ports support PoE, MAX 60W | N/A | Support AT/AF, 8 LAN ports support PoE, MAX 110W |
| Max. PoE Power Budget | 60W | N/A | 110W |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| Max. Number of PoE Ports | 4 | N/A | 8 |
| Max. Power Output per PoE Port | 30W | N/A | 30W |
| PoE Power Pins | 1 2+,3 6- | N/A | 1 2+,3 6- |
| Power Supply | AC input<br>Rated voltage range: 100V to 240V<br>Maximum voltage range: 90V to 264V<br>Frequency: 50/60 Hz<br>Rated current: 1.5A<br><br>Adapter output<br>Rated voltage range: 54V DC<br>Rated current range: 1.48A | Rated voltage range: 100-240VAC<br>Maximum voltage range: 90-264VAC<br>Frequency: 50/60Hz<br>Rated current: 0.6A | AC input<br>Rated voltage range: 100V to 240V<br>Maximum voltage range: 90V to 264V<br>Frequency: 50/60 Hz<br>Rated current: 2.5A<br><br>Adapter output<br>Rated voltage range: 54V DC<br>Rated current range: 2.4A |
| Internet Connection Type | PPPoE<br>DHCP<br>Static IP | PPPoE<br>DHCP<br>Static IP | PPPoE<br>DHCP<br>Static IP |
| Access Mode Auto Detection | Yes | Yes | Yes |
| **Software Specifications** | | | |
| PPPoE Username and Password Learning | Yes | Yes | Yes |
| Throughput | 1500Mbps | 1500Mbps | 1500Mbps |
| PPPoE Client | Yes | Yes | Yes |
| PPPoE Server | Yes | Yes | Yes |
| Max. Number of PPPoE Accounts | 300 | 300 | 300 |
| PPPoE Concurrent Connection Limit | 128 | 128 | 128 |
| IP Address Routing based by ISP | No | No | No |
| WAN IP Conflict Avoidance | Yes | Yes | Yes |
| MAC Address Cloning | Yes | Yes | Yes |
| VLAN | Yes | Yes | Yes |
| Max. Number of VLANs | 64 | 64 | 64 |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| Port-based VLAN | Yes | Yes | Yes |
| Super VLAN | No | No | No |
| VLAN Priority | Yes | Yes | Yes |
| Bandwidth Aggregation | Yes | Yes | Yes |
| default with Multi VLAN | No | No | No |
| In-Room Screen Sharing | No | No | No |
| Port Mapping | Yes | Yes | Yes |
| Number of Port Mapping Rule | 512 | 512 | 512 |
| NAT Loopback | Yes | Yes | Yes |
| Link Aggregation | No | No | No |
| LAN Link Aggregation | No | No | No |
| AC Mode | Yes | Yes | Yes |
| Behavior Management | Yes | Yes | Yes |
| Cloud Print | Yes | Yes | Yes |
| Application Identification | Yes | Yes | Yes |
| Application Priority | Yes | Yes | Yes |
| Application Cache | No | No | No |
| Application Control ( Yes Time/IP-based Policy) | Yes | Yes | Yes |
| Traffic Audit | Yes | Yes | Yes |
| Anti Network Sharing(Modify TTL) | Yes | Yes | Yes |
| Network-wide Client Management | Yes | Yes | Yes |
| Network Supervision | No | No | No |
| Log Retention | No | No | No |
| Log Audit | Yes | Yes | Yes |
| Log Upload | Yes | Yes | Yes |
| Log Server | Yes | Yes | Yes |
| Maintenance and Fault Diagnosis | Yes | Yes | Yes |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| Web Authentication | No | No | No |
| SMS Authentication | Yes | Yes | Yes |
| Password-based Authentication | Yes | Yes | Yes |
| Portal Authentication | Yes | Yes | Yes |
| 802.1X | Yes | Yes | Yes |
| One-Click Authentication | Yes | Yes | Yes |
| Local Portal Authentication | Yes | Yes | Yes |
| Voucher Authentication on Ruijie Cloud | Yes | Yes | Yes |
| Local Mode of Authentication on Ruijie Cloud | Yes | Yes | Yes |
| Custom Portal | Yes | Yes | Yes |
| RADIUS Client | Yes | Yes | Yes |
| RADIUS Proxy | Yes | Yes | Yes |
| Support Authentication Via Radius | Yes | Yes | Yes |
| Support duration/traffic Accounting Via Radius | Yes | Yes | Yes |
| Support Flowctrl Authorization Via Radius | Yes | Yes | Yes |
| Support User Group Authorization Via Radius | Yes | Yes | Yes |
| Support duration/traffic quota Via Radius | Yes | Yes | Yes |
| Support PAP Authentication | Yes | Yes | Yes |
| Support CHAP/MS-CHAPV1/MS-CHAPV2 Authentication | Yes | Yes | Yes |
| Support MAC Authentication for Radius | Yes | Yes | Yes |
| Third-Party API Integration | Yes | Yes | Yes |
| IPTV | Yes | Yes | Yes |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| L2TP VPN | Yes | Yes | Yes |
| PPTP VPN | Yes | Yes | Yes |
| IPsec VPN | Yes | Yes | Yes |
| OpenVPN | Yes | Yes | Yes |
| Number of Universal VPN Accounts for L2TP, PPTP, and OpenVPN | 300 | 300 | 300 |
| IPSec VPN Performance (bi-direction, Typical Packets) IPV4 | 230Mbps | 230Mbps | 230Mbps |
| L2TP VPN Performance (bi-direction, Typical Packets) | 640Mbps | 640Mbps | 640Mbps |
| PPTP VPN Performance (bi-direction, Typical Packets) | 640Mbps | 640Mbps | 640Mbps |
| OPENVPN Performance (bi-direction, Typical Packets) | 100Mbps | 100Mbps | 100Mbps |
| Number of IPsec VPN Tunnels | 64 | 64 | 64 |
| Number of OpenVPN Tunnels | 64 | 64 | 64 |
| Number of L2TP VPN Tunnels | 64 | 64 | 64 |
| Number of PPTP VPN Tunnels | 64 | 64 | 64 |
| VPN HQ/Branch Interconnection | Yes | Yes | Yes |
| EasyVPN 1.0 | No | No | No |
| Number of EasyVPN Tunnels | N/A | N/A | N/A |
| SSL VPN | N/A | N/A | N/A |
| Number of SSL VPN Tunnels | N/A | N/A | N/A |
| RIPng | Yes | Yes | Yes |
| RIP | Yes | Yes | Yes |
| OSPFv2 | Yes | Yes | Yes |
| OSPFv3 | Yes | Yes | Yes |
| WAN Failover | Yes | Yes | Yes |
| Static Routing | Yes | Yes | Yes |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| Equal Cost Multi-Path Routing | N/A | N/A | N/A |
| Policy-Based Routing (PBR) | Yes | Yes | Yes |
| Interface Active/Standby Switchover | Yes | Yes | Yes |
| WAN Load Balancing | Yes | Yes | Yes |
| IP-based Load Balancing | Yes | Yes | Yes |
| Session-based Load Balancing | Yes | Yes | Yes |
| Real-Time Load-based Load Balancing | Yes | Yes | Yes |
| DHCP Server | Yes | Yes | Yes |
| DHCP Client | Yes | Yes | Yes |
| DHCP Snooping | N/A | N/A | N/A |
| DHCP Relay | N/A | N/A | N/A |
| DNS Client | Yes | Yes | Yes |
| DNS Server | Yes | Yes | Yes |
| DNS Proxy | Yes | Yes | Yes |
| NTP Client | Yes | Yes | Yes |
| Oray DDNS | N/A | N/A | N/A |
| DynDNS | Yes | Yes | Yes |
| No-IP DDNS | Yes | Yes | Yes |
| Ruijie DDNS | Yes | Yes | Yes |
| 3322 DDNS | Yes | Yes | Yes |
| Aliyun DDNS | Yes | Yes | Yes |
| Cloudflare | Yes | Yes | Yes |
| NAT | Yes | Yes | Yes |
| NAPT | Yes | Yes | Yes |
| UPnP | Yes | Yes | Yes |
| SNMP | Yes | Yes | Yes |
| ACL | Yes | Yes | Yes |
| Time-based ACL | Yes | Yes | Yes |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| IPv6 ACL | Yes | Yes | Yes |
| Block LAN/WAN Ping | Yes | Yes | Yes |
| IP-MAC Binding | Yes | Yes | Yes |
| MAC Address Filtering | Yes | Yes | Yes |
| Session Limit | Yes | Yes | Yes |
| Fraggle Attack Defense | Yes | Yes | Yes |
| Teardrop Attack Defense | Yes | Yes | Yes |
| Malformed Packet Attack Defense | Yes | Yes | Yes |
| Land Attack Defense | Yes | Yes | Yes |
| Smurf Attack Defense | Yes | Yes | Yes |
| SYN Flood Attack Defense | Yes | Yes | Yes |
| Security Zone | Yes | Yes | Yes |
| Security Logs | Yes | Yes | Yes |
| Upgrade via App | Yes | Yes | Yes |
| Reboot via App | Yes | Yes | Yes |
| Scheduled Reboot | Yes | Yes | Yes |
| HTTPS Login | Yes | Yes | Yes |
| Upgrade via eWeb | Yes | Yes | Yes |
| Upgrade via Ruijie Cloud | Yes | Yes | Yes |
| Configuration Backup | Yes | Yes | Yes |
| Factory Reset | Yes | Yes | Yes |
| Language | Yes | Yes | Yes |
| Self-Organizing Network (SON) | Yes | Yes | Yes |
| Device Management | Yes | Yes | Yes |
| No. of Devices Managed in Router Mode | 150 | 150 | 150 |
| No. of Devices Managed in AC Mode | 500 | 500 | 500 |
| Wireless Intelligent | Yes | Yes | Yes |

| Model | RG-EG305GH-P-E | RG-EG310GH-E | RG-EG310GH-P-E |
|---|---|---|---|
| Optimization (WIO) | | | |
| Flow Control | Yes | Yes | Yes |
| NAT ALG | Yes | Yes | Yes |
| anyIP | N/A | N/A | N/A |
| Remote Check on App | Yes | Yes | Yes |
| ARP Table Size | 1024 | 1024 | 1024 |
| ARP Binding | Yes | Yes | Yes |
| Ping | Yes | Yes | Yes |
| Blocklist and Allowlist | Yes | Yes | Yes |
| WAN/LAN Conversion | Yes | Yes | Yes |
| Link Detection | Yes | Yes | Yes |
| Multi WAN with same subnet | Yes | Yes | Yes |
| Max. Number of Concurrent Connections | 100000 | 100000 | 100000 |
| SIP ALG | Yes | Yes | Yes |
| SD-WAN | Yes | Yes | Yes |
| Number of SD-WAN Tunnels | 192 | 192 | 192 |
| Number of branches supported by SD-WAN | 64 | 64 | 64 |
| SD-WAN performance | 300Mbps | 300Mbps | 300Mbps |
| IPv6 | Yes | Yes | Yes |
| App Management | Yes | Yes | Yes |
| Web Management | Yes | Yes | Yes |
| Ruijie Cloud Management | Yes | Yes | Yes |
| Stateful Firewall | Yes | Yes | Yes |
| Website filtering | Yes | Yes | Yes |
| Website Auditing | Yes | Yes | Yes |
| Package Contents | | | |
| Power Adapter | Yes | N/A | Yes |
| Mounting Brackets | Wall-mount and Desk-type | Rack installation | Wall-mount and Desk-type |

# Ruijie | Reyee

## Redefine your easy network

Ruijie Networks Co., Ltd.
Website: https://reyee.ruijie.com/en-global