

LumiDrive LED Driver

DEV-14779

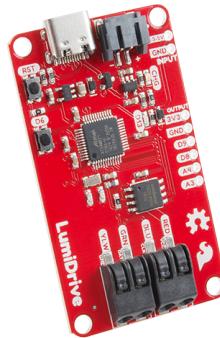
Product Overview

12-31-2021

For the most up-to-date information, visit www.mouser.com or the supplier's website.

Description

The SparkFun LumiDrive LED Driver is SparkFun's foray into all things Python on micro-controllers. This LED driver is created to control and personalize an entire strand of APA102 LED strips directly from the microcontroller board. The onboard SAMD21G-AU microcontroller has broken out a number of analogs and digital pins. The onboard SAMD21G-AU microcontroller helps implement external buttons, switches, and other interfaces to interact with LEDs.



The LumiDrive driver is equipped with a USB-C™ connector capable of supplying up to 1.5Amps from a 3.1 USB port, a LiPo connector. It comes with a charging circuit for portable power. The device also includes two poke-home connectors to allow wires plug-ins without the need for solder.

Features

- 3.3V to 6V is the power range
- Four input/output pins (2 digital pins and two analog pins)
- Two buttons:
 - The reset button will reset the board on press
 - The second button is attached to digital pin D6
- Two LEDs on board:
 - A yellow charge LED indicates that a LiPo battery is charging
 - The second is a blue stat LED attached to pin D13
- Equipped with a USB-C connector
- USB-C connector supply power up to 1.5Amps from a 3.1 USB port, a LiPo connector, and a charging circuit for portable power
- Two poke-home connectors to allow wires plug-ins without the need for solder

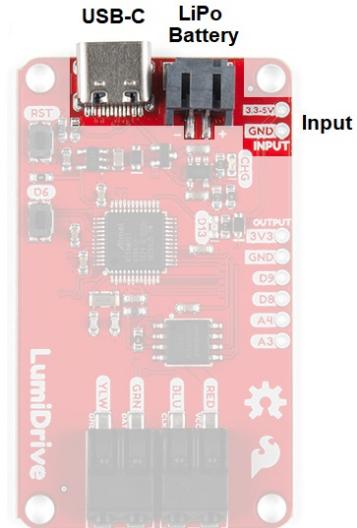
Hardware overview

Power (Power range 3.3V to 6V)

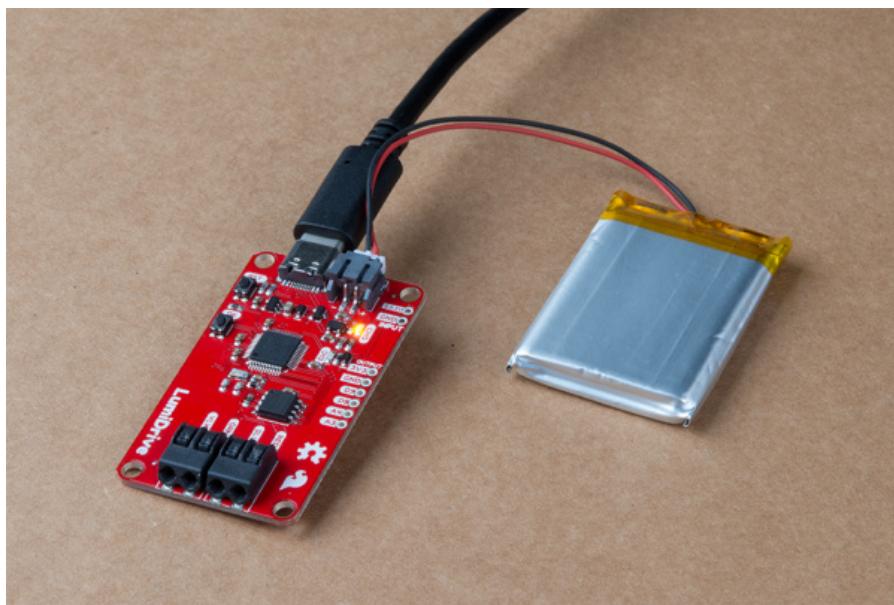
- USB-C
- Lithium-ion battery
- Input

USB-C

- Reversible
- Capable of supplying more power than its predecessor



Lithium-ion battery



Two-pin input header

- Labeled as **Input** for supply power

Additional Resources

- [Hookup Guide](#)
- [Github](#)

Associated product

- [Microchip Technology SAM D21 Arm® Cortex®-M0+ Microcontrollers](#)

Mouser Part Number

[View Part](#)

To learn more, visit <https://www.mouser.com/new/sparkfun/sparkfun-lumidrive-led-driver/>