

BalaC

SKU:K038



Description

BalaC is a DIY dual wheel balancing car kit. BalaC uses the STM32 series chip, two motor driver ICs, and is also equipped with a rechargeable replaceable battery. It incorporates a light-weight design with 360° servos. It's possible to use the UIFlow graphic interface to program the balancing car. An M5StickC is included in the package. The BalaC maintains its balance with the help of mpu6886. The real-time compensation of the servos are controlled by calculating the offset value to achieve the purpose of balancing. A LEGO compatible design allows you to change different tires. If you want to learn about PID or need an interesting programming toy product, BalaC will be a good choice

At present, there is no stock program, you will need to write the PID code by yourself.

Product Features

- Based on ESP32 + STM32
- Personality DIY
- Detachable Design
- Two wheel Drive
- Replaceable battery
- Program Platform: [UIFlow](#), [MicroPython](#), [Arduino](#)

Include

- 1x M5StickC
- 1x BalaC Base
- 2x Wheels
- 2x Wheel Connectors
- 2x 9G Servos
- 2x Elastics
- 2x Screws
- 1x Hex key
- 1x 16340 Battery

Application

- Balancing car

Specification

| Specification | Parameter |
|------------------------|--|
| ESP32-Pico-D4 | 240MHz dual core, 600 DMIPS, 520KB SRAM, Wi-Fi, dual mode Bluetooth |
| Servo | Rotation angle: 360 °; no load speed: 0.12 seconds / 60 degrees (4.8V) |
| Driver | L9110S |
| Slave | STM32F030F4P6 |
| Communication protocol | I2C: 0x38 |
| Battery | 16340, 3.7V, 700mAh, Li-ions rechargeable |
| Net weight | 162g |
| Gross weight | 206g |
| Product Size | 30*100*105mm |
| Package Size | 148*118*42mm |

EasyLoader

EasyLoader is a concise and fast program writer, which has a built-in case program related to the product. It can be burned to the main control by simple steps to perform a series of function verification.

[Download Windows Version Easyloader](#)

[Download MacOS Version Easyloader](#)

Description:



After power on, press the power key for calibration. At this time, the LED flashes and the calibration is successful, and the balance can be maintained automatically

Example

Arduino

Click here to download [examples](#)

UIFlow

(Not actual code for reference only) [Click here to download UIFlow](#)

