

4G HARDWIRED GNSS TRACKER

Hidden installation for all objects with power

PioneerX 100

4G

LTE Cat-1 + 2G wired tracker for wide ranging applications.



- Multiple I/Os
- Driving Behavior Monitoring
- Crash Detection
- Firmware Over the Air
- Geo-fences
- Motion Detection
- BLE 4.2
- 3 Axis Accelerometer
- Panic Button

- 55g (1.94oz)
- 105.7mm*57.6mm*16.8mm (4.16" *2.26" *0.66")
- 5V to 32V DC
- 30°C ~ +80°C (-22°F ~ 176°F)

Certificates(planned):



*Please reach out to us if you need any certificates in particular



Product Specifications

Network/Operating Band

Operating Band	LTE FDD Cat 1: B1/B2/B3/B4/B5/B7/B8/B12/B13/B17/B18/B19/ B20/B25/B26/B28/B66 LTE TDD Cat 1: B34/B38/B39/B40/B41 GSM:850/900/1800/1900 MHz
Data Transmission	LTE-FDD:Max.10Mbps (DL), Max.5Mbps (UL) LTE-TDD:Max.8.96Mbps(DL), Max.3.1Mbps (UL) GPRS: Max. 85.6Kbps (DL), Max. 85.6Kbps (UL)

GNSS Specifications

GNSS Chipset	HD8120
Parallel GNSS	GPS+Beidou+Galileo+QZSS (SBAS)
Receiver type	24 tracking / 66 acquisitions- channel GNSS receiver
Sensitivity	Acquisition: -148 dBm Tracking: -161 dBm Reacquisition: -158 dBm
Horizontal Position Accuracy	Autonomous: < 1.5 m CEP
TTF @ -130 dBm with (without) EASY™	Cold Start: < 20s (30s) Warm Start: < 2 (2s) Hot Start: < 2s (2s)

Interfaces

Digital Input (ACC)	For ignition detection (input range 0-32V, 5 ≤: ignition on, ≤2V ignition off, from 2V to 5V: unstable status)
Digital Input (SOS)	Panic (SOS) button (connect to ground trigger alert)
Digital Output	2 digital outputs for relay control
Network, GNSS, BLE, WiFi Antenna	Internal only
Indicator LED	Network and GNSS
FOTA	Yes
Temperature Sensor	1 temperature sensor
BLE 4.2	Yes
SIM Card	Nano SIM
WiFi	2.4 GHz 802.11b (Rx)
Tracker Configuring	Type C Connector

General Specifications

Ingress Protection Rating	IP41
Dimensions	105.7mm*57.6mm*16.8mm(4.16" *2.26" *0.66")
Weight	55g (1.94oz)
Battery	Li-Polymer 200 mAh/ 3.7V
Operating Voltage	5V to 32V DC
Operating Temperature	-30°C ~ +80°C (-22°F ~ 176°F)
Storage Temperature	-40°C ~ +85°C (-40°F ~ 185°F)

Air Interface Protocol

Transmit Protocol	TCP, UDP, MQTT, SMS
Protocol Check & Encryption Support	MD5/ AES256
BLE Accessory Support	Yes
Scheduled Timing/angle/distance Report	Report position and status at preset intervals
External Power Status Alarm	Report when external power is disconnected
Low Power Alarm	Report when backup battery is low
Speeding Alarm	Report when speed exceed the pre-set value

Product Specifications

Air Interface Protocol

Towing Alarm	From internal 3-axis acceleration
Remote Control	Remote output control
Network Signal Jamming Detection	Report network jamming
Data Roaming Control	Avoid additional data consumption
Driving Behavior Monitoring	Harsh braking, acceleration and turning events
Crash Detection	Accident data collection for reconstruction and analysis

Industry Certifications

FCC/CE/RCM/NBTC/TDRA/CITC/Emark/Anatel