The power of Pixhawk®4 in a compact form

Product Features

- Half the footprint of the *Pixhawk® 4*
- The same FMU processor and memory resources as the *Pixhawk 4*
- Aluminum casing for great thermal performance
- Easy to connect to commercial ESCs
- The latest sensor technology from Bosch® and InvenSense®
- Redundant IMUs for reliable performance
- NuttX real-time operating system
- Pre-installed with the most recent PX4 firmware

The *Pixhawk® 4* Mini autopilot is designed for engineers and hobbyists who are looking to tap into the power of *Pixhawk 4* but are working with smaller drones. *Pixhawk 4 Mini* takes the FMU processor and memory resources from the *Pixhawk 4* while eliminating normally unused interfaces. This allows the *Pixhawk 4 Mini* to be small enough to fit in a 250mm racer drone. The *Pixhawk 4 Mini* is easy to install; the 2.54mm (0.1in) pitch connector makes it easier to connect the 8 PWM outputs to commercially available ESCs.

Pixhawk 4 Mini was designed and developed in collaboration with Holybro® and Auterion®. It is based on the Pixhawk FMUv5 design standard and is optimized to run PX4 flight control software.

Technical Specifications

- FMU Processor: STM32F765
  - 32 Bit Arm® Cortex®-M7, 216MHz, 2MB memory, 512KB RAM
- On-board sensors
  - Accel/Gyro: ICM-20689
  - Accel/Gyro: BMI055
  - Mag: IST8310
  - Barometer: MS5611
- GPS: ublox Neo-M8N GPS/GLONASS receiver; integrated magnetometer IST8310

Interfaces

- 8 PWM servo outputs
- 4 dedicated PWM/Capture outputs
- Dedicated R/C input for CPPM
- Dedicated R/C input for Spektrum / DSM and S.Bus with analog / PWM RSSI input
- 3 general purpose serial ports
  - 1 with full flow control
  - 1 with a separate 1A current limit
- 2 I2C ports
- 3 SPI buses
  - 1 internal high speed SPI sensor bus with 4 chip selects and 6 DRDYs
  - 1 internal low noise SPI bus dedicated for Barometer with 2 chip selects, no DRDYs
  - 1 internal SPI bus dedicated for FRAM
  - Supports dedicated SPI calibration FLASH located on sensor module
- 1 CANBuses for CAN ESC
  - CANBus has individual silent controls or ESC RX-MUX control
- Analog inputs for voltage / current of battery
- 1 additional analog inputs

Electrical Data

Voltage Ratings

- Power Brick Input: 4.75~5.5V
- USB Power Input: 4.75~5.25V
- Servo Rail Input: 0~24V
- Max current sensing: 120A

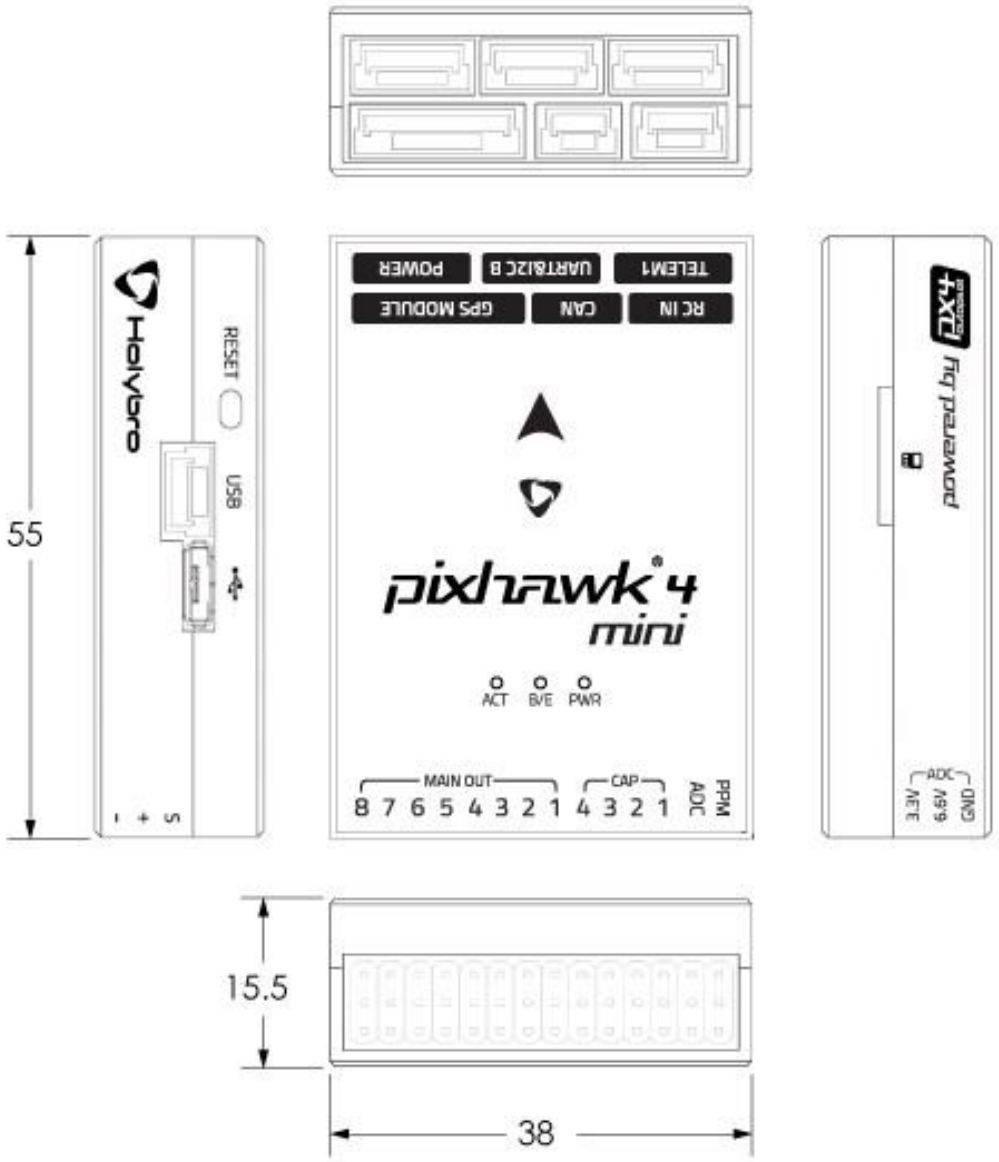
Mechanical Data

- Dimensions: 38x55x15.5mm
- Weight: 37.2g

Environmental Data, Quality & Reliability

- Operating temp. -40~85℃
- Storage temp. -40~85℃
- CE
- FCC
- RoHS compliant (lead-free)

Dimensions



DIMENSIONS IN MILLIMETERS

For more information visit:

www.dronecode.org
www.pixhawk.org