

IoT Development Kit

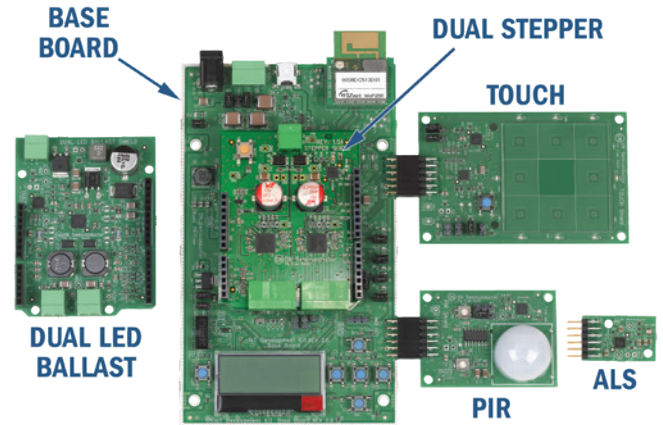


Configurable rapid prototyping platform for Industrial IoT, Smart City/Building, and mHealth applications from ON Semiconductor.

IoT Development Kit

Features

- Comprehensive portfolio of sensors, connectivity and actuator devices
- Individual API for each and every device
- Complex C++ Code examples adapted to multiple applications
- Eclipse based integrated development environment
- Full documentation of system hardware (schematics and layout files) and software design
- Cloud software
- Ready to use for fast turnaround from concept to production



Markets & Applications



Smart Home



Predictive Maintenance



Smart Building



Smart Lighting



Smart Cities



Asset Tracking



Personal IoT

Module Capabilities

| | |
|--|--------------------------------|
| Baseboard | BB-GEVK |
| Wireless Connectivity: SIGFOX™ EU | EU-SIGFOX-GEVB |
| Wireless Connectivity: SIGFOX™ US | US-SIGFOX-GEVB |
| Wired Connectivity: Power over Ethernet | POE-GEVB |
| Wired Connectivity: CAN | CAN-GEVB |
| Wireless Connectivity: Bluetooth® Low Energy | BLE-IOT-GEVB |

| | |
|--|----------------------------------|
| Sensor: PIR motion | PIR-GEVB |
| Sensor: Ambient light | ALS-GEVB |
| Sensor: Multi Sensor (ALS, IMU, ENV) | MULTI-SENSE-GEVB |
| Sensor: Touch/proximity/level | TS-GEVB |
| Sensor: Smart Passive Sensor | SPS-READER-GEVK |
| Actuator: Dual stepper motor | D-STPR-GEVK |
| Actuator: Dual LED + ballast | D-LED-B-GEVK |
| Actuator: BLDC motor control + power stage | BLDC-GEVB |

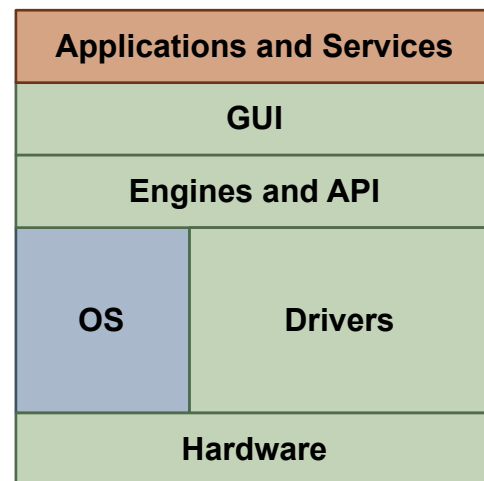
IoT Development Kit

Software

| | |
|--------------------------------------|---|
| Development Environment (IDE) | Eclipse + CDT + GNU Arm® for Eclipse |
| Supported Operating Systems | Windows® |
| Baseboard Processor | Arm Cortex®-M3 |
| Shield Boards | Connectivity, Sensors, Actuators |
| Operating System / RTOS | Arm Mbed™ |
| Toolchain | GNU tools for Arm |
| Debugger | gdb |
| Libraries | Mbed, ON Semiconductor shield board libraries |
| IoT/Cloud Platform Support | Carriots, IBM Bluemix and compatible with most commercial cloud platforms |
| IoT Protocols | REST, MQTT, HTTP |
| Connectivity Protocols | SIGFOX, Thread, Bluetooth 5, PoE, Wi-Fi®, CAN, Zigbee® |

APIs and Examples

- 21 Application Programming Interfaces (API)
- 28 simple application examples
- 12 complex application examples



For videos, tools, and more information visit

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