

LTECube-CAT12 - 600 Mbps LTE Advanced Ethernet Gateway

The LTECube-CAT12 was engineered for applications that require a robust & compact device that delivers high bandwidth capabilities. The LTECube-CAT12 uses CAT12 LTE Advanced with 3x Carrier Aggregation to deliver speeds up to 600 Mbps download and 150 Mbps upload. The LTECube-CAT12 features Gigabit Ethernet, USB, Standalone GPS, and secure VPN/GRE tunneling capabilities.

LTE Advanced CAT12

600/150 Mbps DL/UL

Standalone GPS

Gigabit Ethernet

IPv6 & IPv4 Support

USB 2.0 Port



Only 1.75" x 2.10" x 1.35"!

Features

- 7-58V_{DC} or PoE (802.3af) powered
- Fast & Robust CAT12 LTE Advanced Operation
- 3x Carrier Aggregation
- Up to 600 Mbps Download / 150 Mbps Upload Speeds
- Data Usage & Systems Alerts (Email, SMS)
- Firewall with ACL Security, DMZ & Port Forwarding
- IPSec(IKEv1/IKEv2), GRE / VPN Tunneling
- 10/100/1000 Ethernet
- Full IPv6 & IPv4 Support
- MQTT Support
- LWM2M Support
- Wide Operating Temperature (-40°C to +85°C)
- User interface via SSH or HTTP/HTTPS web browser
- Microhard NMS2 & IoT Portal Support



LTECube-CAT12 Specifications

Supported Bands	<p>LTE-FDD: B1/B2/B3/B4/B5/B7/B8/B9/B12/B13/B14/B17/B18/B19/B20/B21/B25/B26/B28/B29/B30/B32/B66; LTE-TDD: B38/39/B40/B41 WCDMA: B1/B2/B3/B4/B5/B8/B9/B19</p> <p>DL 2×CA: B1+3/5/18/19/20/26; B2+2/4/5/12/13/17/29/30/66; B3+3/5/7/8/19/20/28; B4+4/5/12/13/17/29/30; B5+7/30/66; B7+7/20/28; B12+30; B13+66; B19+21; B20+B32; B29+30; B38+38; B39+39; B39+39; B39+41; B40+40; B41+41; B66+66, 12, 29, 30, 5; B2+B14; B14+B30; B14+B66;</p> <p>DL 3×CA: DL inter-band 3CA: B1+3+5/7/8/19/20/28; B1+7+20; B2+4+5; B2+4+13, B2+5+30; B2+12+30; B2+29+30, B3+7+20, B3+7+28, B3+7+8, B4+5+30, B4+12+30, B4+29+30, B5+66+2, B13+66+2; B66+12+30; B66+29+30, B66+5+30; B2+B14+B66; DL 2 intra-band plus inter-band 3CA: B2+2+5; B2+2+13; B3+3+7; B3+7+7; B3+3+20; B3+3+28; B3+3+1; B4+4+5; B4+4+13; B7+7+28; B5+66+66; B13+66+66; B66+66+2; B39+B39+B41; B39+B41+B41; B14+B66+B66 DL 3 intra-band 3CA: B40+40+40; B41+41+41; B66+66+66</p> <p>UL 2×CA: B3+3; B41+41</p>	Firewall NAT, NAT-T VPN tunneling, Port forwarding, VPN/GRE pass-through; Access control lists (IP/MAC filtering), Data origin / integrity Authentication, DMZ
Cellular Data Features*	LTE-FDD: Max 600Mbps (DL), Max 150Mbps (UL) LTE-TDD: Max 430Mbps (DL), Max 30Mbps (UL) UMTS: DC-HSDPA: Max 42Mbps (DL) HSUPA: Max 5.76Mbps (UL) WCDMA: Max 384Kbps (DL), Max 384Kbps (UL)	Management Telnet, WebUI, SNMP V1/2/3, Wireless Upgrade (HTTP/FTP), RADIUS authentication, AT Command Interface (Telnet), Microhard NMS Support, LWM2M, Data Usage Alerts, SSH
<small>*Module Standalone Laboratory Performance</small>		Diagnostics RSSI, Ec/No, Temperature, Remote diagnostics, Watchdog, UDP Event Reporting, SMS Alerts, Netflow
Ethernet	10/100/1000, Auto - MDI/X IEEE 802.3	Input Voltage 7 - 58VDC PoE (802.3af)
USB	USB 2.0 USB Tethering	Connectors: Antenna 3x SMA Female (Main, Diversity, GPS) Data RJ-45 (Ethernet) 4 PIN Interlock (Vin) USB Micro-AB SIM Nano (4FF) 1.8 / 3.0V
SMS	SMS to/from Ethernet via Telnet SMS Alerts SMS Remote Reboots	Environmental Operating Temperature -40°C to +85°C -40°F to +185°F Humidity 5-95%, non-condensing
Carrier Connection	ICMP Keep Alive, DDNS	Weight Approx. 125 grams
GPS	TCP/UDP/Email Reporting, GpsGate, TAIP GNSS Systems GLONASS, BeiDou & Galileo GPS Protocols NMEA 0183 V3.0 Acquisition Sensitivity -145 dBm (Cold-start) Tracking Sensitivity -160 dBm (Open Sky/Active-patch Antenna) Accuracy <2m CEP-50 (Open sky, 1 Hz tracking) Standalone time to first fix 1s/29s/32s (hot/warm/cold) Total number of SVs ~55 SVs	Dimensions Approx. 1.75" x 2.10" x 1.35" (45mm x 54mm x 35mm)
Network Protocols	IPv4, IPv6, TCP, UDP, TCP/IP, ARP, ICMP, DHCP, HTTP, SNMP, FTP, DNS, Modbus Slave (TCP), MQTT	Approvals FCC/IC PTCRB RoHS Compliant
Security	VPN, IPSec(IKEv1/IKEv2/ISAKMP); Multiple tunnel support (16); 3DES and up to 256-bit AES Encryption, Site to Site Tunneling, L2TP, Open VPN), GRE, HTTPS, RADIUS	Order Options
MHK119480 LTECube-CAT12		

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