# **BOLT2**

Cellular LTE-M (Cat-M1) / NB-IoT



- High-performance, high-precision GPS tracking device
- Plugs into existing OBDII ports for real-time vehicle and fleet tracking
- Supports driver safety and behavior monitoring with accident and rollover detection
- Backup battery in case of loss of power or tampering













Real-Time Tracking Plug and Play End-to-End Security Highly Configurable Future Proof Connectivity White-Label & Integration Ready

#### **Asset Visibility & Recovery**

Monitor location and movement with the option to activate real-time tracking in case of loss or theft.

### **Real-Time Tracking**

Device remains continuously connected while on the move for real-time vehicle tracking.

#### **Tamper Alerts**

Receive notification when device is unplugged or loses power.

### **Accident Detection**

Alerts for accidents and rollovers, activated by significant changes in velocity and orientation.

#### **Driver Safety & Behavior**

Monitor speeding, harsh acceleration, braking, cornering, and more.

#### **Geofence Alerts**

Receive notification if asset enters or exits designated locations.

### **Run Hour Monitoring**

Calculate run hours and distance travelled (odometer) to optimize asset utilization.

#### **Preventative Maintenance**

Set reminders based on distance travelled and run hours to maintain asset health.

### **Backup Battery**

Features an internal backup battery in case of loss of power or tampering.

### FLEET MANAGEMENT | VEHICLES | EQUIPMENT | LEASING | INSURANCE | COMPLIANCE

# Connectivity

| Cellular Module     | Nordic nRF9160 operates on all major global LTE-M and NB-IoT bands.                       |
|---------------------|---|
|                     | Supported LTE bands:  |
|                     | LTE-M (Cat-M1): B1, B2, B3, B4, B5, B8, B12, B13, B14, B18, B19, B20, B25, B26, B28, B66  |
|                     | NB-IoT (Cat-NB1/NB2): B1, B2, B3, B4, B5, B8, B12, B13, B17, B19, B20, B25, B26, B28, B66 |
| SIM Size and Access | Internal Nano 4FF SIM   |

### Location

| GNSS Module         | u-blox M10  |
|---------------------|---|
| Constellations      | Concurrent GPS, GLONASS, BeiDou, Galileo  |
| GNSS Assistance     | GNSS almanac and ephemeris data for greater sensitivity and position accuracy.  |
| Low Noise Amplifier | GPS signals are filtered and boosted by a SAW filter and low-noise amplifier (LNA) allowing operation where other units fail. |
| Location Accuracy*  | ~2m CEP   |

<sup>\*</sup> Positioning accuracy specifications are provided by the module supplier and reflect ideal conditions. Device configuration, installation, environmental conditions, augmentation services, and many other factors may lead to variations in positioning accuracy.

### **Power**

| Input Voltage       | 8-33V DC (max). OBDII connector draws power from vehicle's OBD port.  |
|---------------------|---|
| Self-Resetting Fuse | Built-in self-resetting fuse makes installation simple and safe. Stringent automotive power "load dump" tests are conducted to ensure operation in the harshest electrical systems. |
| Sleep Current       | <1mA  |
| Backup Battery      | 300mAh LiPo internal backup battery pack.   |

# Mechanics / Design

| Dimensions                | 71 x 46 x 24 mm (2.8 x 1.81 x 0.94 in)   |
|---------------------------|--|
| Housing                   | Non-branded housing is suitable for white labeling.  |
| Installation              | OBDII standard connector draws power from the OBDII port to operate.   |
| Temperature Range         | Operating: -30°C to +60°C<br>Recommended Storage: 10°C to 30°C, Humidity 30%.<br>Store in a cool, dry place.   |
| Cellular Antenna          | Internal   |
| GPS Antenna               | Internal   |
| 3-Axis Accelerometer      | 3-Axis accelerometer to detect movement, high g-force events, and more.  |
| Diagnostic LED            | Diagnostic LED indicates operation status.   |
| Flash Memory              | Store records if device is out of cellular coverage. <u>View storage</u> capacity here.  |
| Onboard Speed and Heading | The device continuously monitors speed and heading, allowing for over-speed alerts as well as updates on speed and heading changes.  |
| Onboard Temperature       | The device reports internal temperature and prevents the internal battery from charging in extreme temperatures. May not be suitable for precise temperature logging purposes. |

### **Smarts**

Accident and Rollover Detection

Configure accident and rollover alerts, triggered by extreme changes in the velocity and orientation of the vehicle or equipment. Up to 2 hours of second-by-second 'black box' data is stored to provide critical accident reconstruction data.

| Driver Safety and Behavior | Monitor speeding, harsh acceleration, braking, cornering, idle times and more to improve safety and prevent unnecessary wear on vehicles. |
|----------------------------|---|
| Geofence Alerts            | The server can use device location to create geofences and alerts if an asset enters or leaves designated locations.                      |
| GPS Jamming Detection      | GPS jamming or interference can be detected and alerted on.   |
| Preventative Maintenance   | Set reminders based on distance traveled and run hours to reduce maintenance and repair costs.  |
| Real-Time Tracking         | Device remains continuously connected while on the move for real-time asset tracking.   |
| Run Hour Monitoring        | Calculate run hours and distance travelled (odometer) to understand and optimize asset utilization.                                       |
| Tamper/Removal Alerts      | Critical 'unplugged/power loss' alerts to notify users of device removal, tampering, unauthorized trips, or theft.                        |
| Theft Recovery             | Switch to Recovery Mode in the case of theft or loss to activate real-<br>time tracking for asset retrieval.                              |

# **Device Management**

| Flexible Configuration     | Configure device parameters such as position update rate, movement and accelerometer settings, and more.                       |
|----------------------------|--|
| Device Management Platform | Manage, monitor, configure, debug, update, and restart devices remotely from our <u>cloud-based device management system</u> . |
| Configuration App          | Configurable with DM-Link provisioning tool.   |

# Integration

| Third-Party Integration | TCP Direct or HTTPS Webhook                                  |
|-------------------------|--|
| API                     | Command and configure the device via rich API functionality. |

## **Security**

**Data Security** 

Military-grade AES-256 Encryption from device to Device Manager to protect the integrity and confidentiality of your data. Data forwarded to third-party systems is sent via HTTPS for end-to-end security.

### Warranty

Manufacturer's Warranty

Two-year manufacturer's warranty. Exclusions apply.

### **Certifications**

Please view our knowledge base for <u>regulatory and network certifications</u>.