

## DATASHEET

# ONE2561

10 Gigabit Multi-Services Access Router for SD-WAN and IP VPNs



## The robust CPE for midsize and large offices

The ONE2561 is a robust router for service providers requiring high availability and redundancy. It can be deployed with dual power supplies and dual 10G WAN uplinks. Running the Ekinops OneOS6 software, it implements a packet forwarding engine that delivers multi gigabit bidirectional throughput, even with advanced services activated and all packet counters enabled, for up to 500.000 concurrent NAT sessions (1M flows). Its compact design in a metal casing without any fans and a rackmount option makes the ONE2561 suitable for deployment in desktop scenarios as well as in data room racks.

## Trusted security

At Ekinops, Security starts at the lowest level: the hardware. The Ekinops ONE2561 is manufactured in Ekinops' European factory in Belgium, the secure boot certificate hierarchy is fully controlled by Ekinops. The software stack is completely under Ekinops control and systematic monitoring of CVEs combined with regular updates and customer support, is key to achieving the best level of security. The ONE2561 can handle IPsec bidirectional performance of more than 1Gbps which also makes it usable as a small local VPN hub



- Based on the flexible Ekinops OneOS6 fully software-based routing engine, sized for 500,000 NAT sessions, adapted to large offices
- Reliable design: Fanless, carrier-grade hardware with ECC RAM - suitable for redundant setups (dual PSU, dual WAN) with optional cellular backup
- Manageable thanks to industry standard CLI, TR-069 and NETCONF/YANG interfaces.
- Secure (Hardware made in Europe, embedded TPM chip for trusted secure hierarchy, fully sovereign software stack, trusted Ekinops CA or own certificates installed in Ekinops factory)
- Real Time Clock for ensuring certificate date validity
- Dying Gasp to allow remote identification of power outages
- Adaptable (Support for containers, smooth integration into SDWAN/SASE, based on open standards)
- Ecodesign (Long hardware lifetime & software maintenance windows, low power consumption, conscious selection of materials, eco packaging)

Ekinops is a European leader in optical networking and secured connectivity solutions for service providers, enterprises and public organizations around the world.

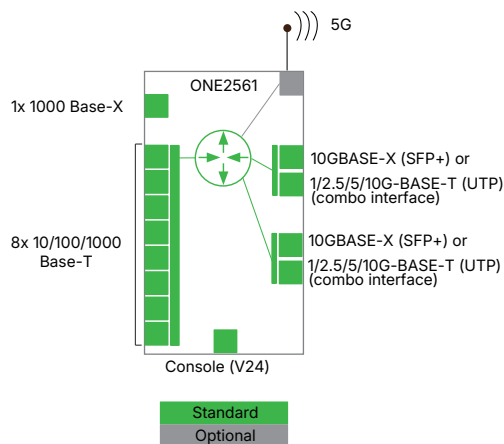
Ekinops designs, develops and manufactures high-performance solutions with cutting-edge software used to deliver high-bandwidth connectivity and managed services in over 70 countries worldwide.

Ekinops leads in the areas of:

- Advanced coherent optical networking for all metropolitan, regional, long-distance and datacenter interconnection applications
- Secured connectivity solutions for enterprises, from voice and data routing devices to Secure Access Service Edge (SASE) capabilities, including ZTNA (Zero-Trust Network Access), SD-WAN, and SSE.

Ekinops operates globally and is listed on Euronext Paris (FR0011466069 - EKI).

## Technical Features



### General

- 2x 10 Gigabit Ethernet SFP+/UTP combo
- 8x UTP Gigabit Ethernet LAN ports
- 1 SFP Gigabit Ethernet LAN port

### Wireless Radio Interface (factory option)

- MIMO 4x4, 4 SMA antenna connectors
- Supported band combinations are country specific / model dependent
- Dual SIM card
- 5G SA/NSA with automatic 4G fallback

### Console Port

- RS-232 - RJ-45 port

### Performance and Sizing

- 2Gbps/3.4Gbps\* bidirectional routing performance with services activated (IMIX409); up to 11Gbps\* aggregated raw IPv4 routing performance
- 1.2 Gbps bidirectional IPsec performance with services (IMIX410)
- 500.000 NAT sessions
- 500.000 IPv4 + IPv6 routes

### IP Addressing & Routing

- IPv4 and IPv6
- Static/dynamic NAT, NAT, selective NAT, twice NAT, application pass-through
- DHCP client, server, relay
- DNS proxy: DynDNS
- Routing protocols: RIP v1/v2, OSPF v2, BGP v4
- Multicast routing: PIM-SM and IGMP v2/v3
- Policy-based routing
- VRRP, VRF
- Load balancing

### IP Quality of Service

- IP Classification and priority (DiffServ)
- Class-Based Queuing, Class-Based Weighted Fair Queuing
- Low latency queuing, fragmentation and interleaving
- Policing, shaping and remarking
- RED, WRED, ECN
- QoS measurement probe
- Traffic identification with NetFlow reporting

### Security

- Standard and extended access lists
- Zone Based Firewall (ZBF) \*
- Session monitoring and limiting
- Local user authentication, via RADIUS and TACACS+
- Secure boot, hardware TPM module
- DDoS protection

### IP VPNs

- IPsec, GRE, IPIP, L2TPv2, L2TPv3\* with AES, DES, 3DES encryption and SHA-1, SHA-2 and MD5 hashing
- IKEv1 & IKEv2 with pre-shared keys & certificates
- IPsec tunnel and transport modes
- NAT traversal
- Dynamic Virtual Tunnel Interfaces (DVTI) \*

### Bridging and VLANs

- Bridging & Integrated Routing and Bridging (IRB)
- STP, RSTP, MSTP
- VLAN tagging and un-tagging
- Multiple VLAN IDs per port
- 802.1p priority tagging, ToS/CoS and CoS/ToS mapping
- Ethernet OAM
- 802.1x authentication

### Management

- Industry standard Command Line Interface (CLI), SSH
- NETCONF v1.0/v1.1 server
- TR-069 provisioning
- SNMP v1/v2c/v3
- FTP/TFTP, SFTP, SCP upload/download
- Traceroute, ping
- Powerful scriptable event manager, logging, syslog
- Netflow v9
- Traffic identification & visibility\*

### Optional Functions \*

- SBC, SD-WAN, FlexCPE (Docker Container support)

### Dimensions and Environmental

- Desktop, wall-mountable, rack-mountable
- W x H x D: 300 x 44 x 180 mm (11.81 x 1.73 x 7.08 in)
- Weight: 1.5 kg (3.31 lb)
- Operating temperature: 0-45°C
- Humidity: 5-90% non-condensing
- Optional brackets for 19" and ETSI racks
- Fanless: maintenance free, silent, reduced power consumption

### Power Supply

- Redundant power supply inputs with dying gasp
- External adapter 12V – 3A, region dependent
- Voltage range: 110 - 230 V AC – 50/60 Hz
- Power consumption: <36 W (typical power consumption without 5G backup and under full routing load below 19W, standby below 16W)
- Optional second power supply for redundancy
- Optional 24/48 V DC powering
- Dying gasp

\* Subject to a license