



SparkFun Inventor's Kit for Arduino 101

KIT-13844 RoHS Open Source Hardware

Description: The SparkFun Inventor's Kit for the Arduino 101® board is a great way to get started with programming and hardware interaction with embedded electronics using the Intel® Curiebased Arduino 101 board.

This 101 SIK includes everything you need to complete 21 circuits that will teach you how to control and read the on-board and external sensors, control the Arduino 101 through your phone, detect and analyze different sounds, and much more. Don't worry; you won't need any previous programming or electronics experience to use this kit. The philosophy behind this kit is that anyone can (and should) play around with cutting-edge electronics. After using this 101 SIK, you'll have the know-how to start creating your own projects and experiments. From building robots and game controllers to IoT and data logging, the world will be your oyster.

The online Experiment Guide for the Arduino 101 board contains step-by-step instructions on how to connect each circuit with the included parts. Full example code is provided and explained, and troubleshooting tips are included in case something goes wrong.

The kit does not require any soldering and is recommended for anyone comfortable reading code libraries or anyone looking for an alternative to the original SparkFun Inventor's Kit.

Note: The Arduino 101 Inventor's Kit is only available for customers in the USA. If you are located in Canada, the EU, or other locations, be sure to check out the Genuino 101 or its SIK instead. Additionally, this product may be delayed by two to three business days to verify shipping address. We will contact you after you place your order if we need anything.

Note: The Real-Time Operating System (RTOS) and framework developed by Intel was scheduled to be open sourced in March 2016. It's not possible to interface with it directly; only the Arduino core can do it via static mailboxes

Circuit Experiments:

Experiment 1: Blinking an LED

Experiment 2: Reading a Potentiometer

Experiment 3: Driving and RGB LED

Experiment 4: Driving Multiple LEDs

Experiment 5: Reading a Button Press

Experiment 6: Reading an SPDT Switch

Experiment 7: Reading a Photoresistor

Experiment 8: Color Mixing with the RGB

Experiment 9: Reading a Temperature Sensor

Experiment 10: Driving a Servo Motor

Experiment 11: Using a Transistor

Experiment 12: Using the Motor Driver

Experiment 13: Motor Driver with Inputs

Experiment 14: Using a Piezo Buzzer

Experiment 15: Using the Sound Detector Board

Experiment 16: Using a Shift Register

Experiment 17: Using an LCD

Experiment 18: Reading the On-Board Accelerometer

Experiment 19: Tap Detection

Experiment 20: Using the On-Board Real Time Clock (RTC)

Experiment 21: Using the On-Board Bluetooth Low Energy (BLC)

Kit Includes:

Arduino 101

Arduino and Breadboard Holder

White Solderless Breadboard

Carrying Case

SparkFun Mini Screwdriver

16x2 White on Black LCD (with Headers)

SparkFun Sound Detector (with Headers)

SparkFun Motor Driver - Dual TB6612FNG (1A) (with Headers)

Hobby Gearmotor - 200 RPM (Pair)

Battery Holder - 4xAA to Barrel Jack Connector

74HC595 Shift Register

Transistor - NPN (BC337)

1N4148 Diodes

DC Motor with Gear

Small Servo

TMP36 Temp Sensor

USB Cable A to B - 6 Foot

Jumper Wires - Connected 6in. (M/M, 20 pack)

Photocell

Tri-color LED

Red, Blue, Yellow, and Green LEDs

Red, Blue, Yellow, and Green Tactile Buttons

10K Trimpot

Piezo Speaker

SPDT Mini Power Switch

100 Ohm and 10K Resistors

1500 mAh Alkaline Batteries - AA

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