

## Data Sheet

# Ericsson Cradlepoint X20

2025 - 10 - 17

The X20 redefines enterprise-class business connectivity for small to medium-sized businesses, temporary sites, remote workers and home-based businesses. The X20 delivers powerful 5G performance with network slicing capabilities, enhanced security and seamless management, in a compact form factor. Featuring cutting-edge routing, switching, and Wi-Fi 7, the X20 ensures robust, easy-to-maintain connectivity essential for critical business operations. Its advanced embedded 5G modem offers ultra-reliable, private, day-1 connectivity—eliminating the need for wired installations or complementing them in a failover or Hybrid-WAN solution.

## Customer Segments

**Small-to-Medium Businesses** — The X20 5G router offers small and medium-sized businesses, such as small offices, retail stores, and restaurants, a reliable and high-speed internet connection without the need for traditional wired infrastructure. With 5G speeds, businesses can seamlessly support cloud-based applications, improve customer experiences, and enable efficient operations. Furthermore, its scalability and flexibility allow SMBs to adapt to changing connectivity needs as they grow.

**Temporary Sites** — The X20 5G router is an excellent connectivity solution for temporary sites like pop-up stores, mobile clinics, and construction sites, where rapid deployment and flexibility are critical. With high-speed 5G connectivity, these temporary sites can support vital operations, from processing transactions and accessing patient records to managing project logistics. The portability and ease of relocation make the X20 5G router a versatile tool that adapts to dynamic business environments.

**Remote Workers and Home-Based Businesses** — The X20 5G router is an ideal solution for remote workers, hybrid workers, and home-based businesses seeking reliable, high-speed internet connectivity without the constraints of traditional wired services. Its easy setup and portability allow users to establish a robust network in any location, ensuring seamless access to cloud applications, video conferencing, and collaborative tools. The advanced 5G speeds offer the bandwidth necessary to support multiple devices and demanding tasks, enhancing productivity and providing a future-proof solution for modern work environments.

## Advanced Services

## Notable Features

- **5G NR Rel-17 modem and Wi-Fi 7:** Harnesses the latest advancements in 5G and Wi-Fi technology to deliver ultra-fast, reliable, and seamless connectivity for demanding business applications.
- **Network Slicing:** Ability to lock the device to designated network slice for dedicated bandwidth, improved quality of service and optimal performance.
- **Flexibility and Resilience:** Operates as a primary 5G wireless connection, a failover solution for wired networks, or as part of a Hybrid WAN setup, delivering maximum adaptability and robust network continuity.
- **Up to 8-Hour Battery Backup:** Ensure uninterrupted connectivity during power outages with an integrated 8-hour battery backup, keeping your business up and running when it matters most.
- **Dual-SIM and eSIM Capabilities:** Seamlessly switch between carriers or configure eSIM profiles remotely, ensuring flexible deployment, cost efficiency, and reliable 5G connectivity anywhere.

With Ericsson NetCloud SASE, organizations can combine the performance of 5G, the efficiency of SD-WAN, and the security of zero trust networking and Secure Internet Access into a full-stack WWAN solution.

- Secure Connect - Build zero trust encrypted tunnels – replacing VPNs – over hybrid cellular and wired links.
- SD-WAN - Deploy a cellular-optimized SD-WAN solution that amplifies the 5G experience.
- Hybrid Mesh Firewall - Utilizes on-premise, cloud-based, and on-router capabilities to deliver optimal performance along with enhanced security.
- Secure Internet Access - Protect web access by isolating users and devices from all Internet-based malware.

## Hardware Specifications

The following features are delivered through the hardware.

INTERFACES	
Modem:	<div>Embedded 5G Sub-6 GHz Rel-17 modem supporting LTE Cat 20</div> <ul style="list-style-type: none"><li>— 4 x SMA cellular antenna connectors</li><li>— 4 x internal cellular antennas</li></ul>
Ethernet:	<div>5 x 2.5 GbE RJ45 (LAN/WAN switchable)</div>
Wi-Fi:	<div>Tri-radio, tri-band, concurrent operation (2.4 GHz, 5 GHz, and 6 GHz)</div> <ul style="list-style-type: none"><li>— 2x2 MU-MIMO 802.11be Wi-Fi 7 with DFS</li><li>— 688 Mbps (2.4 GHz), 2,882 Mbps (5 GHz), and 5,764 Mbps (6 GHz)</li><li>— 2 x internal dual-band 2.4 GHz/5 GHz Wi-Fi antennas</li><li>— 2 x internal 6 GHz Wi-Fi antennas</li><li>— Global Optimized Wi-Fi and International SDR</li><li>— WPA2/WPA3 Personal, WPA2/WPA3 Enterprise, Open</li><li>— 802.11k, 802.11v</li></ul>
Expansion:	<div>1 x USB 2.0 Type A (output: 5 V, 500 mA, 2.5 W)</div>
GNSS/GPS:	<div>Passive GNSS</div> <ul style="list-style-type: none"><li>— 1 x internal GNSS antenna</li></ul>
ENVIRONMENTAL	
Temperature:	<div>Without battery:</div> <ul style="list-style-type: none"><li>— Operating: 0 °C to 45 °C (32 °F to 113 °F)</li><li>— Storage: -20 °C to 70 °C (-4 °F to 158 °F)</li></ul> <div>With battery:</div> <ul style="list-style-type: none"><li>— Operating: 0 °C to 40 °C (32 °F to 104 °F)</li><li>— Storage: -20 °C to 60 °C (-4 °F to 140 °F)</li></ul>

<b>Humidity:</b>	Without battery:
	<ul style="list-style-type: none"> <li>— Operating: 10% to 90%</li> <li>— Storage: 5% to 95%</li> </ul>
	With battery:
	<ul style="list-style-type: none"> <li>— Operating: 10% to 80%</li> <li>— Storage: 5% to 60%</li> </ul>
<b>POWER</b>	
<b>Required:</b>	External power supply (included)
	<ul style="list-style-type: none"> <li>— Input: 100-240 VAC 1 A</li> <li>— Output: 12 VDC 3 A</li> </ul>
<b>Consumption:</b>	<ul style="list-style-type: none"> <li>— Idle: 17 W</li> <li>— Idle charging battery: 23 W</li> <li>— Typical: 19 W</li> <li>— Typical charging battery: 25 W</li> <li>— Heavy: 26 W</li> <li>— Heavy charging battery: 32 W</li> </ul>
	<b>NOTE:</b> All power consumption numbers include power adapter losses.
<b>PHYSICAL</b>	
<b>Size:</b>	309 x 141 x 53 mm (12.2 x 5.6 x 2.1 in)
<b>Weight:</b>	Without battery:
	<ul style="list-style-type: none"> <li>— .94 kg (2 lb 1 oz)</li> </ul>
	With battery:
	<ul style="list-style-type: none"> <li>— 1.28 kg (2 lbs 13 oz)</li> </ul>
<b>RELIABILITY</b>	
<b>Calculated MTBF:</b>	X20-5GE-AM
	<ul style="list-style-type: none"> <li>— 839,028 hours (Telcordia SR332 at 25 °C)</li> </ul>
	X20-5GE-GL
	<ul style="list-style-type: none"> <li>— 841,529 hours (Telcordia SR332 at 25 °C)</li> </ul>
<b>CERTIFICATIONS</b>	
<b>Safety:</b>	<ul style="list-style-type: none"> <li>— UL/cUL</li> <li>— CB Scheme</li> <li>— EN 62368-1</li> </ul>

<b>Environmental Compliance:</b>	<ul style="list-style-type: none"> <li>— WEEE 2012/19/EU</li> <li>— RoHS 2011/65/EC and its amendments</li> <li>— REACH 1907/2006 and its amendments</li> <li>— TSCA 40 CFR Part 751 and 40 CFR 721</li> <li>— California Proposition 65</li> <li>— Canadian Toxic Substance Act SOR/2012-285</li> </ul>
<b>Security:</b>	Secureboot
<b>CLOUD SERVICES</b>	
<b>Service Plans:</b>	NetCloud Connect
<b>Service Add-Ons:</b>	NetCloud Advanced
<b>Support:</b>	NetCloud Packages include support for the full subscription term.
<b>Warranty:</b>	The X20 router is covered by a 12-month limited warranty.
<b>Device Management:</b>	NetCloud Manager for the full subscription term.
<b>Software Updates:</b>	NetCloud Manager for the full subscription term.
<b>WI-FI POWER</b>	
<b>FCC:</b>	<ul style="list-style-type: none"> <li>— 2.4 GHz: 32.69 dBm EIRP</li> <li>— 5150–5250 MHz: 34.25 dBm EIRP</li> <li>— 5250–5350 MHz: 29.9 dBm EIRP</li> <li>— 5470–5725 MHz: 29.9 dBm EIRP</li> <li>— 5725–5850 MHz: 34.23 dBm EIRP</li> <li>— 5925–6245 MHz: 29.98 dBm EIRP</li> <li>— 6245–6525 MHz: 29.71 dBm EIRP</li> <li>— 6525–6875 MHz: 29.37 dBm EIRP</li> <li>— 6875–7125 MHz: 27.25 dBm EIRP</li> </ul>
<b>IC:</b>	<ul style="list-style-type: none"> <li>— 2.4 GHz: 32.69 dBm EIRP</li> <li>— 5150–5250 MHz: 22.97 dBm EIRP</li> <li>— 5250–5350 MHz: 22.97 dBm EIRP</li> <li>— 5470–5725 MHz: 29.89 dBm EIRP</li> <li>— 5725–5850 MHz: 34.23 dBm EIRP</li> <li>— 5925–6425 MHz: 29.98 dBm EIRP</li> <li>— 6425–6525 MHz: 29.71 dBm EIRP</li> <li>— 6525–6875 MHz: 29.37 dBm EIRP</li> <li>— 6875–7125 MHz: 27.25 dBm EIRP</li> </ul>
<b>CE:</b>	<ul style="list-style-type: none"> <li>— 2.4 GHz: 19.85 dBm EIRP</li> <li>— 5180–5240 MHz: 22.95 dBm EIRP</li> <li>— 5260–5320 MHz: 22.95 dBm EIRP</li> <li>— 5500–5700 MHz: 29.98 dBm EIRP</li> <li>— 5725–5850 MHz: 22.97 dBm EIRP</li> <li>— 5925–6425 MHz: 22.97 dBm EIRP</li> </ul>
<b>PERFORMANCE</b>	

Stateful Firewall:	2.4 Gbps
Client Analytics:	2.4 Gbps
Concurrent Sessions (TCP):	130,000
Typical Client Count:	50
Layer 2 / Layer 3 VLANs:	Up to 64
LEDs	
Refer to the <a href="#">Ericsson Cradlepoint X20 Quick Start Guide</a> .	
BATTERY (OPTIONAL)	
Size:	120.5 x 81 x 24.5 mm (4.7 x 3.2 x 1.0 in)
Weight:	0.35 kg (12.2 oz)
Chemistry:	Lithium-ion
Discharge Power:	25 W
Capacity:	56.62 Wh
Estimated Runtime:	Up to 8 hours
Charge Time:	12 hours (95% charged)

Performance testing conducted based on requirements as defined in RFC2544 using fixed-frame 1518-byte packets. Throughput results reflect uni-directional UDP traffic with less than 1% packet loss as tested with wired connections. Results do not reflect performance of the cellular wireless operator networks.

## Enterprise-Class Modem Specifications

SPECIFICATION	X20-5GE-AM (Americas)
Technology:	5G FR1 NSA/SA and 4G LTE
	— 3GPP Release 17
	— LTE Advanced Pro Category 20
	— Dual SIM slots, 4FF form factor
	— Embedded eSIM
	— 5G network slicing
	— 8Rx support
3G:	WCDMA/UMTS/HSPA+

<b>Carrier Aggregation:</b>	<p>LTE Only</p> <ul style="list-style-type: none"> <li>Downlink: Up to 6 CA</li> <li>Uplink: Up to 2 CA</li> </ul> <p>LTE + 5G NR ENDC</p> <ul style="list-style-type: none"> <li>Downlink: Up to 3 CA (LTE) + Up to 2 CA (5G NR)</li> <li>Uplink: 1 CA (LTE) + 1 CA (5G NR)</li> </ul> <p>5G NR Only</p> <ul style="list-style-type: none"> <li>Downlink: Up to 3 CA</li> <li>Uplink: Up to 2 CA</li> </ul> <p>See <a href="#">Understanding Carrier Aggregation</a>.</p>
<b>Peak Rates:</b>	<ul style="list-style-type: none"> <li>Downlink: Up to 4.67 Gbps</li> <li>Uplink: Up to 1.25 Gbps</li> </ul>
<b>MIMO:</b>	4x4 MIMO
<b>Modulation:</b>	<p>5G FR1</p> <ul style="list-style-type: none"> <li>Downlink: Up to 256 QAM</li> <li>Uplink: Up to 256 QAM</li> </ul>
<b>4G/LTE Bands:</b>	<p>FDD</p> <ul style="list-style-type: none"> <li>Power Class 3: B2 (1900), B4 (1700), B5 (850), B7 (2600), B12 (700), B13 (700), B14 (700), B17 (700), B25 (1900), B26 (850), B29 (700), B30 (2300), B66 (1700), B71 (600)</li> </ul> <p>TDD</p> <ul style="list-style-type: none"> <li>Power Class 2: B38 (2600), B41 (2500), B42 (3500), B43 (3700)</li> <li>Power Class 3: B48 (3500)</li> </ul>
<b>5G NR Bands:</b>	<p>NSA and SA</p> <ul style="list-style-type: none"> <li>Power Class 1.5: n38 (2600), n41 (2500), n77 (3700), n78 (3500)</li> <li>Power Class 2: n2 (1900), n5 (850), n7 (2600), n25 (1900), n66 (1700/2100), n71 (600)</li> <li>Power Class 3: n12 (700), n13 (746-756), n14 (758-768), n26 (850), n29 (717), n30 (2300), n48 (3500), n70 (1700/1900)</li> </ul>
<b>Power:</b>	<p>LTE</p> <ul style="list-style-type: none"> <li>Power Class 2: 26 dBm + 2/-3 (typical conducted)</li> <li>Power Class 3: 23 dBm ± 2 (typical conducted)</li> </ul> <p>5G NR</p> <ul style="list-style-type: none"> <li>Power Class 1.5: 29 dBm + 1/-3 (typical conducted)</li> <li>Power Class 2: 26 dBm + 2/-3 (typical conducted)</li> <li>Power Class 3: 23 dBm ± 2 (typical conducted)</li> </ul>

<b>Antennas:</b>	SMA female connectors, external 600 MHz - 6 GHz cellular paddle antennas (Qty 4, included)
<b>SMS:</b>	Yes
<b>Regulatory:</b>	<ul style="list-style-type: none"> <li>— FCC (U.S.) - Pending</li> <li>— IC (Canada) - Pending</li> </ul>
<b>Network Operator Standards:</b>	PTCRB (U.S., Canada) - Pending
<b>Network Operator Certifications:</b>	<ul style="list-style-type: none"> <li>— AT&amp;T - Pending</li> <li>— T-Mobile - Pending</li> <li>— Verizon<sup>†</sup> - Pending</li> </ul>
<b>Public Safety Network Certifications:</b>	N/A
<b>Private Cellular Network:</b>	Yes, includes FCC Part 96 (CBRS Band 48)

<sup>†</sup>Cellular carriers and operators throughout the world may only require telecom industry certifications, like PTCRB or GCF, to operate on their network. Some carriers require additional testing and approval, beyond telecom certifications. A carrier listed in the approvals section means Ericsson Enterprise Wireless Solutions completed additional testing and acquired technical approval for that given carrier. Any carrier not listed may not require additional testing or approval beyond telecom industry certifications to operate on their network.

SPECIFICATION	X20-5GE-GL (EMEA, APAC, and parts of LATAM)
<b>Technology:</b>	5G FR1 NSA/SA and 4G LTE <ul style="list-style-type: none"> <li>— 3GPP Release 17</li> <li>— LTE Advanced Pro Category 20</li> <li>— Dual SIM slots, 4FF form factor</li> <li>— Embedded eSIM</li> <li>— 5G network slicing</li> <li>— 8Rx support</li> </ul>
<b>3G:</b>	WCDMA/UMTS/HSPA+
<b>Carrier Aggregation:</b>	LTE Only <ul style="list-style-type: none"> <li>— Downlink: Up to 6 CA</li> <li>— Uplink: Up to 2 CA</li> </ul> LTE + 5G NR ENDC <ul style="list-style-type: none"> <li>— Downlink: Up to 3 CA (LTE) + Up to 2 CA (5G NR)</li> <li>— Uplink: 1 CA (LTE) + 1 CA (5G NR)</li> </ul> 5G NR Only <ul style="list-style-type: none"> <li>— Downlink: Up to 3 CA</li> <li>— Uplink: Up to 2 CA</li> </ul> See <a href="#">Understanding Carrier Aggregation</a> .
<b>Peak Rates:</b>	<ul style="list-style-type: none"> <li>— Downlink: Up to 4.67 Gbps</li> <li>— Uplink: Up to 1.25 Gbps</li> </ul>

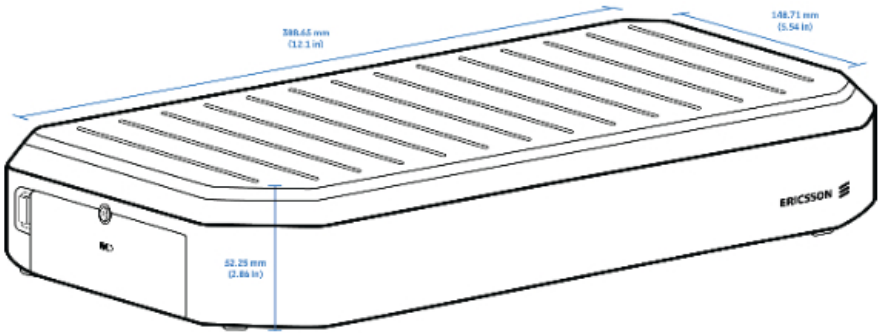


<b>MIMO:</b>	4x4 MIMO
<b>Modulation:</b>	5G FR1 <ul style="list-style-type: none"> <li>— Downlink: Up to 256 QAM</li> <li>— Uplink: Up to 256 QAM</li> </ul>
<b>4G/LTE Bands:</b>	FDD <ul style="list-style-type: none"> <li>— Power Class 3: B1 (2100), B3 (1800), B5 (850), B7 (2600), B8 (900), B20 (800), B28 (700), B32 (1500)</li> </ul> TDD <ul style="list-style-type: none"> <li>— Power Class 2: B38 (2600), B41 (2500), B42 (3500), B43 (3700)</li> <li>— Power Class 3: B40 (2300)</li> </ul>
<b>5G NR Bands:</b>	NSA and SA <ul style="list-style-type: none"> <li>— Power Class 1.5: n38 (2600), n41 (2500), n77 (3700), n78 (3500)</li> <li>— Power Class 2: n1 (2100), n3 (1800), n5 (850), n7 (2600), n28 (700), n38 (2600), n40 (2300), n41 (2500), n77 (3700), n78 (3500)</li> <li>— Power Class 3: n8 (900), n20 (800)</li> </ul>
<b>3G Bands:</b>	B1, B5, B8
<b>Power:</b>	LTE <ul style="list-style-type: none"> <li>— Power Class 2: 26 dBm + 2/-3 (typical conducted)</li> <li>— Power Class 3: 23 dBm ± 2 (typical conducted)</li> </ul> 5G NR <ul style="list-style-type: none"> <li>— Power Class 1.5: 29 dBm + 2/-3 (typical conducted)</li> <li>— Power Class 2: 26 dBm +2/-3 (typical conducted)</li> <li>— Power Class 3: 23 dBm ± 2 (typical conducted)</li> </ul>
<b>Antennas:</b>	SMA female connectors, external 600 MHz - 6 GHz cellular paddle antennas (Qty 4, included)
<b>SMS:</b>	Yes
<b>Regulatory:</b>	<ul style="list-style-type: none"> <li>— CE (EU) - Pending</li> <li>— RCM (AU/NZ) - Pending</li> <li>— UKCA (UK) - Pending</li> </ul>
<b>Network Operator Standards:</b>	GCF (Worldwide) - Pending
<b>Network Operator Certifications:</b>	See note <sup>†</sup>
<b>Public Safety Network Certifications:</b>	N/A
<b>Private Cellular Network:</b>	N/A

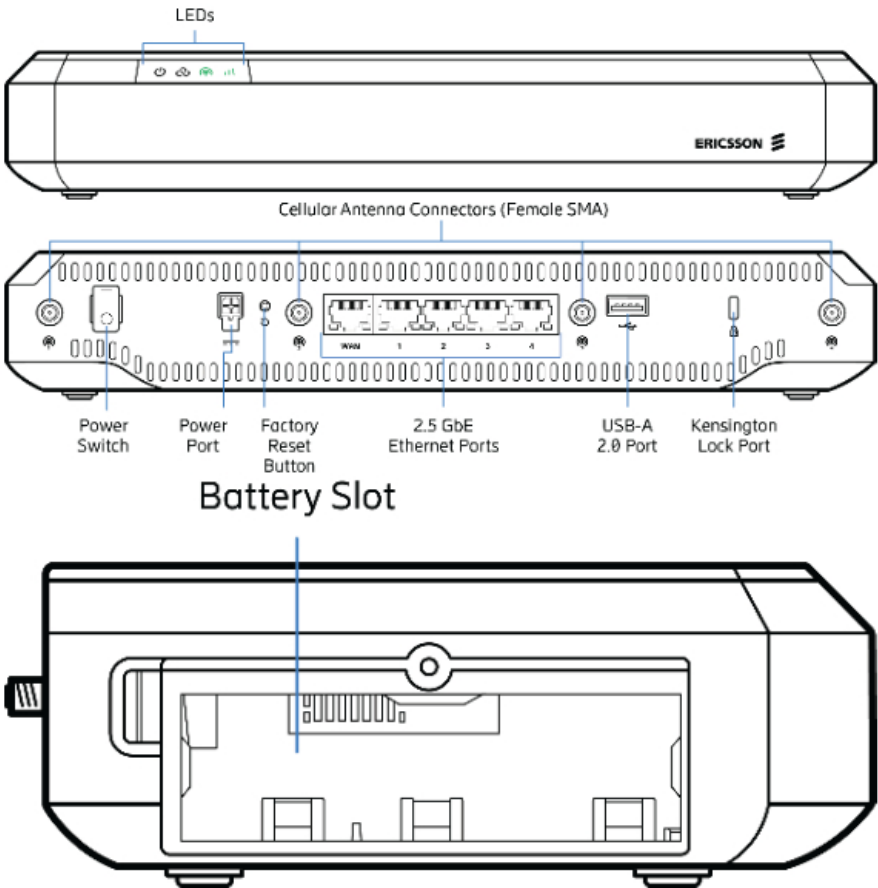
<sup>†</sup>Cellular carriers and operators throughout the world may only require telecom industry certifications, like PTCRB or GCF, to operate on their network. Some carriers require additional testing and approval, beyond telecom certifications. A carrier listed in the approvals section means Ericsson Enterprise Wireless Solutions completed additional testing and acquired technical approval for that given carrier. Any carrier not listed may not require additional testing or approval beyond telecom industry certifications to operate on their network.

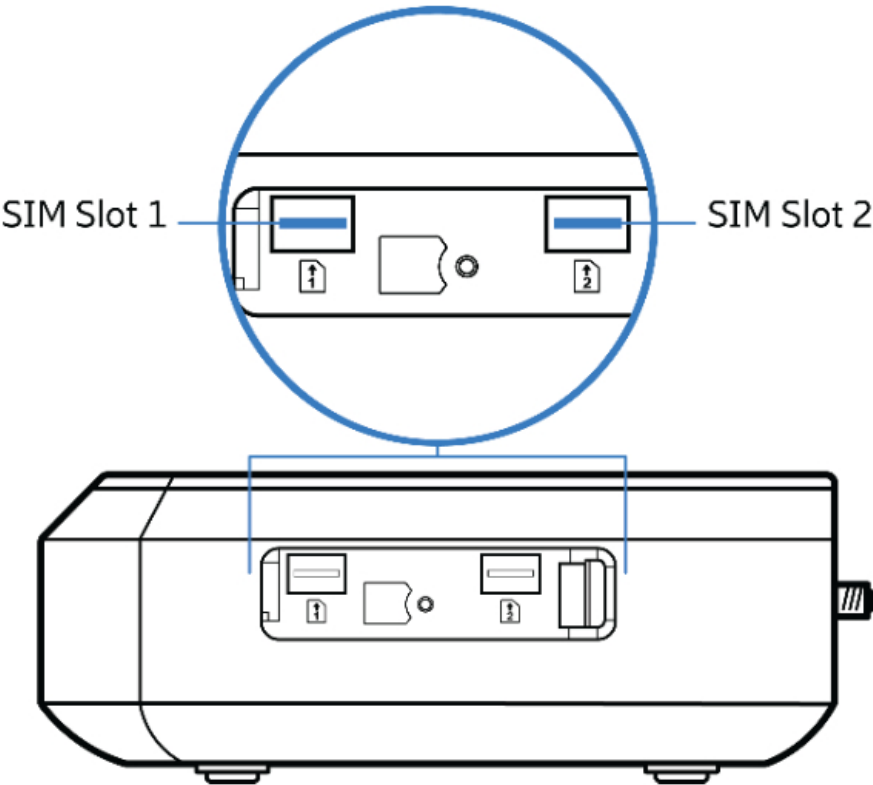


# Physical Measurements & Features



## Features — X20-5GE





SIM Card Info



Accessories

INCLUDED	PART NUMBER
Cellular Antenna, Charcoal, 600 MHz - 6 GHz, SMA, 152 mm (Qty 4)	170923-000
One of the following:	
— Power Supply, 12 VDC, 2x2 1.5 meters (North America)	170924-000
— Power Supply, 12 VDC, 2x2 1.5 meters (International)	170925-000
Ethernet Cable, Cat5e RJ45-to-RJ45, 1.5 meters	170926-000
Door Screws (Qty 2)	N/A
OPTIONAL	PART NUMBER
Battery, 25 W, 56.65 Wh	170921-000
UNITED STATES FEDERAL GOVERNMENT	PART NUMBER

Cellular Antenna, Charcoal, 600 MHz - 6 GHz, SMA, 152 mm	TAA-170923-000
Power Supply, 12 VDC, 2x2, 1.5 meters (North America)	TAA-170924-000
Power Supply, 12 VDC, 2x2 1.5 meters (International)	TAA-170925-000

## Support & Warranty

The Ericsson Cradlepoint X20 router is only sold as a component of Ericsson NetCloud Branch packages.

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

## More information

Find the most up-to-date information at [cradlepoint.com/x20sp](https://cradlepoint.com/x20sp)