

Tracking Label

Say goodbye to lost shipments and untraceable assets with Lansitec's ultra-thin Tracking Label. Combining GNSS, Bluetooth 5.0, and LoRaWAN technology, this disposable tracking solution provides reliable indoor and outdoor positioning for packages, pallets, and containers. Whether you're shipping goods across the globe or simply managing inventory within a warehouse, the Tracking Label's 3-axis accelerometer and automatic BLE/GNSS switching ensure efficient power use without compromising on accuracy. With up to three years of battery life (based on six GNSS reports per day) and an IP66 rating, this label is built to stand up to harsh conditions and lengthy transit times—giving you the confidence to monitor and manage your assets from end to end.

Ultra-Thin & Disposable Design

At just 3mm thick, it's easy to attach to packages or pallets, making it the ideal lightweight, single-use tracking solution.

Dual Indoor/Outdoor Tracking

Switch automatically between Bluetooth (1-3m accuracy) indoors and GNSS (<2.5m CEP) outdoors for consistent location visibility.

Long Battery Life

A built-in 1800mAh disposable lithium battery can last over three years under typical usage, significantly reducing maintenance.

Intelligent Motion Detection

The 3-axis accelerometer detects movement or tampering and adjusts tracking frequency to conserve power.

Rugged IP66 Enclosure

Safeguards against moisture, dust, and mild impacts, ensuring reliable performance in transit or storage.

Low Operating Costs

LoRaWAN connectivity removes the need for costly cellular data plans, lowering your total cost of ownership.

iBeacon Broadcasting

The device supports Bluetooth broadcasting using the iBeacon protocol, with a default UUID of F2-A5-2D-43-E0-AB-48-9C-B6-4C-4A-83-00-14-67-FD, and Major/Minor values are the last 4 bytes of the device's DevEUI. The UUID, Major, Minor, Interval, and TX power in the broadcast are all configurable.



SCENARIO



PACKAGE & PALLET TRACKING



WAREHOUSE INVENTORY CONTROL

Monitor shipments in real time across multiple carriers, alerting you to potential delays, re-routes, or tampering.

Combine the label's indoor BLE tracking with LoRaWAN coverage to instantly locate items—preventing stockouts or overstock.



COLD CHAIN LOGISTICS



RENTAL & LEASING MANAGEMENT

Pair optional environmental sensors with the label to track temperature-sensitive goods, ensuring compliance and preventing spoilage.

Affix a disposable label to equipment or assets on short-term leases, offering accurate usage data and location without long-term commitments or high operational costs.

SPECIFICATIONS

Connectivity

Bluetooth Protocol	5.0, iBeacon
RF Power	-20~+4 dBm, configurable in 4 dBm steps
Sensitivity	-96dBm
Advertise Interval	100ms ~ 10s adjustable
Coverage Range	150m sight distance
Indoor Tracking	Bluetooth, 1~3m accuracy
Outdoor Tracking	GNSS, <2.5m CEP

LoRaWAN

LoRaWAN Protocol	LoRaWAN 1.0.2B
LoRa Frequency	US915, AU915, EU868, EU433, AS923, RU864, KR920, IN865, CN470
LoRa Distance	>1km in urban area
LoRa Sensitivity	-139dBm @SF12, BW125kHz, 434MHz/470MHz -137dBm @SF12, BW125kHz, 868MHz/915MHz

GNSS

GNSS	BEIDOU/GALILEO/GPS/GLONASS/QZSS/SBAS (WAAS, EGNOS, GAGAN, MSAS)
GNSS Position Accuracy	<2.5m CEP
Cold Start Duration	30s to 60s

Mechanics

Dimension	120*75*3mm
Operating Temperature	-35°C ~ +75°C
Storage Temperature	-45°C ~ +85°C
Operating Humidity	5% ~ 95% (non-condensing)
Weight	50g
IP Rating	IP66

Functions

Configurable Bluetooth data filter and payload report	Filter any data bytes in a Bluetooth payload and report any via LoRaWAN
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3D Accelerometer	Supported
Encryption	AES128
Low Battery Alert	Supported
Vibration Intensity Adjustment	Supported
Operating Mode	GNSS coordinates acquisition frequency adjustable, LoRa communication frequency adjustable, Automatic BLE and GNSS tracking switching
Multiple Bluetooth gateway LoRaWAN report synchronization	Sync the clock and LoRaWAN report
TDMA	Support
Bluetooth Data Compression	Support

Power

Battery	1800mAh Disposable Lithium Battery
Battery Life	> 3 years @ 6 GNSS reports a day
Operating Current	20 μ A ~139mA
Certification	CE, FCC, RCM

ORDERING INFORMATION

Product Description	Part Number
Label Tracker, LoRaWAN, BLE, GNSS, 1800mAh	100-00173 (CE), 100-00174 (FCC)