ROCK SEVEN
LOCATION TECHNOLOGY

iridium

RockBLOCK 9603 can send & receive short messages from anywhere on Earth with a view of the sky.

- Plug and play satellite communication
- Available as a PCB for product integration
- Full 2-way communication system - just 45x45x15mm
- Integrated antenna and power conditioning
- Optional external antenna connector (SMA)
- Truly global operation, using the Iridium satellite network
- Data arrives via e-mail, or directly to your own web-service via HTTP POST

"Incredibly easy to integrate! We added cost effective two-way global comms to our existing monitoring product in hours.

This product gives us the ability to monitor remote equipment for a fraction of the cost of other solutions."



RockBLOCK Device Costs		Price
RockBLOCK 9603		
Option to purchase with either onboard antenna or SMA connector		
Accounts can have more than one device per account, and pool credits between devices		
Monthly Line Rental		**£10.00**
There is no minimum contract, simply per month when you need to use the RockBLOCK		
Credits (used for messages transferred, 1 credit per 50 bytes sent/received)		
Bundle	Price Per Credit	Bundle Price
500 Credits	£0.09	£45.00
1000 Credits	£0.08	£80.00
2000 Credits	£0.07	£150.00
5000 Credits	£0.07	£300.00
10,000 Credits	£0.05	£500.00
20,000 Credits	£0.04	£800.00
50,000 Credits	£0.03	£1500.00
50,000+ Credits	Further discounts available...	
Volume discounts available for over 10 units - please ask for details		

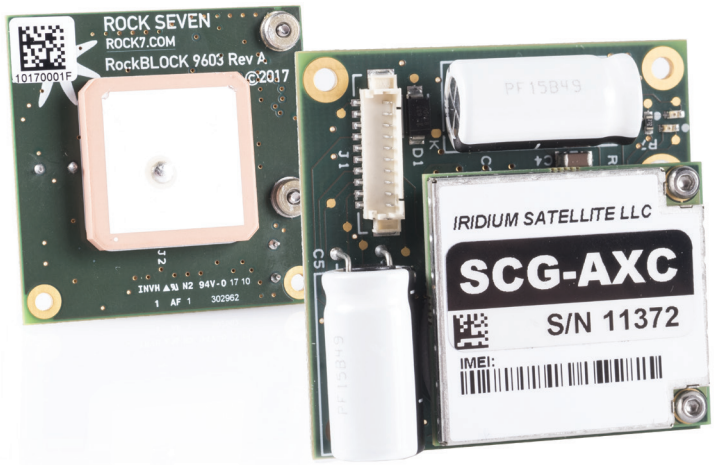
1 credit is used per 50 bytes in a message to/from a RockBLOCK
Credits do not expire unless no monthly fees have been paid for 12 months
All prices subject to VAT and/or any local taxes applicable to your state or country.

Key Functionality

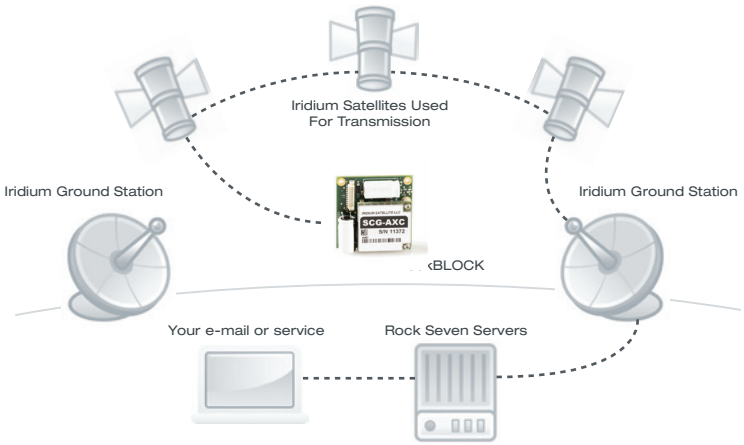
Coupled with our intuitive web-based control panels and your services:

- Power Requirements – RockBLOCK 9603 runs on a 5v DC power input & also has the ability to run from a 3.7v DC LiPo/LiIon source. It requires a minimum of 100mA for operation, but has a sleep state to conserve power between transmissions if required.
- Message Sizes – You can send up to 340 bytes from a RockBLOCK and up to 270 bytes to a RockBLOCK per message.
- Data Interface – RockBLOCK 9603 has a UART interface, exposed on the header connector. Other lines are also exposed such as the 'sleep' and 'ringalert'. FTDI/USB cables can be purchased to allow you to access the RockBLOCK via a USB port.
- How to Integrate – The RockBLOCK appears as a serial interface, and you can control it using a simple set of AT commands. It is expected that you'll be able to integrate it into your own software with minimal effort
- Message Delivery – Messages sent from RockBLOCK can either be delivered to your chosen email address, or sent to your own web service as a simple HTTP POST.
- Sending Data – You can make a simple HTTP POST to our web service. The message is queued on the satellite network almost instantly, ready for RockBLOCK to download (on your command)
- Costs and Contracts – Please see the table to the left for costs. There is a monthly cost, plus the system uses 'credits' to send and receive messages. There are no annual contracts, you simply pay-as-you-go.

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How does the RockBLOCK work?



The RockBLOCK allows you to send and receive short messages from anywhere on Earth with a clear view of the sky. It works far beyond the reach of WiFi and GSM networks.

Maybe you want to transmit weather information from mid-ocean? Or use it to send telemetry data back from an oil well in the middle of the desert. RockBLOCK 9603 is designed to be integrated into products to enable two-way communication from anywhere on Earth.

RockBLOCK takes its power via the header connector, or alternatively via an optional FTDI/USB cable. From a power usage perspective your host needs to supply a minimum of 100mA @ 5v DC although you can also run the unit directly from a LiPo/LiIon battery.

At the heart of RockBLOCK is an Iridium 9603 modem. The RockBLOCK hosts the 9603 and provides it with an antenna, and its power supply requirements. It exposes the modem's serial interface via a Molex connector.

Iridium is the only satellite network that allows transmission of information from any point on Earth – other networks have no coverage in the polar regions, and have intermittent or no coverage in other marine and land areas.

Iridium has 66 satellites in orbit around the Earth, allowing coverage anywhere on Earth 24 hours a day, 7 days a week. No other satellite network has truly global coverage. Messages sent via Iridium take just seconds to arrive, via e-mail or HTTP POST directly to your web-service.

Physical Properties

RockBLOCK Naked	45.0 x 45.0 x 15.0mm
Mounting Holes	Two on PCB
Header Connector	Molex 51021

Environmental Properties

Storage Temperature	-40 to 85 deg C
Operating Temperature	-40 to 85 deg C
Operating Environment	< 75% Relative Humidity
Testing	CE FCC Iridium Approval

Power

RockBLOCK 9603	5v DC, 100mA minimum
Power Consumption	max 450mA (100mA required)
Power & I/O	Direct Header or FTDI/USB

Communication

Iridium Modem	9603 short burst transceiver
Iridium Antenna	1621Mhz tuned patch antenna

Product Options

RockBLOCK 9603 - PCB with on-board antenna
RockBLOCK 9603 - PCB version with SMA connector

Reseller Information (add your sticker here)

For more information, technical product details and PDF downloads please visit our website at:
http://www.rock7.com

Disclaimers:

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