6 Port Multi-Gigabit Cloud-Managed Gateway Router, Up to 5 WAN Load Balanced (5x RJ45 2.5GbE, 1x 10GE SFP+)

RG-EG406XS

The RG-EG406XS is a high-performance cloud-managed router designed for growing commercial and enterprise networks. It features five 2.5 Gigabit Ethernet ports, one 10 Gigabit SFP+ port and up to 2.5 Gbps throughput, supporting 400 recommended concurrent clients. Multi-WAN load balancing, advanced bandwidth management, SD-WAN and comprehensive VPN support deliver fast and dependable connectivity, while lifetime-free Ruijie Cloud management simplifies remote administration.

3-Year Manufacturer's Warranty

For full terms & conditions, please see – Ruijie Warranty T&Cs.

Features and Benefits

- Five 2.5 Gigabit Ethernet ports and one 10 Gigabit SFP+ port deliver high-speed copper and fibre connectivity for demanding networks.
- Up to 2.5 Gbps throughput and support for 400 recommended concurrent clients provide reliable performance for busy commercial environments.
- Up to five configurable WAN ports support intelligent load balancing and automatic failover, improving bandwidth use and internet reliability.
- Application recognition, QoS, traffic auditing and website filtering help prioritise essential services and manage network usage.
- SD-WAN and comprehensive IPsec, L2TP, OpenVPN, PPTP and WireGuard support enable secure, scalable connectivity between remote sites.
- Lifetime-free Ruijie Cloud management enables remote configuration, monitoring, fault diagnosis and maintenance through the Ruijie Reyee App.

Specifications

Hardware Specifications

Port Specifications

Total number of optical ports	1
Total number of RJ45 ports	5
Number of 10/100/1000/2500BASE-T ports	5
Number of 10GE SFP+ ports	1
Maximum number of LAN ports	5
Maximum number of WAN ports	5
Number of fixed LAN ports	1
Number of fixed WAN ports	1
Number of LAN/WAN ports	4
LEDs	1 x system status LED 6 x Ethernet port LEDs
Reset button	1

System Specifications

CPU	Quad-core processor, 2.0 GHz clock frequency per core
Flash memory	256 MB
RAM	1 GB

Power Supply and Consumption

Power supply	DC power adapter

Power Supply and Consumption (continued)

Dimensions of the DC connector	Outer diameter: 5.5 mm (0.22 in.) Inner diameter: 2.1 mm (0.08 in.) Depth: 10.0 mm (0.39 in.)
Maximum power consumption	9 W

Dimensions and Weight

Package dimensions (W x D x H)	278 mm x 229 mm x 77 mm (10.94 in. x 9.02 in. x 3.03 in.)
Product dimensions (W x D x H)	202 mm x 108 mm x 28 mm (7.95 in. x 4.25 in. x 1.1 in.)
Shipping weight	1.28 kg (2.82 lbs)
Weight	0.61 kg (1.34 lbs)

Environment and Reliability

Cooling	Natural cooling
Fan	Fanless design
Mounting options	Desk/Rack Note: The device occupies 1 U of the rack space.
Operating humidity	10% RH to 90% RH (non-condensing)
Operating temperature	0°C to 40°C (32°F to 104°F)
Storage humidity	5% RH to 95% RH (non-condensing)
Storage temperature	–40°C to +70°C (–40°F to +158°F)
Surge protection	Service port: ±4 kV for common mode Power connector: ±4 kV for common mode and ±2 kV for differential mode

Software Specifications

System Performance Capacity

Maximum number of concurrent sessions	120000
Recommended number of concurrent clients	400
Throughput	2500 Mbps

Basic Configurations

AC mode	Yes

Basic Configurations (continued)

Automatically identifying the Internet access mode and obtaining IP addresses	Yes
Automatically learning the PPPoE username and password of other routers	Yes
Configuration backup	Yes
Internet access mode	Static IP address Static IPv6 address Dynamic IP address Dynamic IPv6 address PPPoE
Local upgrade	Yes
Log upload	Yes
Online upgrade	Yes
Restoring factory defaults	Yes
System language	English, Chinese, Turkish, Arabic, Vietnamese, Thai, Indonesian, Latin American Spanish, Brazilian Portuguese, Russian, French, German, European Spanish, Italian, and Polish

Authentication

Portal authentication	Yes
One-click authentication	Yes
Password authentication	Yes
SMS-based authentication	Yes
Voucher authentication supported by Ruijie Cloud portal page	Yes
Cloud portal authentication	Yes
Local portal authentication	Yes

Authentication (continued)

QR code authentication	Yes
Custom portal page	Yes
Account-based authentication supported by Ruijie Cloud portal page	Yes
CHAP, MS-CHAPv1, MS-CHAPv2	Yes
Delivery through Ruijie Cloud portal page	Yes
802.1X authentication	Yes
MAC address-based authentication	Yes
PPPoE server	Yes
Number of accounts supported by the PPPoE server	400
Number of concurrent clients supported by the PPPoE server	200
RADIUS flow control authorization	Yes
PAP	Yes
RADIUS authentication	Yes
RADIUS client	Yes
RADIUS accounting based on time or traffic	Yes
RADIUS flow control authorization	Yes
RADIUS proxy server	Yes
RADIUS traffic quota authorization	Yes
RADIUS user group authorization	Yes
Third-party authentication	Yes

Ethernet Interface

Avoiding IP address conflicts on WAN interfaces	Yes
Multiple IP addresses on a WAN port	Yes
Load balancing	Yes
MAC address cloning	Yes
Multiple WAN interfaces on the same network segment	Yes
PPPoE clients	Yes
Scheduled PPPoE reconnection	No

Ethernet Switching

Configuring multiple VLANs upon configuration delivery	No
Link aggregation	No
LLDP	No
VLAN	Yes
Maximum number of VLANs	128
VLAN configuration supported on LAN ports	Yes
Super-VLAN	No
Configuring the same VLAN tag for multiple WAN ports	No
VLAN priority	Yes
Number of MAC address entries to be filtered	512

Gateway Features

WAN failover	Yes
Application priority	Yes
Application recognition	Yes
Behavior management	Yes
QoS	Yes

Gateway Features (continued)

Time-based blocking policy IP address-based blocking policy	Yes
Website filtering: custom URL	Yes
Traffic audit	Yes
URL audit log	Yes
Audit log server	Yes
Audit log storage	No
Uploading audit logs to a server	Yes

IP Routing

Application-based routing	Yes
Bandwidth aggregation	Yes
BGP	Yes
BGP4	Yes
BGP4+	Yes
ECMP	No
IPv4 static route	Yes
IPv6 PBR	Yes
Route selection based on national address database	Yes
IPv6 static route	Yes
IS-ISv4	No
IS-ISv6	No
Load balancing based on flows	Yes
Load balancing based on source IP addresses	Yes
Load balancing based on the interface weight	Yes
Route selection by link quality	Yes
OSPFv2	Yes
OSPFv3	Yes
RIP	Yes
RIPng	Yes

IP Service

3322.org	Yes

IP Service (continued)

ALG	Yes
ARP binding	Yes
Maximum number of ARP entries	1024
Proxy ARP	No
Cloudflare	Yes
DHCP client	Yes
DHCP server	Yes
DHCP relay	No
Option 43	Yes
Option 138	Yes
Static/Dynamic NAT	Yes
NAT-PT	No
NAT loopback	Yes
DNS client	Yes
DNS proxy	Yes
DNS server	Yes
No-IP DNS	Yes
GRE tunnel	No
IPTV	Yes
IPv4 ping	Yes
IPv6	Yes
IPv6 ping	Yes
Number of port mapping entries	512
Port mapping	Yes
DDNS	Yes
Ruijie DDNS	Yes
Alibaba Cloud DDNS	Yes
UPnP	Yes

MPLS

MPLS L2VPN	No

Network Management and Monitoring

Web management	Yes
Ruijie Cloud management	Yes
Management on Ruijie Reyee App	Yes
Remotely monitoring devices through Ruijie Reyee App	Yes

Network Management and Monitoring (continued)

Restarting devices through Ruijie Reyee App	Yes
Upgrading device software version through Ruijie Reyee App	Yes
Fault diagnosis	Yes
FTP client (IPv4 address)	No
FTP server (IPv4 address)	No
TFTP client (IPv4 address)	Yes
TFTP server (IPv4 address)	No
HTTPS login	Yes
NTP client	Yes
NTP server	No
Scheduled device restart	Yes
SNMPv1, v2c, and v3	Yes
SON	Yes
SSH	No
Telnet	No
Web login information	Default IP Address: 192.168.110.1 Default Password: admin
Maximum number of managed devices (router mode)	AP and NBS series: 200 ES series: 128 Note: The maximum number of managed devices varies with each device series.
Maximum number of managed devices (AC mode)	AP and NBS series: 750 ES series: 128 Note: The maximum number of managed devices varies with each device series.

Reliability

Stacking	No
VRRP	No

SD-WAN

SD-WAN	Yes
SD-WAN performance	750 Mbps

SD-WAN (continued)

Number of tunnels supported by SD-WAN	300
Maximum number of SD-WAN branches	100
Active/Standby mode (automatically switching to the standby interface when the active interface fails)	Yes
Bypass networking for a device in AP mode	No
Centralized traffic forwarding policy	Yes
Multi-WAN link bundling efficiency (lab data)	≥ 80%

Security

ACL	Yes
IPv6 ACL	Yes
DHCP snooping	No
Malformed packet attack defense	Yes
Fragmentation attack defense	Yes
Teardrop attack defense	Yes
LAND attack defense	Yes
SYN flood attack defense	Yes
Smurf attack defense	Yes
IP attack defense	Yes
Disabling ping	Yes
Stateful ACL	Yes
IP-MAC binding	Yes
Network sharing prevention	Yes
Security log	Yes
Security zone	Yes

Security (continued)

User group-based connection limiting	Yes

VPN

IPsec VPN	Yes
IPsec VPN bandwidth	700 Mbps
Maximum number of branches in IPsec VPN networking	100
L2TP VPN	Yes
L2TP VPN bandwidth	850 Mbps
Maximum number of branches in L2TP VPN networking	100
OpenVPN	Yes
OpenVPN bandwidth	200 Mbps
Maximum number of branches in OpenVPN networking	100
PPTP VPN	Yes
PPTP VPN bandwidth	850 Mbps
Maximum number of branches in PPTP VPN networking	100
SSL VPN	No
Easy VPN 1.0	No
Number of VPN accounts for L2TP, PPTP, and OpenVPN	400
WireGuard server	Yes
WireGuard client	Yes
WireGuard performance	750 Mbps
Number of concurrent tunnels supported by the WireGuard server	100

WLAN

Maximum number of APs (AC mode)	750

WLAN (continued)

Maximum number of devices that can be managed	128
Wireless Intelligent Optimization (WIO)	Yes

Package Contents

Accessories

Rack-mount bracket	2
Power adapter	1
Rubber pad	4
Screw	6 x M3 x 6 mm cross recessed countersunk head screws

Manual

User Manual	1
Warranty Card	1