ZENDUIT

ZenRemora

CELLULAR 2G OR 4G LTE-M / NB-IOT

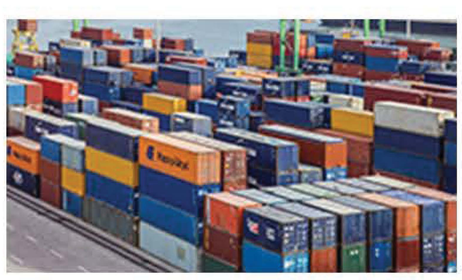
FEATURES

- High-precision GPS/GLONASS tracking device
- Weatherproof and ultra-rugged IP67 Nylon Glass Housing with compact and ergonomic design
- Powered by 2 x D LTC Batteries with up to 10 years battery life and extreme temperature tolerance
- Built-in Battery Meter for remote Battery Life Monitoring and Remaining Life Predictions
- Bluetooth® 5.0 Gateway for tagged asset management and sensor monitoring
- Accelerometer for Smart Movement Based Tracking
- Magnetic Tamper Detect

OVERVIEW

Ultra-rugged, long-life battery-powered GPS tracking device and Bluetooth® Gateway with up to 10 years of battery life and tamper detect for long-term asset tracking, sensor and tag monitoring, theft recovery, and more.

APPLICATIONS



Asset Tracking

Theft Recovery

Bluetooth® Low Energy Gateway

Tamper Detection

Run Hours Monitoring

Preventative Maintenance

DATASHEET

Learn more at www.zenduit.com

CONNECTIVITY

2G	2G: SARA-G350-02S-01 850/900/1800/1900 MHz
4G LTE-M / NB-IoT	uBlox SARA-R410M Modem operates on all major global LTE-M and NB-IoT bands. Supported LTE bands: 1*, 2, 3, 4, 5, 8, 12, 13, 18, 19, 20, 26*, 28 (*roaming bands)
BLUETOOTH® 5.0 GATEWAY	Bluetooth 5.0 gateway reports nearby Bluetooth tags and sensors for affordable tagged asset management and sensor monitoring.
SIM SIZE & ACCESS	Internal Nano 4FF SIM

BATTERIES

USER-REPLACEABLE BATTERIES	2 x D Cell (3.7V per cell)
BATTERY LIFE	Up to 10 years of battery life at once-daily heartbeats / 5 year battery life at once-hourly heartbeats.
SUPPORTED BATTERY TYPES	Lithium Thionyl Chloride (LTC)

LOCATION

MODULE	uBlox EVA-M8
CONSTELLATION	Concurrent GPS / GLONASS
CHANNELS	72 Channel High Sensitivy Receiver
TRACKING SENSITIVITY	-167dBM industry-leading tracking performance
ASSISTNOW OFFILINE	GNSS aiding data (such as ephemeris, time, coarse position) for a faster Time To First Fix (TTFF).
LOW NOISE AMPLIFIER	GPS signals are boosted by a unique low-noise amplifier (LNA) allowing operation where other units fail.
CELL TOWER LOCATION	Cell tower fallback for positioning when GPS fails.

POWER

INPUT VOLTAGE	5-16V DC
SLEEP CURRENT	<10uA* *Average current in lowest power configuration

MECHANICS/DESIGN

DIMENSIONS	L 224 X W 91 x H 41 mm
WEIGHT	443g
HOUSING	Ultra-Rugged Nylon Glass
IP RATING	IP67 rated housing ensures device can withstand fine dust, high-pressure spray, submersion for 30 mins in 1m of water, and extreme temperatures.
INSTALLATION	Compact and concealable. Multiple installation options for covertly and easily securing the device to assets with screws, bolts, cable ties, rivets, and more.
OPERATING TEMPERATURE	-20°C to +60°C For operation in extreme temperatures use LTC Batteries.
GPS ANTENNA	Internal
CELLULAR ANTENNA	Internal
3-AXIS ACCELEROMETER	3-Axis Accelerometer to detect movement, acceleration, high G-force events, and more.
DIAGNOSTIC LED	Diagnostic LED signifies operation status.
FLASH MEMORY	Store weeks of records if device is out of cellular coverage. Storage capacity for over 10 days of continuous 30-second logging.

SMARTS

AUTO-APN	Auto-APN allows the device to analyze the SIM card and select the correct APN details from a list that is pre-loaded in the device's firmware.
BATTERY LIFE MONITORING	Built-in Battery Meter for monitoring battery use and remaining life predictions.
GEOFENCING	Create custom geofences and alerts if an asset enters or leaves specific locations.
GEOFENCE DOWNLOAD TO DEVICE	Geofences can be downloaded directly to the device from Telematics Guru for enhanced location-based actions and alerts. Maximum of 100 Geofences with up to 100 points per geofence.
IMPACT DETECTION	Configure impact-detection alerts when g-forces are exceeded by a user-defined threshold.
PERIODIC OR MOVEMENT-BASED	Configure parameters to send updates based on set time intervals (1x, 3x, 5x a day, etc) or when movement occurs. Adaptive tracking technology detects when the device is on the move and increases the update rate, providing detail when you need it while conserving battery when stationary.
PREVENTATIVE MAINTENANCE	Set reminders based on distance traveled and run hours to reduce maintenance and repair costs.
THEFT RECOVERY	Switch to Recovery Mode in the case of theft or loss to activate real-time tracking at 30-second intervals for asset retreival.
RUN HOUR MONITORING	Capture run hours based on movement to understand and optimize asset utilization.
SLEEP MODE	Stationary devices enter sleep mode, switching the update rate to only twice per day until movement occurs to conserve battery life and optimize data usage.
TAMPER ALERTS	Magnetic tamper switch provides an instant alert if the device is removed from your asset.
TILT DETECTION	1-axis angle reporting, tip detection and rotation counting.

DEVICE MANAGEMENT

FLEXIBLE CONFIGURATION	Configure device parameters such as heartbeat rate, movement and accelerometer settings, and more to fit any tracking application.
OEM SERVER	Manage, monitor, configure, debug, update, and restart devices remotely from our cloud-based device management system.

INTEGRATION

THIRD-PARTY INTEGRATION	Webhook, TCP or HTTPS, Direct and Data Splitting Integration Options

SECURITY

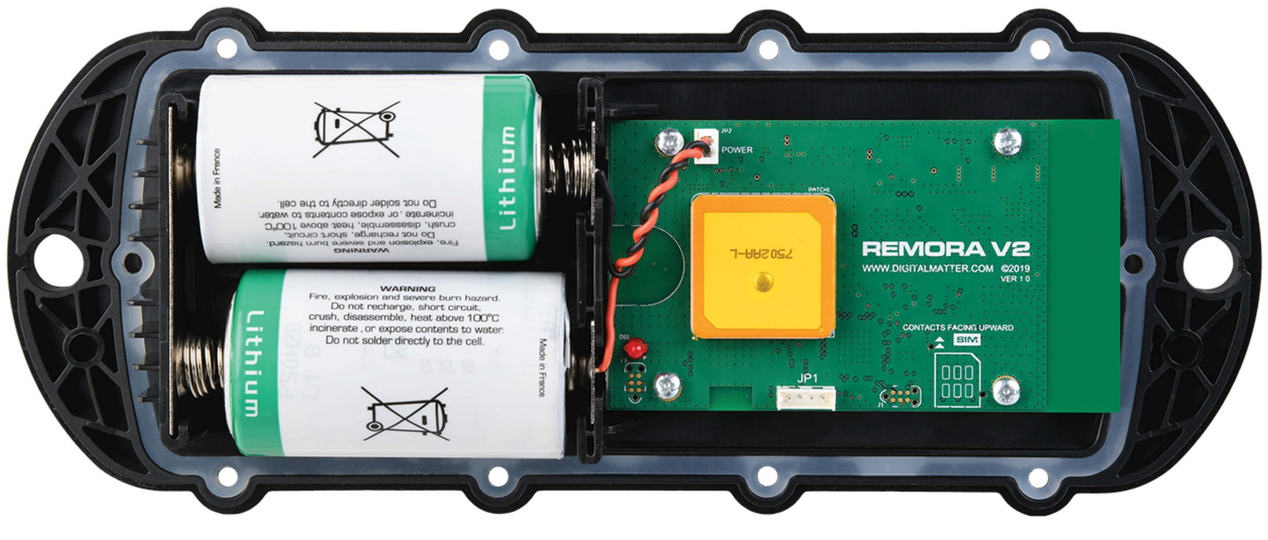
DATA SECURITY	Military-level AES-256 Encryption from device to OEM Server to protect the integrity and confidentiality of telematics data. Data forwarded to third-party systems is sent via HTTPS for end-to-end security.

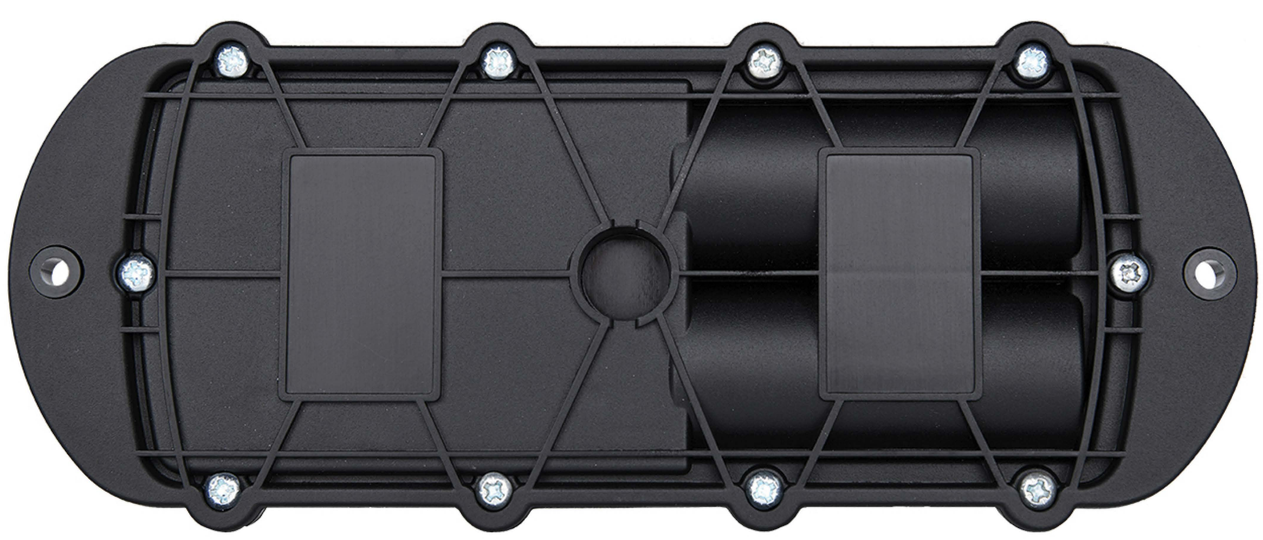
WARRANTY

MANUFACTURER'S WARRANTY	One year manufacturer's warranty.

CERTIFICATIONS

Please contact us for a full list of compliance specifications and documentation for your region.	**4G** - FCC, ISED, ACMA (DoC), Bluetooth® Certified, VERIZON, CE (DoC) **2G** - ICASA, Bluetooth® Certified, CE (Doc)





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