WAX3

3-Axis Wireless Accelerometer

Description:
The WAX3 is a three axis wireless accelerometer. It combines a state of the art triple axis accelerometer sensor with an ultra low power IEEE802.15.4 2.4 GHz band. The device also integrates a USB 2.0 enabled microcontroller and micro USB connector along with an on-board rechargeable power source. This enables the device to behave as a receiver or transmitter and facilitates easy charging and reconfiguration using the boot-loader application. Additional functionality can be added using the available expansion port and open source code structure.

Summary:
- +/- 16*g* 3-axis accelerometer
- 4 m*g* resolution
- 25m range indoors
- USB 2.0 enabled
- Rechargeable Li-Polymer battery
- Fully re-configurable functionality
- Expansion port for other sensors
- Accelerometer rate up to 2 ks.sec^{-1}

Applications:
- Wireless sensing
- Remote control
- Activity monitoring
- Interactive art

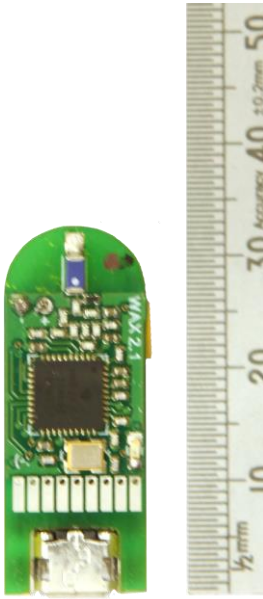
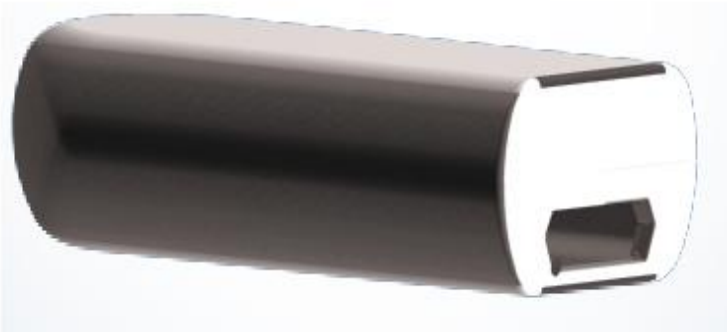


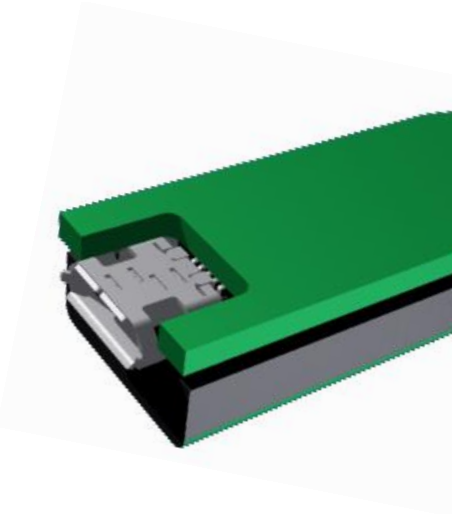
Figure 1. Picture of devic

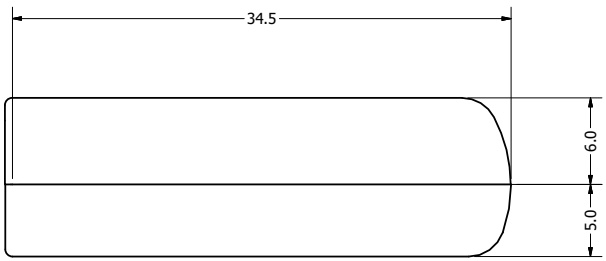
Advanced Specifications:

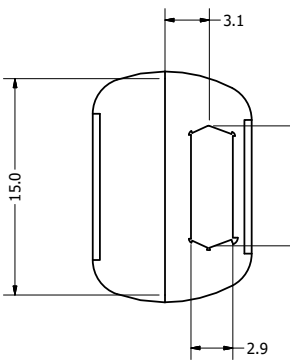
Parameter	Value	Notes
USB Connection	Full Speed	Several configuration options available, USB 2.0
Charge Current	100 mA	Current drawn from USB port
Battery Capacity	110 mAh	Lithium polymer technology
Battery life sleep	> 1.7 years	Shipping Mode
Battery endurance	500 cycles	Charge discharge cycles
Battery Transmitting	~10 hours	@50Hz continuous streaming
Battery Standby	~1 month	Device enters Standby automatically when not in
Max survivable acceleration	10,000 *g*	Accelerometer sensor figure
Max sensed acceleration	+/- 16 *g*	Maximum deflection
Sensed acceleration resolution	4 m*g*	Minimum recorded deflection
Bandwidth RF	250 kbs^{-1}	IEEE802.15.4 based radio
Transmit Power	0dBm	Configurable
Frequency	2.45Ghz	16 digital channels avalable
Connector used	Molex	USB Micro B
Weight	6g	Typical value

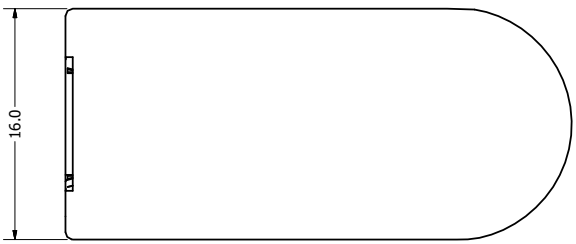
Dimensions:











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