

## R-35 Asset/Personal/Vehicle Tracker



### Features

- Up to 5,000 location / activation messages can be saved (automatic)
- Built-in motion sensor
- Timer backup battery will last up to 5+ years without battery or external power connected
- 18 Pin mini multi I/O connector
- Highly accurate uBlox LEA5S GPS module
- Stand-by time up to 3 yrs (deep sleep mode)
- Stop-motion or movement alert/buzzer
- Location reports at particular date/day/times
- External battery/solar panel interface
- Panic button and panic input
- 1 digital input, 1 analog input / digital input (configurable)
- Built-in speaker & microphone
- Optional waterproof box and I/O cable set

## Specifications

<b>Mechanical &amp; Environmental</b>	
Dimensions (L x W x H)	90.4 x 38.4 x 15.1 mm (18.25 max)
Weight	58.2 g
Operating Temperature	25 ~ + 70° C (board temperature)
Storage temperature	-40° C to +80° C
Material	Plastic (Waterproof if required)
Buttons	1 On/Off switch / 1 Motion switch / 1 Panic
I/O	1 Multi I/O connector (18 pin + locking pins)
<b>Electrical Characteristics</b>	
Input Voltage	+ 5 Volt DC regulated (USB port power)
Power Consumption	Depending on operating mode - between 10 hours and 3 years when using 800 mA battery*
<b>GPS Specifications Ublox-LEA-5S chipset</b>	
<b>Receiver Type</b>	
50 Channels	
GPS L1 frequency C/A Code	
GALILEO Open Service L1 frequency	
<b>Time-To-First-Fix</b>	
Cold Start (Autonomous) 29 s	
Warm Start (Autonomous) 29 s	
Hot Start (Autonomous) <1 s	
<b>Sensitivity</b>	
Tracking & Navigation -160 dBm	
Re-acquisition -160 dBm	
Cold Start (Autonomous) -144 dBm	
Horizontal Position Accuracy	Autonomous < 2.5 m SBAS < 2.0 m

<b>Velocity Accuracy</b>	0.1 m/s
<b>Heading Accuracy</b>	0.5 degrees
<b>Dynamics</b>	≤ 4 g
<b>Operational Limits</b>	Velocity 515 m/s (1000 knots)
<b>Power Use</b>	
<b>Battery</b>	960mA/ 3.7 volt
<b>GSM/GPRS Specifications:</b>	
<b>Electrical Characteristics</b>	
<b>Frequency bands</b>	<ul style="list-style-type: none"> <li>▪ Tri-band or Quad-band (American markets ONLY / optional)</li> <li>▪ Compliant to GSM Phase 2/2+</li> </ul>
<b>GSM class</b>	Small MS
<b>Transmit power</b>	<ul style="list-style-type: none"> <li>▪ Class 4 (2W) at EGSM 900</li> <li>▪ Class 1 (1W) at DCS1800 and PCS 1900</li> </ul>
<b>GPRS connectivity</b>	<ul style="list-style-type: none"> <li>▪ GPRS multi-slot class 8 (optional)</li> <li>▪ GPRS multi-slot class 10 ( default)</li> <li>▪ GPRS mobile station class B</li> </ul>
<b>DATA GPRS CSD</b>	<ul style="list-style-type: none"> <li>▪ GPRS data downlink transfer: max. 85.6 kbps</li> <li>▪ GPRS data uplink transfer: max. 42.8 kbps</li> <li>▪ Coding scheme: CS-1, CS-2, CS-3 and CS-4 Supports the protocols PAP (Password Authentication Protocol) usually used for PPP connections.</li> <li>▪ Integrates the TCP/IP protocol.</li> <li>▪ Support Packet Switched Broadcast Control Channel (PBCCH)</li> <li>▪ CSD transmission rates: 2.4, 4.8, 9.6, 14.4 kbps, non-transparent</li> <li>▪ Unstructured Supplementary Services Data (USSD) support</li> </ul>
<b>SMS</b>	<ul style="list-style-type: none"> <li>▪ MT, MO, CB, Text and PDU mode</li> <li>▪ SMS storage: SIM card</li> </ul>
<b>SIM interface</b>	Supports SIM card: 1.8V ,3V
<b>Audio features</b>	<p>Speech codec modes:</p> <ul style="list-style-type: none"> <li>▪ Half Rate (ETS 06.20)</li> <li>▪ Full Rate (ETS 06.10)</li> <li>▪ Enhanced Full Rate (ETS 06.50 / 06.60 / 06.80)</li> <li>▪ Echo suppression</li> </ul>

## Ordering Information