RockREMOTE Rugged



Secure and Flexible IoT Data Transmission from Harsh Environments

RockREMOTE Rugged has tough outer protection and tested resilience to ensure reliable data connectivity for both mobile and static use cases. Securely connecting your remote IoT assets and using IP or message-based protocols, it provides diverse connectivity through Iridium Satellite or LTE networks. Whether over water, crossing a variety of terrains, or in permanent installations in challenging conditions, RockREMOTE Rugged delivers data gathering, transfer, backhaul, and management capabilities for your global satellite IoT project.

Key Features

Ruggedised Exterior Casing: RockREMOTE Rugged casing is rated IP67 and compliant with stringent health, safety and environmental requirements Global Connectivity from Iridium Satellite Network: Combining the Iridium LEO network, Certus 100 and least cost data routing over cellular LTE, ensures connectivity that matches your application needs from anywhere in the world

IMT Option - Optimised Data Transfer: With Iridium Messaging Transfer (IMT) service there is no TCP/IP or MQTT overhead - only pay for sending your message payload. Integrated lossless compression further reduces the IoT payload. For small messages, there is up to 90% cost saving versus Certus IP Solution Flexibility and Evolution: Equipped with a range of physical serial, digital and LAN connectivity options, the RockREMOTE Rugged is designed to connect a wide range of measuring and monitoring sensor devices. It both solves short-term challenges and will adapt to your application needs over time

Physical & Environmental

Satellite Transceiver LTE Cellular Module Device Size Weight Form Factor IP Rating Vibration Rating Operating Temperature EMC Compliance Power Cabling Iridium Antenna Iridium Certus 9770 Transceiver Regional specific variants 250mm x 97mm x 61mm (LxWxH) 1.2kg Aluminium casing IP67 EN 300 019-2-5, EN 300 019-2-7 -40C to +70C CE & FCC & IC 1 x 2M power cable with cut end 95mm diameter x 191mm height, pole mounted omnidirectional antenna, and 1 x 0.7M antenna cable, including connectors

Electrical Power

Voltage Required10 to 3Power Consumption0W (sl

10 to 30V DC OW (sleep), 5W (idle), 9W (average transmit)

Interfaces

Circular 12pinSerial & Input/OutputCircular 3pinDC Power & Sleep controlCircular 8pinEthernet (2M terminated cable provided)SMA Connector toCellular, GNSS, Wifi. (TNC cable assembly toExternal Antennassupplied Certus antenna)SIM Card SlotStandard (2FF) x 2 , (Satellite & Cellular)

Supporting RockREMOTE

Cellular Antenna	Optional external LTE antenna
Mounting	The device is designed with pre-drilled fixing holes,
	allowing for easy mechanical fastening to other
	structures. Optional mounting brackets can be
	purchased for mechanical fixing to a bulkhead
	or pole
Developer Documentation	Use our support hub for set up and everything you need to get your project up and running

Compute Module

Processor	Quad Core 1.5GHz
Memory	2GB RAM, 8GB Flash
Operating System	Linux based
Protocol Facades	For MQTT and FTP

Communications

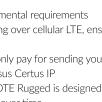
Iridium Certus 100	TCP/IP: 22Kbps up / 88Kbps down. LTE failover
Iridium Messaging	Data transfer packet size from 1 to 100,000
Transport (IMT)	bytes, providing flexibility to meet varied data requirements
Cellular	LTE Cat 1 and Cat 4. Automatic WAN failover
GNSS Wifi	GPS, Glonass, Bei-dou, Galileo, QZSS 2.4 GHz, IEEE802.11 b/g

Controls and Monitoring

Cloudloop	Manage and monitor your device and delivery network with our cloud-based platform, providing real-time data-driven insight. Giving you the capability to monitor
RockREMOTE DashBoard	and manage data usage and billing across all devices Local web based configuration and management interface

Related Products

RockBLOCK 9603	The smallest and lightest version in the SBD RockBLOCK family. Powered via USB or
	direct-header connection
RockREMOTE	Mid-range IoT device utilising Iridium Certus
	100 to transmit multiple sensors' data or
	compressed images. Designed for use within
	an enclosure





UK +44 (0) 1452 751 940