



MultiTech rCell 300 Series

Managed Industrial Cellular Router supporting LTE Cat 4



MultiTech rCell 300 Series industrial-grade LTE Cat 4 edge-intelligent router, designed to securely connect multiple devices via Serial, Ethernet, or Wi-Fi to the Internet, cloud, and on-prem SCADA platforms. Key features include WAN failover, advanced firewall, routing capabilities, cloud connector and execute edge-native applications.

Featuring an intuitive user interface ideal for OT users in the field and can be managed remotely by IT admins using MultiTech Device Manager for zero-touch provisioning, policy management, application management, and hassle-free over-the-air secure firmware upgrades.

The rCell 300 is programmable and capable of running local applications written in BASH, Python, and C++ that automate and control assets, convert protocols for integration to legacy brownfield systems, cloud platforms including AWS, Azure, data analytic platforms and ERP systems.

This managed cellular router is engineered for dependable, redundant communication in critical remote monitoring systems across enterprises and mission-critical industries.

BENEFITS

- Globally certified and Carrier Approved
- Extended service life
- Remotely manage rCell router fleets with Device Manager

FEATURES

- 4G-LTE cellular with GNSS
- Dual SIM for fallback onto a second cellular network
- Dual-Ethernet ports for WAN and LAN connectivity
- Dual RS-232 and single RS-485 Ports
- Optional Wi-Fi 6, supporting up to 16 devices
- Two-year warranty with option to upgrade to three-years or five-years

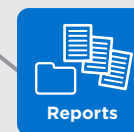
Your Devices & Data

- Energy
- Financial / Retail
- Healthcare
- Remote Monitoring

Connecting Your Devices



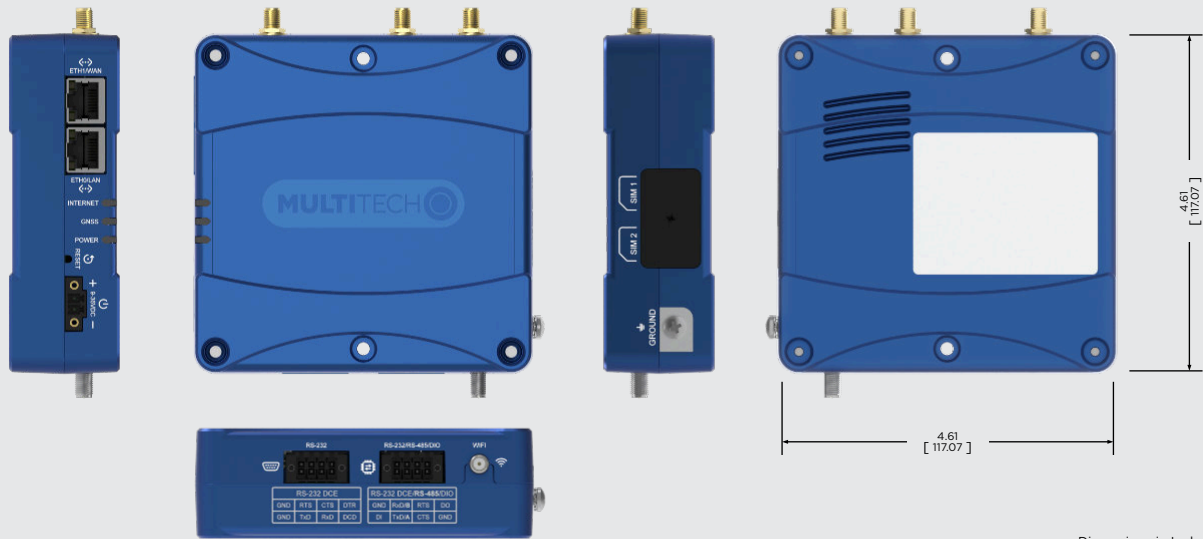
Insight + Action + Control



HARDWARE DESCRIPTION

MultiTech rCell 300 Series

Cellular router supporting LTE Cat 4



Dimensions in Inches [mm]

Move task execution to the edge with managed edge-native applications that enhance security, reduce latency, and lower operational costs.

mPower™ Edge

Intelligence embedded
software delivers

mPower
EDGE INTELLIGENCE

programmability, network flexibility, enhanced security and manageability for scalable Industrial Internet of Things (IIoT) solutions. mPower simplifies integration with a variety of popular upstream IoT platforms to streamline edge-to-cloud data management and analytics, while also providing the programmability and processing capability to execute critical tasks at the edge of the network to reduce latency; control network and cloud services costs, and ensure core functionality – even in instances when network connectivity may not be available.

Security

The rCell 300 Series of cellular routers use IPSec industry standard data encryption to provide high performance, secure LAN-to-LAN VPN connections with 3DES or AES encryption using IKE and PSK key management. Support for five concurrent VPN tunnels. Additionally a private, secure digital signature with integrity check update technique is now

available, minimizing file damage, tampering or loading of invalid firmware. MultiTech signs and distributes firmware updates through a secure standard firmware distribution process and verifies the firmware signature before installation of the firmware for maximum device integrity.

Cloud-based IoT Device Management

MultiTech Cloud Services augment our hardware products by reducing time and costs to manage your fleet of rCell 300 Series routers remotely, such as:

Automatically get rCell 300 device identifiers and keys pushed to your solution via API when devices are shipped.

Your devices are automatically added to your MultiTech account if you buy directly through us. When purchasing the rCell 300 through one of our elite distributors, devices can be onboarded to your MultiTech Cloud account by scanning a QR code on the label.

Manage fleet firmware and configuration updates, (e.g. cellular SIM profiles by device groups or regions).

Monitor fleet cellular data costs, and troubleshoot device health such as signal strength with device logs in the cloud. No vendor lock-in: pipe data to your preferred cloud provider.

HARDWARE SPECIFICATIONS

Models	MTR3-L4G2D
Regions	Australia / Canada / European Union / United Kingdom / United States
Performance**	3GPP Release 10 4G-LTE FDD/TDD Category 4 150 Mbps peak downlink 50 Mbps peak uplink with 3G/2G fallback
Frequency Band (MHz)	4G LTE FDD (Europe): B3(1800), B7(2600), B8(900), B20(800) 2G (Europe Fallback): B2(1900), B3(1800), B5(850), B8(900) 4G LTE FDD (AT&T): B2(1900), B4(AWS1700), B12(700), B14 (700-FirstNet) † 4G LTE FDD (Verizon): B4(AWS1700), B13(700) 4G LTE FDD (Anterix): B8-US(900) 4G LTE FDD (APAC): B1(2100), B9(1800), B18(800), B19(850), B26(850), B28(700) 3G: B1(2100), B2(1900), B4(AWS1700), B5(850), B6, B8(900), B19(850) 2G: B2(1900), B3(1800), B5(850), B8(900) 4G LTE FDD Bands: B25(1900)
SMS	Mobile Originate, Mobile Terminated, Point-to-Point
Wi-Fi (AC00PA models)	802.11abgn (2.4 & 5 GHz)
GNSS (all models)	GNSS Connections: 3 / GNSS Systems Supported: (default: concurrent GPS/QZSS/SBAS and GLONASS)
Connectors	
Connectors (AC00PA Models)	Antenna: (4) SMA (cellular, auxiliary, GNSS, Wi-Fi) SIM: (2) Mini SIM (2FF) 1.8V & 3V (under SIM door) RS-232: (1) 8-wire terminal connector RS232/RS485/DIO: (1) 8-wire terminal connector 9-36 VDC: (1) 2-wire terminal connector (power) RESET: (1) Push-button reset switch ETH0/LAN: (1) Ethernet RJ45 (10/100 BaseT) ETH1/WAN: (1) Ethernet RJ45 (10/100 BaseT)
Connectors (AC00QA Models)	Antenna: (3) SMA (cellular, auxiliary, GNSS) SIM: (2) Mini SIM (2FF) 1.8V & 3V (under SIM door) RS-232: (1) 8-wire terminal connector RS232/RS485/DIO: (1) 8-wire terminal connector 9-36 VDC: (1) 2-wire terminal connector (power) RESET: Push-button reset switch ETH0/LAN: (1) Ethernet RJ45 (10/100 BaseT) ETH1/WAN: (1) Ethernet RJ45 (10/100 BaseT)
Physical Description	
Dimensions (L x W x H)	117.07 x 117.07 x 38.10 mm / 4.61 x 4.61 x 1.50 (inches)
Weight	0.5 Kg / 1 Lb
Chassis	Aluminum (Designed for IP30)
Mounting Options	Desktop / Wall mount (Using WALL-MOUNT accessory) / DIN rail mount (using DIN-MOUNT accessory)
Power Requirements	
Input Power	9 - 36 VDC
Power Draw (AC00PA Models) @ 9VDC	Sleep Mode: N/A Idle: 181 mA Max Power: 550 mA (average)
Power Draw (AC00QA Models) @ 9VDC	Sleep Mode: N/A Idle: TBD mA Max Power: TBD (average)
Environmental	
Operating Temperature****	-40° to +75° C (-40° to +167° F)
Storage Temperature	-40° to +85° C (-40° to +185° F)
Relative Humidity	15% - 93% RH non-condensing
Certifications	
EMC and Radio Compliance	CE, FCC, IC, RCM, UKCA
Safety Compliance	UL/cUL 62368-1 3rd Edition IEC 62368-1 3rd Ed including IP30 AS/NZS 62368.1 3rd Edition
Network Compliance	PTCRB
Network Operator	AT&T, Verizon
Quality	MIL-STD-810G: High Temp, Low Temp, Cold Dwell, Random Vibration and Sine Vibration SAE J1455: Random Vibration and Sine Vibration
Warranty	2-Year warranty, option to upgrade to 3-years or 5-years / www.multitech.com/legal/warranty

* See device guides or AT command guides for additional information.

** Actual performance speeds may be affected by a variety of attributes such as cell tower distance, data loads, packet sizes, etc.

*** For SMS solutions when using the Verizon cellular network, contact a MultiTech sales representative)

**** Device has been tested up to +75° C. UL Recognized @ 40° C, limited by AC power supply. UL Recognized @ 75° C when used with customer-provided DC power cable (see hardware guide for power cable requirements)

***** Actual performance speeds may be affected by a variety of attributes such as cell tower distance, data loads, packet sizes, etc.

† All future end-user (OEM) devices will and must go through FirstNet certification prior to being included in the FirstNet device ecosystem.

ORDERING INFORMATION

rCell 300 Series 4G-LTE Global Models

Model	Description	Region
MTR3-L4G2D-AC00PA-EWM	LTE Cat 4 Cellular Router with Fallback. Includes GNSS, Wi-Fi, and Accessories. Accessory Kit #1	Global
MTR3-L4G2D-AC00QA-EWM	LTE Cat 4 Cellular Router with Fallback. Includes GNSS and Accessories. Accessory Kit #2	Global
MTR3-L4G2D-AC00PA-11M	LTE Cat 4 Cellular Router with Fallback. Includes GNSS and Wi-Fi. Accessories available separately. Accessory Kit #3	Global
MTR3-L4G2D-AC00QA-11M	LTE Cat 4 Cellular Router with Fallback. Includes GNSS. Accessories available separately. Accessory Kit #3	Global

ACCESSORY KIT SPECIFICS

Accessory kits differ by model number.

Accessory & Kit Number	1	2	3
Power Supply	(1)	(1)	
Power Blade(s)	(4) AU/NZ, EU, GB, US	(4) AU/NZ, EU, GB, US	
Cellular Antenna	(2)	(2)	
Wi-Fi Antenna	(1)		
GPS/GNSS Antenna	(1)	(1)	
Ethernet Cable	(1)	(1)	
Terminal Block 2 (Power)	(1)	(1)	(1)
Terminal Block 8 (Serial, GPIO)	(2)	(2)	

ADDITIONAL ACCESSORIES

Model	Description	Region
PS-12VCB-SWC-U-GLOBAL	100-240VAC/12VDC Power Supply Stripped Wire Connection • Includes (4) power blades (Australia/New Zealand, Canada/United States, European Union, United Kingdom)	Global
ANLTE7-XHRA	LTE Antenna, 7.75" (2 dBi) • Available in single-pack, 2-pack, 10-pack, and 50-pack options • X = Pack Quantity	Global
ANWBT3-XHRA	WiFi/BT Antenna, 2.4 GHz/5.0 Ghz • Available in single-pack, 10-pack, and 50-pack options • X = Pack Quantity	Global
ANGPS-XMM	GPS/GNSS Antenna, Magnetic Mount with 5-meter cable • Available in single-pack, 10-pack, and 50-pack options • X = Pack Quantity	Global
TBC-2-X	Terminal Block Connector - 2-wire • Used for power connection to the device • X = Pack Quantity	Global
TBC-8-X	Terminal Block Connector - 8-wire • Used for GPIO and serial connections • X = Pack Quantity	Global
DIN-MOUNT-X	DIN Rail Mounting Kit • Includes device bracket, DIN rail clip, and screws • X = Pack Quantity	Global
WALL-MOUNT-X	Wall Mounting Kit • Includes device bracket and screws • X = Pack Quantity	Global
CA-RJ-45	Replacement Ethernet Cable • RJ-45 cable, 6 feet	Global

Note: Global includes Australia, Canada, European Union, United Kingdom, United States
Use ordering codes for specific build options. Go to www.multitech.com for detailed product model numbers.

Produced in the U.S. of U.S. and non-U.S. components. Features and specifications are subject to change without notice.

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Services & Warranty

MultiTech's comprehensive Support Services programs offer a full array of options to suit your specific needs. These services are aimed at protecting your investment, extending the life of your solution or product, and reducing total cost of ownership. Our seasoned technical experts, with an average tenure of more than 10 years, can walk you through smooth installations, troubleshoot issues and help you with configurations.

Technical Support Services

At MultiTech, we're committed to providing you personalized attention and quality service while providing you a quick response to your product support needs. We have several options of support for you to choose from.

For additional information on Support Services as well as other service offerings, please contact your MultiTech representative or visit www.multitech.com/support.go

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