



THE INTELLIGENT BIKE

DESCRIPTION

Bicycle with electronic features that make life easier for the user. We will configure Raspberry-Pi in the bicycle and we'll show the data obtained in the web application.

LIST OF SENSORS

- ✚ [Rain Sensor](#)
- ✚ [Temperature Sensor](#)
- ✚ [Accelerometer Sensor](#)
- ✚ [Humiture Sensor](#)
- ✚ [Display Sensor](#)
- ✚ [LEDs Strip](#)
- ✚ [Light Sensor](#)

OVERVIEW

- ✚ The PowerBank AC Power provide energy to Pi.
- ✚ Pi publish the data by MQTT protocol and Heroku Server subscribe.
- ✚ Restful API made using Python & Django framework to consume by Web App.
- ✚ Front-End: Angular 6 framework with Material Design.
- ✚ The Pi's Internet is provided by HotSpot Mobile.
- ✚ We'll connect Mongo DB to mLab to save the data in a independent node.
- ✚ All things are connected by HTTP request.

