

# RG-NBS7006

## Layer 3 Chassis Cloud Managed Switch

DATASHEET

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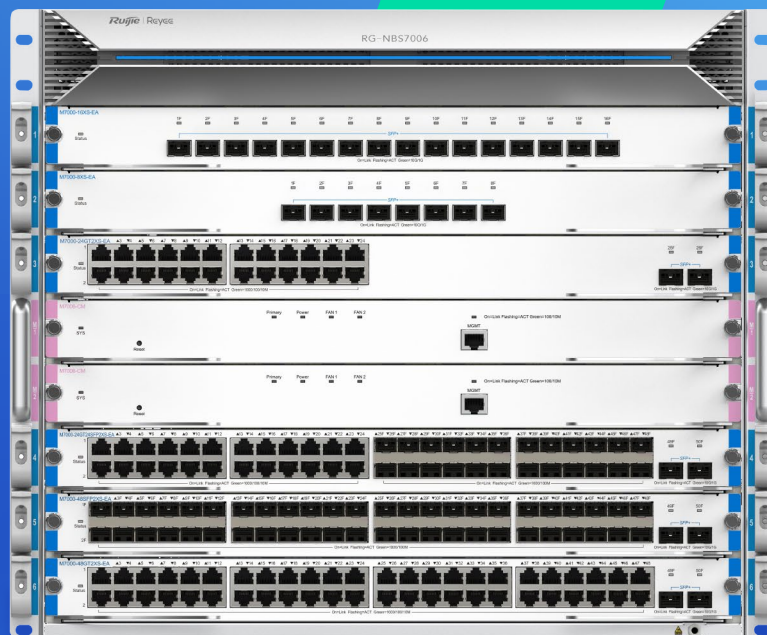
### Highlights

- Modular design provides scalability and flexibility
- High-level redundancy, ensuring nonstop service
- Whole network solution specially designed for SMB Scenarios
- Lifetime management on Ruijie Cloud at anytime anywhere

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# Highlight Features

## RG-NBS7006 Reyee First Chassis Switch Designed for SMB

6 x 1RU Slot  
2 x Supervisor Engine Module

7 Optional Line Cards    32,000 MAC Address    8,000 ARP Table    1.92 Tbps Switching Capacity    1440 Mpps Packet Forwarding Rate

### Modular Design: Scalability, and Flexibility

Support 7 types of line cards, up to 96 ports full 10 Gigabit



### High-Level Redundancy, Ensuring Nonstop Service

Redundant Modules    Virtual Cluster Switching (VCS)

4 power slots & 2 fans: ensuring service continuity



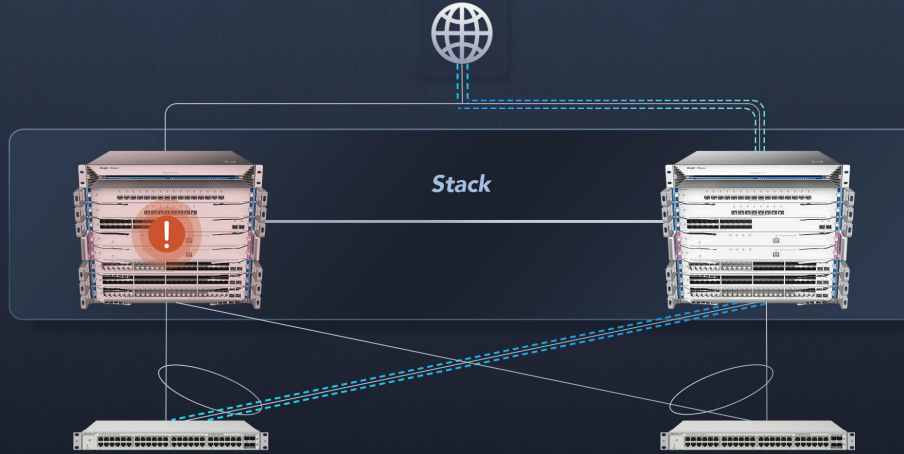


# Highlight Features

## High-Level Redundancy, Ensuring Nonstop Service

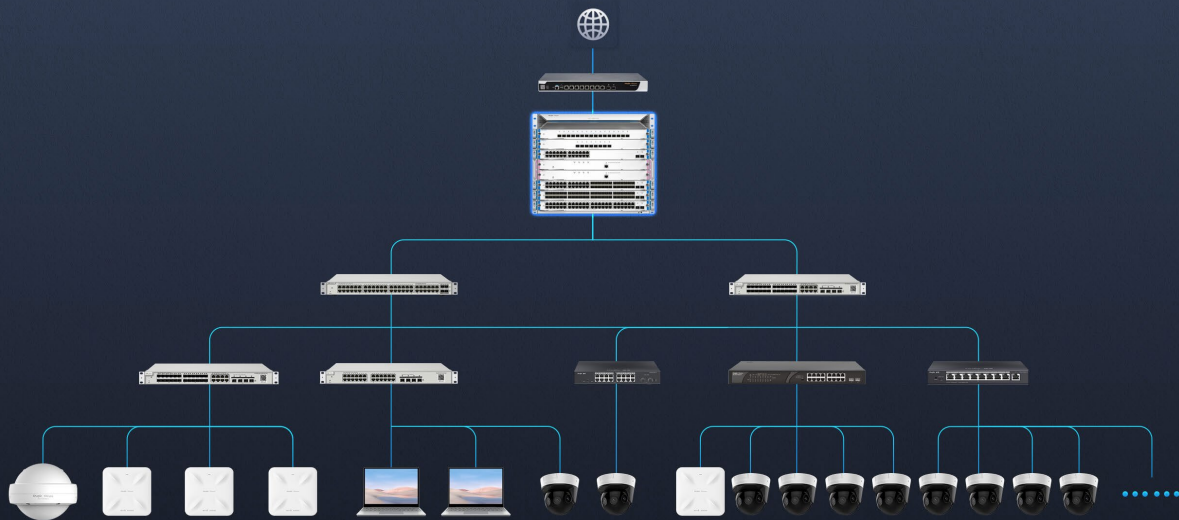
Redundant Modules      Virtual Cluster Switching (VCS)

Virtual Cluster Switching (VCS): service failover within seconds



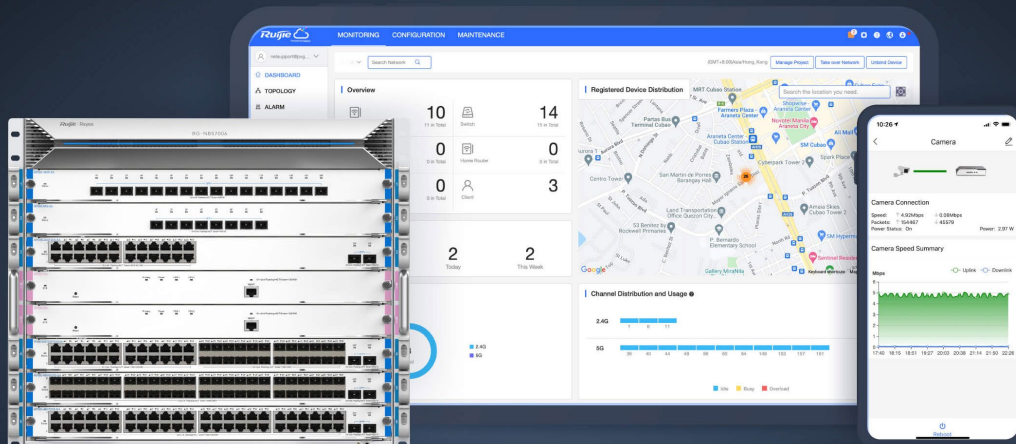
## Whole Network Solution Specially Designed for SMB Scenarios

Up to 4000 terminal devices or 2000 CCTV (2mp H.265) can be accessed



## Cloud, Make Your Business Easy

- SON, zero touch provisioning to Cloud
- Monitor switch statistics at anytime anywhere
- Configure VLANs on Ruijie Cloud APP
- Easy maintenance, save onsite time and cost



## Specifications

Specifications	RG-NBS7006
<b>Basic</b>	
Chassis	Yes
Number of Line Card Slots	6
Layer	L3
Switching Capacity	1.92 Tbps
Forwarding Rate	1440 Mpps
Buffer Size	16 Mbits
ARP Table Size	8000
Flash Memory	Supervisor engine/line card: 256 MB
SDRAM	Supervisor engine/line card: DDRIII 1 GB
MAC Address Table Size	32000
Max. Number of VLANs	4094
Dimensions (W x D x H)	Chassis without cable management bracket: 442 mm x 410 mm x 396 mm, 9 RU EA card: 438.5 mm x 196 mm x 40.2 mm CM card: 438.5 mm x 196 mm x 40.2 mm
Net Weight	25 kg
Mean Time Between Failure (MTBF)	400000H
Safety Compliance	IEC 62368-1
Warranty	5
<b>Layer2 features</b>	
Jumbo Frame Length (MTU)	9216 Bytes(Per-port MTU)
Flow Control	Yes

Specifications	RG-NBS7006
Port Isolation / Protected Port	Yes
STP (IEEE 802.1D)	Yes
RSTP (IEEE 802.1w)	Yes
MSTP (IEEE 802.1s)	No
PortFast	Yes
BPDU Guard	Yes
Auto Errdisable Recovery	Yes
Link Aggregation	Yes
Max. Number of LAGs	16
Max. Members per LAG	8
Unknown Unicast Storm Control	Yes
Broadcast Storm Control	Yes
Multicast Storm Control	Yes
SPAN	Yes
RSPAN	No
ERSPAN	No
VLAN Range	1-4094
Port-based VLAN	Yes
MAC-based VLAN	No
IP-based VLAN	No
Voice VLAN	Yes
RLDP	Yes
LLDP	Yes
LLDP-MED	Yes
LLDP-PoE	No

Specifications	RG-NBS7006
Cable Test	Yes
IGMP Snooping v1	Yes
IGMP Snooping v2	Yes
IGMP Snooping v3(Basic)	Yes
Max. Number of SVIs	500
IPv4 Ping	Yes
IPv6 Ping	Yes
Traceroute	Yes
IP Standard ACL	Yes
MAC Extended ACL	Yes
IP Extended ACL	Yes
Port-Level Rate Limiting (Ingress/Egress)	Yes
DNS Client	Yes
SNMP v1	Yes
SNMP v2c	Yes
SNMP v3	Yes
Web Management	Yes
HTTP	Yes
HTTPS	Yes
Ruijie Cloud Management	Yes
Ruijie Reyee App Management	Yes
IP-based Self-Organizing Network (SON)	Yes
Camera Detection	Yes
Loop Prevention	Yes
Loop Notification	Yes

Specifications	RG-NBS7006
IP Source Guard	Yes
Anti-ARP Spoofing	Yes
DHCP Snooping	Yes
DHCP Client	Yes
AAA(Authentication,Authorization,Accounting)	No
IEEE 802.1X Authentication	Yes
Digital Diagnostic Monitoring (DDM)	Yes
Number of ACEs	In-1900 Out-0
Number of VCS Members	2
DHCP Relay	Yes
RADIUS	Yes
CPU Protection Policy (CPP)	Yes
MQTT	Yes
QoS	Yes
SON Priority	4769
Web Authentication	Yes
<b>Layer 3 features</b>	
Static Routing	Yes
DHCP Server	Yes
RIP	Yes
RIPng(RIP Next Generation)	Yes
OSPFv2(Open Shortest Path First Version 2)	Yes
OSPFv3	Yes
Virtual Cluster Switching (VCS)	Yes



Specifications	RG-NBS7006
<b>Hardware Specifications</b>	
<b>Reset Button</b>	Yes
<b>Cable Hot-Swappable</b>	Yes
<b>Number of Power Supply Slots</b>	4
<b>Power Consumption</b>	Chassis: RG-NBS7006: < 100 W Line Card: M7000-48GT2XS-EA < 60 W M7000-24GT24SFP2XS-EA < 80 W M7000-48SFP2XS-EA < 90 W M7000-8XS-EA < 40 W M7000-24GT2XS-EA < 50 W M7000-24SFP2XS-EA < 70 W M7000-16XS-EA < 82 W Supervisor Engine: M7006-CM < 30 W
<b>EEE</b>	Yes
<b>Port Surge Protection</b>	Common mode: 6 KV
<b>Power Supply Surge Protection</b>	Common Mode 6KV Differential mode 6KV
<b>Fan Module Hot-Swappable</b>	Yes
<b>Number of Fans</b>	2
<b>Airflow</b>	front to rear and left to rear and right to rear airflow
<b>Fan Speed Control</b>	Adjust according to ambient temperature
<b>Acoustic Noise Level</b>	55 dB at 35°C 78 dB at 50°C
<b>Operating Temperature</b>	0 to 50°C
<b>Storage Temperature</b>	-40°C to +70°C
<b>Operating Humidity</b>	10% to 90% RH(non-condensing)
<b>Storage Humidity</b>	5% to 95% RH(non-condensing)

Specifications	RG-NBS7006
Electrostatic Discharge (ESD) Protection	ESD: 6 KV contact/8 KV air
Casing	Metal
Mounting	Rack installation
LEDs	System: SYS(Green) Per RJ45 Ports: LINK/ACT(Green) Per SFP Interface: LINK/ACT(Green)
Operating Altitude (m)	-500~5000M
Certification	CE
EMC	EN 55032:2015+AC:2016 EN 61000-3-2:2014 EN 61000-3-3:2013 EN 55035:2017 ETSI EN 300 386 V2.1.1 (2016-07)

## Power Supply and Fan

<b>RG-PA600I-FS</b>	RG-NBS7006 Power Module (support redundancy, AC, 600W)
<b>M7006-FAN</b>	NBS7006-FAN

## Line Card & Service Module

<b>M7000-24GT2XS-EA</b>	24 Gigabit Ethernet copper port (RJ45) + 2 10-gigabit Ethernet fiber port (SFP+,LC)
<b>M7000-48GT2XS-EA</b>	48 Gigabit Ethernet copper port (RJ45) + 2-port 10-gigabit Ethernet fiber port (SFP+,LC)
<b>M7000-24SFP2XS-EA</b>	24 Gigabit fiber port (SFP,LC) + 2 10-Gigabit Ethernet fiber port (SFP+,LC)
<b>M7000-48SFP2XS-EA</b>	48 Gigabit fiber port (SFP,LC) + 2 10-Gigabit Ethernet fiber port (SFP+,LC)
<b>M7000-24GT24SFP2XS-EA</b>	24 Gigabit Ethernet copper port (RJ45)+ 24 Gigabit fiber port (SFP,LC)+ 2 10-gigabit Ethernet fiber port (SFP+,LC)
<b>M7000-8XS-EA</b>	8 10-Gigabit Ethernet fiber port (SFP+,LC)
<b>M7000-16XS-EA</b>	16 10-gigabit Ethernet fiber port (SFP+,LC)
<b>M7006-CM</b>	Supervisor Engine Module

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