

FM-Plug4 FM-Plug4+

# FM-Plug4

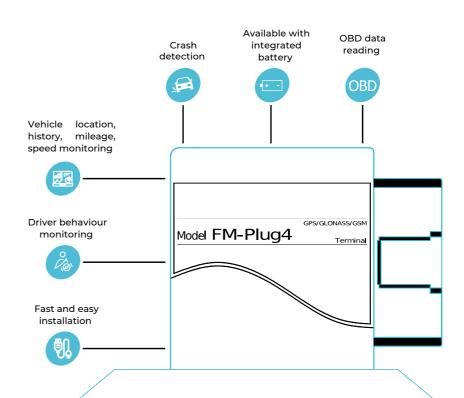
FM-Plug4 is a Plug&Play type GPS tracking device that connects to the vehicle via the OBD2 socket.

Fast and simple installation reduces installation costs and allows on-the-spot presentation of the device.

The device is also available with an integrated battery – FM-Plug4 version.

### **Applications**

- Monitor vehicles with a superfast and easy installation
- Reduce operational costs and increase productivity
- Enhance your fleet with driver monitoring
- Car rental and sharing solutions



### **Detailed specifications**



FM-Plug4	FM-Plug4+
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### **Environmental specifications**

Operating: -35 to +60 °C Operating: -35 to +60 °C **Temperature** Storage: -40 to +65 °C Storage: -40 to +65 °C 0 to +45 °C Battery charging:

-20 to +60 °C Battery discharging: Battery storage: -20 to +70 °C

**Relative humidity** 0% to 95% Non-condensing

### **Electrical specifications**

10 - 32 V DC **Power supply range Power supply voltage** 12 / 24 V DC Maximum voltage ratings 50 V @ 60 s 72 V @ 0.1 s 250 mA @ 12 V DC 350 mA @ 12 V DC **Maximum current rating Internal battery** LiPo 3.7 V 190 mAh

**Protections** Reverse polarity protection

> Electrostatic discharge protection on USB Electrostatic discharge protection on SIM card slot Battery short circuit protection (only for FM-Plug4+) Charging protection (only for FM-Plug4+)

2 amp fuse on the power line

#### Power consumption @ 12 V DC

Operating Idle mode: 38.0 mA Active mode (peak @ (battery fully charged) GSM): 52.1 mA Deep sleep mode: 6.8 mA

Operating while charging Idle mode: 110.0 mA Active mode: 124.8 mA Deep sleep battery mode: 74.1 mA

#### **Connectivity**

**GSM** Modem: Quectel M95 Antenna: Internal (Quad-band)

Frequency band @ GSM: 850/900/1800/1900 MHz (GPRS multi-slot class 12)

Modem: U-blox EVA-M8M **GNSS** module

Antenna: Internal

Augmentation system: QZSS, SBAS (WAAS, GAGAN, EGNOS, MSAS)

Frequency: 1575.42 MHz (GPS); 1602 MHz (GLONASS)

Tracking sensitivity: -164 dBm (GPS); -163 dBm (GLONASS) Reacquisition sensitivity: -159 dBm (GPS); -156 dBm (GLONASS)

Cold start duration: < 30 s Aided start: As low as 3 s Navigation update rate: 10 Hz

Horizontal position accuracy: 2.5 m (CEP, 50%, 24 hours static, -130 dBm, > 6 SVs)

## **Detailed specifications**



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### **Interfaces**

User interfaces

OBD II Connection
Mini USB interface
1 Indication LED

Microphone

### **Features**

**Internal storage** 4 MB (max. 30000 records)

**Accelerometer** Built-in 3-axis (auto-calibrating, impact detection, motion sensing, tilt detection, g-force up to 4 g)

### **Certifications and ratings**

**Certifications** E-mark, RoHS

### **Physical properties**

 Dimensions
  $63 \times 52 \times 28 \text{ mm}$  

 Weight
  $66 \pm 10 \text{ g}$ 

**Housing** Plastic

# **Ordering information**



FM-Plug4	FM-Plug4 with OBD without battery
FM-Plug4+	FM-Plug4 with OBD and integrated battery