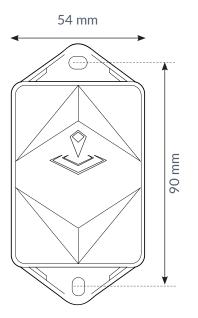


The small low-power tracker with long battery life. Indoor and outdoor localization, zone and high precision. Compatible with multiple external environmental sensors.

- **M** GNSS
- Wi-Fi scanning
- ★ Bluetooth geobeacon for zone precision
- NB-IoT
- Europe
- Data recovery (patented)
- Up to 8 years of battery life
- Flame retardant





## Connectivity

#### **NB-IoT**

- · Energy efficient transceiver
- · Internal omnidirectional antenna
- · Bi-directional communication
- · NB-IoT bands: Europe
- Data recovery
- · OTA firmware upgrade (NB-IoT)

### **Bluetooth Low Energy (BLE)**

- · BLE 2.4 GHz
- · Bluetooth Low Energy 5.0

## Geolocalization

#### **GNSS**

- Multi GNSS constellation chipset (GPS+GALILEO)
- · Patch antenna for optimum performance

#### **BLE**

- · Sensolus proximity beacon detection
- · Detectable by zone and high precision anchors

#### Wi-Fi

Wi-Fi based geolocalization

## Sensing

#### Internal

- · Activity monitoring
- · Orientation monitoring
- · Virtual tamper detection

## **Environmental BLE sensors**

- · Temperature, humidity, air quality
- · Person presence, contact, magnet
- · Other BLE sensors can be added

# **Mounting**

- Holes 6x8 mm. 90 mm distance between the centers of the mounting holes.
- · Cable ties
- · Double sided tape

## Mechanics & design

#### **Antennas**

All antennas are internal

#### Size

105x54x21,5 mm (LWH)

#### Weight

95 gram

#### Color

Translucent black

# **Battery**

- · 3 to 8 years battery life depending on operating mode
- · Non replaceable battery pack5200 mAh 3.0 V(Li-MnO<sub>2</sub>)

#### **Casing**

- · Polycarbonate (lexan 943A)
- · Flame retardant
- UV-stabilized

#### Water & dust resistance

**IP68** 

#### **Operating temperature**

-20 to 60°C

## Storage temperature

-40 to 60°C

### Certifications

### Regulatory

CE

### **Electrical safety**

EN-60905-1

### Bluetooth 5.0

Declaration ID: D048003

## **User interaction**

#### **Device activation**

Magnetic activation

### Synchronize remote settings

- · Instant: Magnet activation
- · Periodic: No user interaction needed

#### **LED** feedback

Green & red LED feedback on the device

# Management services

### **Diagnostics**

- · Battery lifetime prediction
- · Detailed energy consumption
- · Geolocation diagnostics
- Installation
- · Communication quality

#### Management

- · OTA firmware updates over NB-IoT and BLE
- · Remote configuration
- Tracker usage profiles
- · External environmental sensors

## **Application services**

Localization

Activity

Journeys

Utilization

 Connectable with environmental sensors · Tilt detection

## Firmware configuration

#### **Communication service**

- · Data recovery strategy
- · Communication conditions

## **General configuration**

- · Rule engine configuration
- · Diagnostic levels
- · Boot methods
- · Accurate time synchronization

#### **Orientation service**

Orientation detection parameters

### **Activity service**

Activity detection parameters

## **Security**

### **Encryption**

- · Device unique encryption keys
- End to end payload encryption Chacha 20
- · AES encrypted firmware
- · Firmware upgrade allows only signed firmware images

#### **Location service**

- · Motion based, context based, periodic or scheduled
- · Configurable update rate and journey detection
- Priority sequence (GNSS, Wi-Fi scanning, Bluetooth geobeacon)
- GNSS fix parameters
- · Quuppa tested for high precision
- · Indoor detection algo
- · Wi-Fi scan strategy
- BLE scan strategy

### **Environmental sensing**

- · Polling and aggregation strategy
- Alerts
- · Edge processing parameters

### **Tamper service**

Virtual tamper algo configuration