

Production Information:

RockSTAR



The RockSTAR is a lightweight, 2 way messaging and tracking device. Utilizing the powerful Iridium satellite network, world coverage is achieved ensuring that you are kept safe at all times. Ideal for use in extreme environments where WIFI or cellular coverage is not widely available.

Key features of the RockSTAR



Size

Weighing in at only 305 grams/10.7oz the RockSTAR is extremely light but exceptionally strong due to its ruggedised, waterproof casing.



Functionality

5 large buttons plus a specific alert button allows easy access regardless of the environment and makes it easier when wearing gloves or with cold, wet hands. The bright OLED screen ensures messages can be seen in any climate. The rubberised casing helps in wet conditions.



Tracking

The RockSTAR can be preset to report your position at a time interval of choice, from 5 seconds to 12 hours. The Waypointing function also allows you to mark key points on the map. This gives you peace of mind and those back at base when you are far from home.



Messaging

With 2 messaging options, the RockSTAR has your needs covered. Preset messages can be used to send to mobile phones or email address. Ideal when sending from remote locations when urgency is required. Alternatively link the RockSTAR to a Bluetooth device, like your phone, and send more complicated messages. Social Media can even be updated – keeping your fans and followers updated with your progress even from the middle of the desert!



Security

The Alert button will automatically send a message back to a nominated contact if you are in danger. For greater security there are several built in alerts such as temperature, battery life, dead mans switch and timer.



Battery Power

The battery will last for up to 3 weeks on one charge – this equates to over 2500 transmissions. It can be charged via the USB cable from an external power supply.



Additional Accessories

The RockSTAR comes with a range of additional accessories to suit the environment that you will be operating in. These include an arm aquapack, cigarette charger, additional USB cabling, mounting and a soft pouch.

Satellite Networks

The RockSTAR utilises the power of the Iridium satellite network combined with GPS. Iridium is the only satellite network that offers 24/7 transmission from any point on Earth including the polar regions.

Specifications

Technical Data

Environmental Properties

Storage Temperature	-40 to 85 degrees C
Operating Temperature	-30 to 60 degrees C
Operating Environment	< 75% Relative Humidity

Testing	MIL-STD-810G for vibration, temperature and shock IP67. Sealed against dust and water ingress to immersion of 1m
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Power

Input Voltage	USB (5v)
Power Consumption	Tx/Rx: 8W Max
Battery	LiPo cells, 5.3Ah
Power I/O	USB

Communications

Iridium Modem	9602 short burst transceiver
Iridium Antenna	Maxtena helical antenna
GPS Antenna/Chip	uBlox GPS chipset

Battery

- Up to 12 months transmitting once per day
- Up to 3 months transmitting once per hour
- Up to 3 weeks transmitting every 15 minutes

(Actual battery life will depend on the environment and usage patterns)

GPS

Receiver Type	50 Channel
Update Rate	Up to 4Hz position update rate
Time to First Fix	<1s hot, <20s warm, <60s cold
Sensitivity	-160dBm



Physical Properties

Dimensions	144 x 76 x 36mm (plus antenna) 5.7 x 3 x 1.4" (plus antenna)
Weight	305 grams / 10.7oz
Screen	Single Colour OLED 26 x 35mm

Solutions

Ground Control are not just here to sell a product but to offer you the solution to your data transfer needs. We can offer a full project solution package to ensure that the RockSTAR (or other Ground Control product) works in the most effective way for your project. Your Ground Control Account Manager can provide further details.

Costs and Contracts

With no annual contract the RockSTAR is easy to just plug and go. A rolling monthly charge and credit 'bundles' offer you great value for money.

For projects requiring multiple RockSTARs there may be more cost-effective options using the Ground Control Cloudloop system to manage your units. Your Ground Control Account Manager will be able to recommend the best solution.

Disclaimer: The Iridium logo and word, Arduino word, and Raspberry Pi word are registered trademarks of their respected owners.