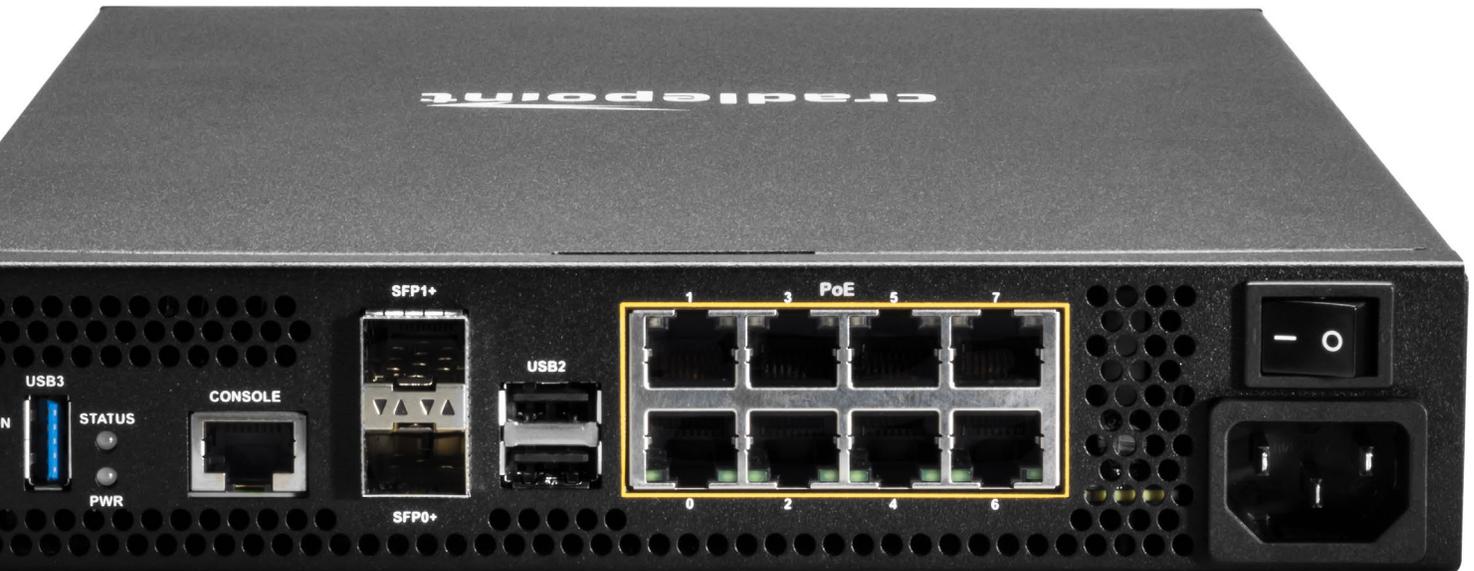




NetCloud Services for Branch



# CR4250 Spec Sheet



Cradlepoint CR4250 branch routers are sold as part of an all-inclusive Branch Performance Essentials package.

**NetCloud Branch Performance Essentials Packages Include:**

- Purpose-built endpoints for branch applications
- A NetCloud Service Plan tailored for branch networking and set for a specific term
- 24x7 support and limited lifetime warranty

## What to Buy

Description	Part Numbers
<b>North America</b> (U.S., Canada)	
— NetCloud Branch Performance Essentials with CR4250-PoE	BDx-425P-OON
— NetCloud Branch Performance Essentials with CR4250	BDx-4250-OON
<b>Europe</b> (EU)	
— NetCloud Branch Performance Essentials with CR4250-PoE	BDx-425P-OOE
— NetCloud Branch Performance Essentials with CR4250	BDx-4250-OOE
— NetCloud Branch Performance Essentials with CR4250-PoE	BDx-425P-OOU
— NetCloud Branch Performance Essentials with CR4250	BDx-4250-OOU
<b>Asia-Pacific</b> (Australia, New Zealand)	
— NetCloud Branch Performance Essentials with CR4250-PoE	BDx-425P-OOP
— NetCloud Branch Performance Essentials with CR4250	BDx-4250-OOP
<b>All Regions</b>	
— NetCloud Branch Performance Advanced Plan	BDx-NCADV

*x = 1, 3, or 5 years*

**NetCloud Branch Performance Essentials** packages and plans contain all the features and capabilities required for small to mid-sized branch applications. Essentials Packages include 24x7 support (phone support: 24 hour weekdays with emergency response on weekends, web: 24x7, chat: 24x5) and a limited lifetime warranty.

For additional capabilities, a **NetCloud Branch Performance Advanced Plan** can be added to the NetCloud Branch Performance Essentials Package at any time.

See additional details of what is included in the Essential and Advanced NetCloud software: [cradlepoint.com/branch-networks](https://cradlepoint.com/branch-networks)

For more details on the CR4250 branch routers, included with the NetCloud Branch Performance Essentials Packages, see below.

## What's in the Box

- CR4250 or CR4250-PoE high-performance branch router
- C8 line cord
- Four (4) rubber feet for desk mounting
- Safety, Regulatory, and Warranty guide

## Key Features

### WAN

- 8 10/100/1000 Ethernet ports (WAN/LAN switchable)
- 2 SFP/SFP+ ports (WAN/LAN switchable)
- Smart WAN Selection
- Failover/Failback
- Load Balancing
- WAN Port Speed Control
- WAN/LAN Affinity
- DynDNS
- Auto QoS
- QoS (DSCP and Priority Queuing)
- SD-WAN

### LAN

- 8 10/100/1000 Ethernet ports (WAN/LAN switchable); PoE version supports PoE on all ports for class I, II, III, or IV devices (125 W power budget).
- 2 SFP/SFP+ ports (WAN/LAN switchable)
- LLDP support
- VLAN 802.1Q
- DHCP Server, Client, Relay
- DNS and DNS Proxy
- Split DNS
- STP
- Unicast/Multicast Proxy

## Management

- Cradlepoint NetCloud Manager (NCM)
- Real-time diagnostics/troubleshooting
- Remote connect / OOBM
- Secure remote cloud configuration
- GeoView location services
- Web UI, API, CLI
- NetCloud Perimeter gateway support
- Client and Traffic Visibility and Control
- SDK support
- Data Usage Alerts
- Advanced Troubleshooting (support)
- Device Alerts
- SNMP
- Console Port for OOBM

## VPN & Routing

- IPsec Tunnel – up to 100 concurrent sessions
- IKEv2 support (includes MOBIKE)
- OpenVPN (SSL VPN)
- L2TP
- GRE Tunnel
- OSPF/BGP/RIP
- Route Filters (Access Control Lists, Prefix Filters, Route Maps, Communities for BGP)
- Policy-based Routing
- Per-Interface Routing
- Static Routing
- NAT
- NAT-less Routing
- WAN Affinity
- Virtual Server/Port Forwarding
- VTI Tunnel Support
- DMNR
- IPv6
- VRRP
- STP
- NHRP

## Security

- RADIUS and TACACS+ support\*
- 802.1x authentication for Wireless and Wired Networks
- Zscaler Internet Security<sup>1</sup>
- Certificate support
- Application-level gateways
- MAC Address Filtering
- CP Secure Threat Management<sup>2</sup>
- Advanced Security Mode (local user management only)
- IP Filtering
- Content Filtering

## IoT Connector

- NetCloud Edge Connector for Microsoft® Azure IoT Central

\* Native support for authentication. Authorization and accounting support through hotspot/captive portal services

<sup>1</sup> Requires a [Zscaler Internet Security](#) subscription

<sup>2</sup> Requires an active Branch Advanced Plan

## Specifications

The following features are delivered through the hardware.

### WAN:

- 8 10/100/1000 Ethernet ports (cable/DSL/T1/satellite/Metro Ethernet; WAN/LAN switchable)
- 2 SFP/SFP+ (WAN/LAN switchable)
- SD-WAN

### LAN:

- 8 10/100/1000 Ethernet ports (WAN/LAN switchable)
- 2 SFP/SFP+ (WAN/LAN switchable)

### Temperature:

- 0 °C to 40 °C (32 °F to 104 °F) operating
- -20 °C to 60 °C (-4 °F to 140 °F) storage
- Internal fans for reliable cooling

### Humidity (non-condensing):

- 10% to 90% operating
- 5% to 95% storage

**Processor:** x86 4-core CPU @2.2 GHz with Intel Quick Assist Technology

**Memory:** 8 GB DDR4 ECC; 16 GB eMMC Flash

**Size:**

- 13.2 x 8.3 x 1.8 in (335 x 210 x 45 mm)
- 1U height for rack mount

**Weight:** 4 lb 4 oz (1.9 kg)

**Certifications:**

- Regulatory: FCC, CE, IC, RCM (Australia/New Zealand), ICASA (South Africa)
- Safety: UL, CB Scheme
- Materials: RoHS

## Performance

- Ethernet WAN
  - Max Throughput (Default Configuration\*): 950 Mbps
  - Max Concurrent TCP Sessions: 1,000,000
  - Max IPSec VPN Throughput: 750 Mbps
- Recommended Max Client Count: 300\*\*
- SFP+
  - Max Throughput (Default Configuration\*): 2,000 Mbps
  - Max Concurrent TCP Sessions: 1,000,000
  - Max IPSec VPN Throughput: 1,100 Mbps
  - Recommended Max Client Count: 300\*\*

Performance testing was conducted based off requirements as defined in RFC2544 using a mix of 64, 256, and 1500-byte packet sizes. Throughput is shown as bi-directional TCP traffic with less than a 1% packet loss using four wired clients.

Specifications and information in this datasheet are subject to change without notice.

\* Default configuration shipped with hardware including NAT and basic stateful/zone firewall configuration.

\*\* Cradlepoint defines client as any network connected device utilizing resources, such as bandwidth, on the local network.

## Accessories

- CBA850 for LTE support
- AP22 for WiFi support
- CR4250 Rack-Mount Brackets Part # 170764-000
- Qualified SFP/SFP+ modules from Finisar<sup>1</sup>

- Gigabit SFP Transceivers\*
  - FTLF8519P3BNL - SFP -> 1000BaseSX Transceiver - Multi mode fiber
  - FTLF1318P3BTL - SFP -> 1000BaseLX Transceiver - Single mode fiber
- 10 Gigabit SFP+ Transceivers
  - FTLX8574D3BCL - SFP+ -> 10GBase-SR - OM-4 Multi mode fiber
  - FTLX1471D3BCL - SFP+ -> 10GBase-LR - Single mode fiber
  - FCBG110SD1Cxx - SFP+ Direct Attach Cable (DAC) - Lengths could be 1, 3 and 5 Meters

1 Non-qualified SFP/SFP+ modules may function

\* SFP: 1000baseTx transeiver not supported by any manufacturer

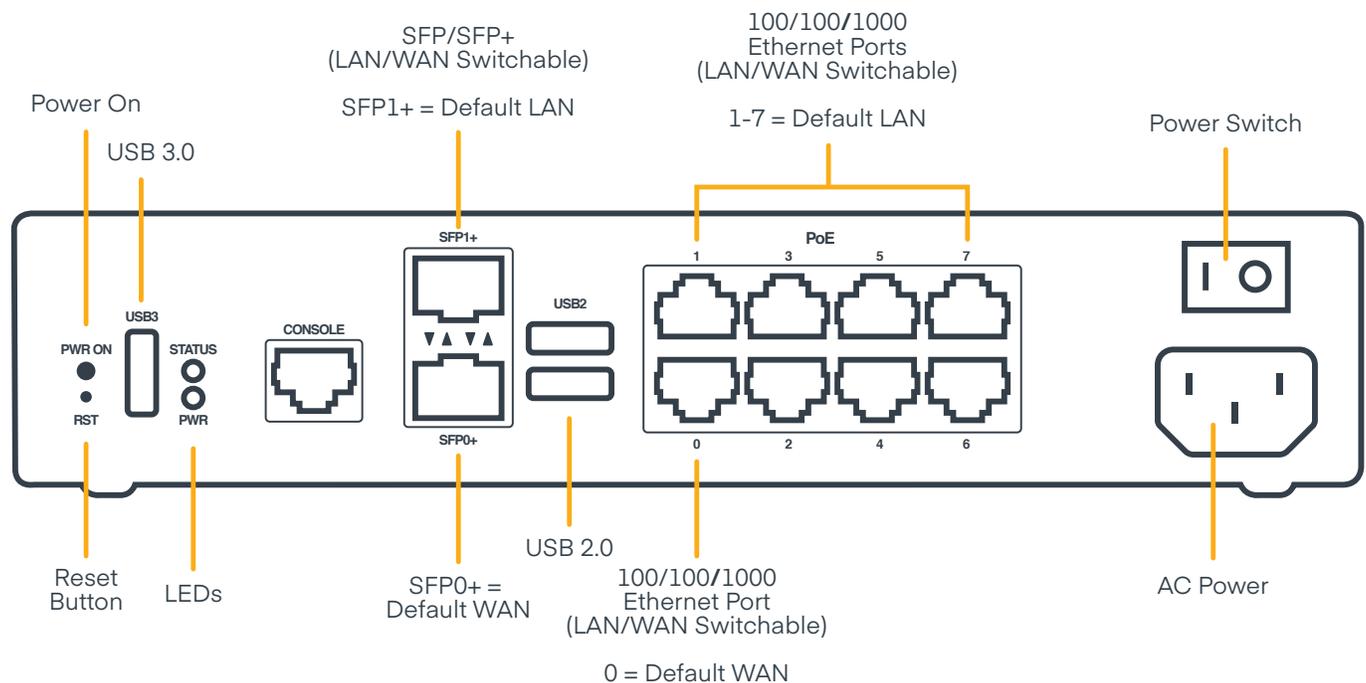
## Support & Warranty

The CR4250 & CR4250-PoE are only sold as components of NetCloud Packages.

- NetCloud Packages include support for the full subscription term.
- All Cradlepoint hardware products are covered by a limited lifetime warranty for as long as they have a subscription license to an active NetCloud Service Plan.

All specifications subject to change without notice.

## Hardware



## LEDs

Indicator	Behavior
	<p><b>Power:</b> Input requirements 100-240V, 50-60Hz; 1.7A max w/o PoE, 4.1A max w/ POE.</p> <ul style="list-style-type: none"> <li>— Green = Powered ON and hardware OK.</li> <li>— No Light = Not receiving power.</li> <li>— Red = Critical hardware problem detected. Hardware problem means that, most likely, unit can not boot. This can happen when hardware component (RAM, CPU, Flash, etc) was found to have a critical issue and can't operate as expected. Contact Support.</li> </ul>
<b>Status</b>	<p><b>Status:</b> LED lights that indicate the connection status of the endpoint.</p> <ul style="list-style-type: none"> <li>— LED Off - normal operation</li> <li>— Blinking Green (1Hz) - upgrade in progress OR a button is currently pressed</li> <li>— Blinking Green (4Hz) - shutdown in progress</li> <li>— Blinking Orange (4Hz) - factory reset in progress</li> </ul>

## Buttons

Indicator	Behavior
<b>Reset Button</b>	<ul style="list-style-type: none"> <li>— Press and hold for more than 7 seconds (status LED will be flashing orange at 4Hz when button is released). Customer configuration will be erased and unit will reboot. Customer entitlements will be preserved.</li> </ul>
<b>PWR On Button</b>	<ul style="list-style-type: none"> <li>— Press and hold for more than 3 seconds, but less than 7 (status LED will be flashing green at 4Hz when button released). Unit will send shutdown signal to all of its components and will safely power down. The PWR LED will turn RED before turning off completely.</li> <li>— Press and hold for more than 7 seconds. Unit will do the same thing as above, but will force shutdown of all components.</li> </ul>