

Product Specification

Overview

The *I Measure U BlueThunder* sensor is based on the smallest, lightest, and most robust wireless inertial measurement unit (IMU) in the world.

The physical unit is packed with sensors, where measurements can either be stored on board, or transmitted wirelessly to a computer or smart phone in real-time.

The packaged sensor and iOS application is easy to use, providing accurate and precise measurements. Our versatile *BlueThunder* sensor is fast-charged via micro USB. *BlueThunder* is durable, lightweight and reliable.

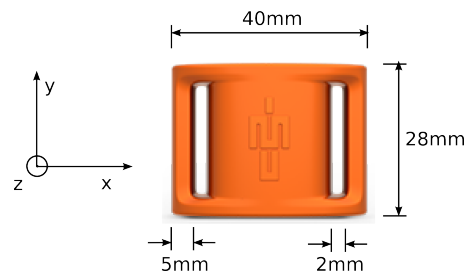
Features

- 9-axis wireless streaming real-time at 100Hz
- 3-axis accelerometer streaming real-time at 500Hz
- 9-axis data logging at 500Hz
- 3-axis accelerometer data logging at 1000Hz
- Logged data download via micro USB cable
- Over the air firmware updates
- Recharge via micro USB in 1.5 hours
- Typical run time is 4-6 hours
- iOS data acquisition app available
- Light weight, robust, beautiful

Applications

- Animation
- Motion capture
- Performance arts
- Performance sports
- Healthcare monitoring
- Mobility monitoring
- Gaming and motion control
- Robotics

Dimensions



Specifications

General	
Part Number	IMU-BLUETHUNDER
Dimensions	40mm x 28mm x 15mm
Weight	12g
Charge Voltage	5V micro USB
Wireless	Bluetooth Low Energy
Range	30m
On-board storage	4GB
Serial Baud Rate	921600
Charge time	1.5 hours
BT Sampling time	2-6 hours
SD Sampling time	2-6 hours

Sensor	
Accelerometer range	$\pm 16g$
Accelerometer resolution	16-bit
Gyroscope range	$\pm 2000^\circ/s$
Gyroscope resolution	16-bit
Compass range	$\pm 1200\mu T$
Compass resolution	13-bit

