TG-BT5-IN & TG-BT5-OUT
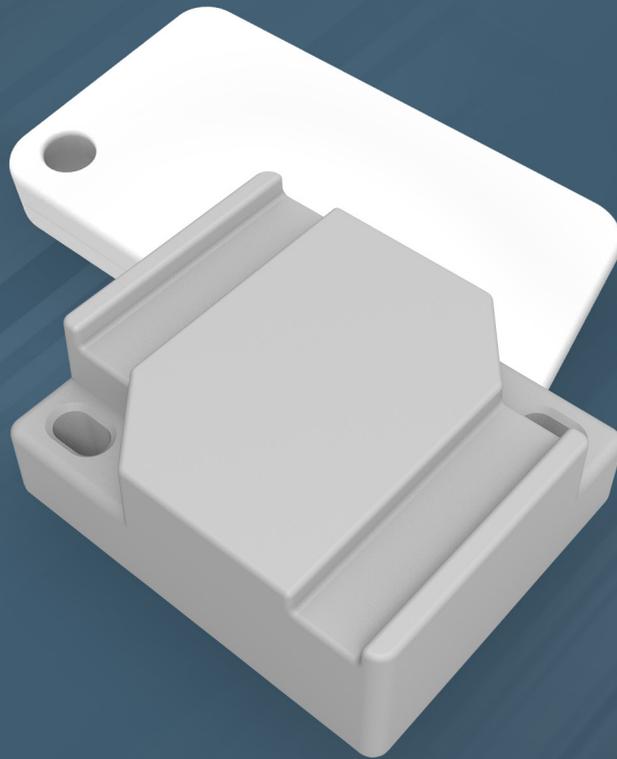
Indoor/outdoor Bluetooth tags for the MikroTik KNOT
or other IoT asset-tracking/telemetry setups.

Built-in temperature sensors	Built-in accelerometer
Built-in battery that will last for years	Magnet activation
BLE (Bluetooth Low Energy) 5.2 with Silabs BG22	iBeacon, Eddystone, MikroTik telemetry

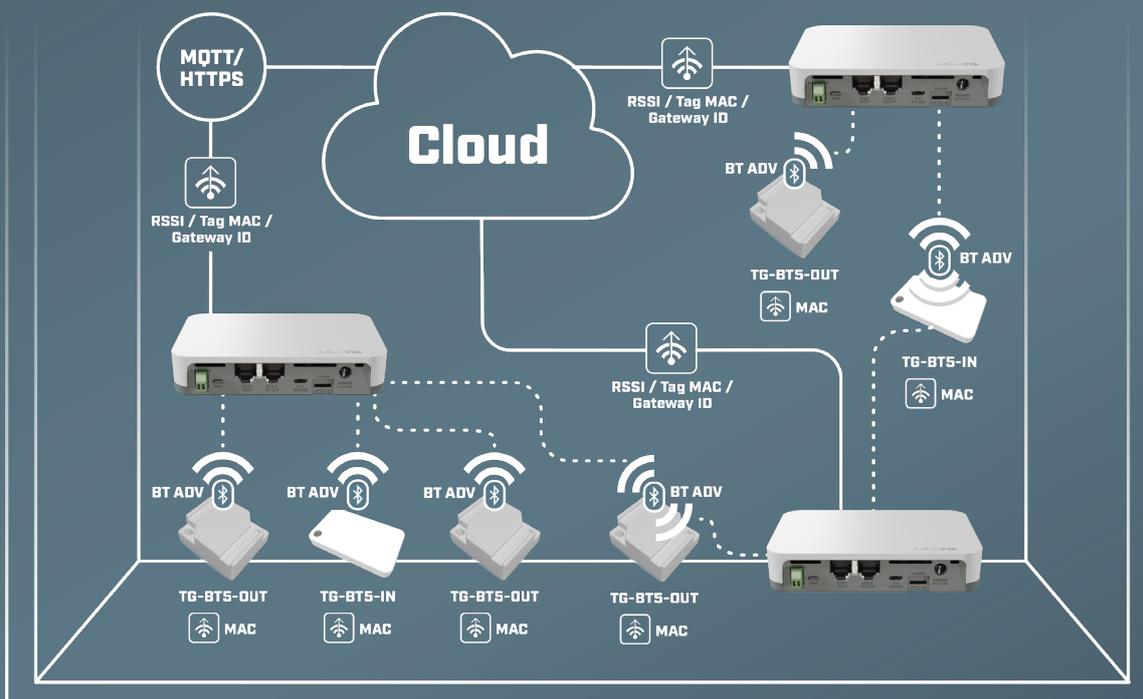## TG-BT5-IN: slim and sleek, perfect for indoor inventory tracking

Bluetooth tags play a huge role in IoT setups, where Bluetooth is used to broadcast the data over short distances. You can use these small devices for proximity-based tracking of various objects. For example, if you have a KNOT gateway in different parts of a construction site, you can use these tags to locate construction tools, electrical equipment, and other assets.

37x22x6mm

Just attach the tags to the necessary items - and the nearest gateway will sense the tags in its proximity. Exceptionally useful in warehouse logistics – let your cargo inform you as soon as it enters the warehouse! They use so little power that a single built-in 220 mAh battery will last for years.

Once activated, the tag will broadcast iBeacon, Eddystone or MikroTik telemetry advertising packets to the gateway (such as the KNOT or any other BLE gateway). These packets contain MAC address used for ID, as well as telemetry data – such as acceleration, tilt and battery charge level. The gateway then pushes the data to the remote server utilizing MQTT or HTTP protocols. By default, advertisement packets are sent once every 5 seconds, but you can change this value to your liking. For example, if you set the interval to 1 second, the battery will typically last two years. The built-in accelerometers can not only detect acceleration (movement), but can also register if the device was dropped or tilted (free-fall detection). The indoor version of our BLE tags works best in a temperature range from 0°C to 70°C. It is splash-proof, and comes with a built-in accelerometer.
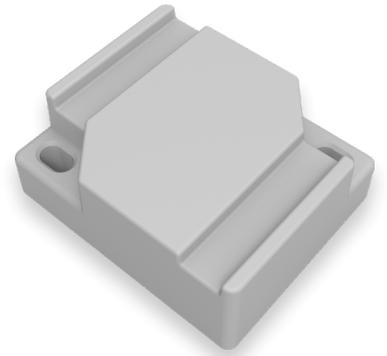
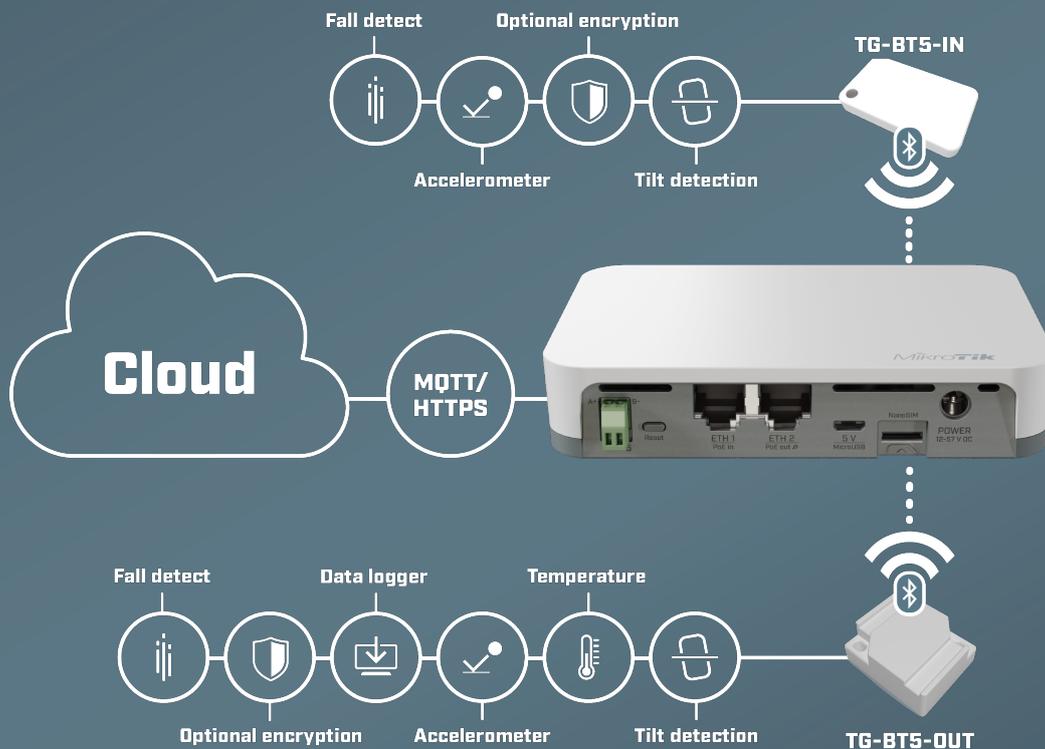# TG-BT5-OUT: the heavy-duty tag for industrial challenges

This version of our BLE tags comes completely sealed, cast in industrial-grade molds to give it a solid IP69k ingress protection rating. In other words, this tag is dust-tight — nothing gets in, and it is fully protected against close-range high-pressure, high-temperature spray downs. Perfect for industrial telemetry systems or to track all kinds of heavy equipment and materials at a construction site.

38x32x16 mm

Like the indoor version, this tag also supports iBeacon, Eddystone, and MikroTik telemetry formats. There is an NFC encoded MAC address and optional encryption. Unlike the indoor version, the outdoor tag comes with a built-in temperature sensor that can be used for condition monitoring. The ±0.5°C precision can be very useful in cold supply chain logistics.
TG-BT5-OUT features an improved 550 mAH battery that will last around five years (with a sending interval of 1s). It is suitable for strapping to all kinds of surfaces, and it can handle a temperature range of -20°C to 85°C.

Combine these tags with our KNOT IoT gateway to create the most affordable and flexible asset-tracking or telemetry setup ever!

You can use our "Beacon manager" app to configure advertisement packet type, accelerometer parameters (power mode, triggers, data rate, etc), and update the firmware.

COMING SOON

Available on the **App Store**

ANDROID APP ON **Google Play**

Specifications

Product code	**TG-BT5-IN**	**TG-BT5-OUT**
Bluetooth version	5,2	
Antenna gain (dBi)	1.5	
Antenna beam width	360°	
Sensors	Accelerometer	Accelerometer, temperature sensor
Battery	220 mAh	550 mAh
Estimated battery life (MikroTik format, 1s/5s update interval)	2-6 years	5-15 years
Mounting	Hanging or double-sided 3M tape	Strapping
Temperature sensor accuracy	-	±0.5°C (typ)
Magnet activation	Yes	
Condition monitoring and logging	No	Yes
NFC with encoded Serial Number	No	Yes
Optionally AES Encryption	Yes	
Screw mounting	Yes	Yes
Dimensions	37x22x6	38x32x16
Supported Bluetooth packet formats	MikroTik proprietary (default) Eddystone TLM, iBeacon	
Mounting	Hanging, M3 screw, double sided 3M tape (included)	Strapping, M3 screw
Weight	7g	27g
IP rating	IP55	IP69k