# **Autopilot Development**

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#### **Objective**

### Requirements

#### Hardware selection

- 1. Propellers
- 2. Actuators
- 3. Motor drivers
- 4. Power distribution unit
- 5. Power source
- 6. Airframe
- 7. Sensors
  - 7.1. Gyroscope
  - 7.2. Accelerometer
  - 7.3. Magnetometer
  - 7.4. Barometer
  - 7.5. LIDAR
  - 7.6. SONAR
  - 7.7. GPS
  - 7.8. Temperature sensor
  - 7.9. Humidity sensor
- 8. Processors
  - 8.1. Primary processor
  - 8.2. Secondary processor
- 9. Communication module
  - 9.1. Receiver
  - 9.2. Transceiver
- 10. Data logging module
  - 10.1. EEPROM
  - 10.2. SD card
  - 10.3. Flash drive
- 11. Audio-visual feedback module
  - 11.1. LED
  - 11.2. Buzzer

## Software development

## Test rig development