



Advanced Embedded Systems

Plant Health monitoring system.

Team members :

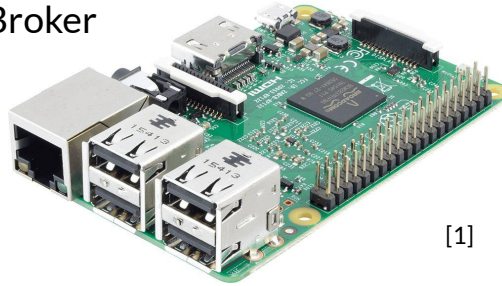
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Concept

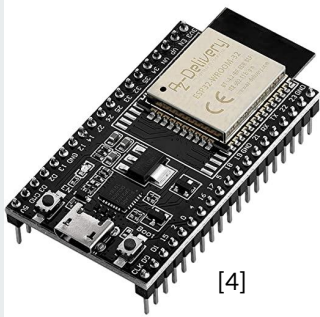
Hardware components used in the project.

Broker

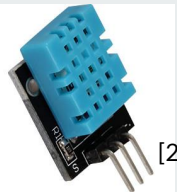


[1]

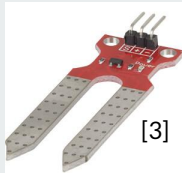
Client 01



[4]



[2]



[3]

Client 03



[7]

Client 02



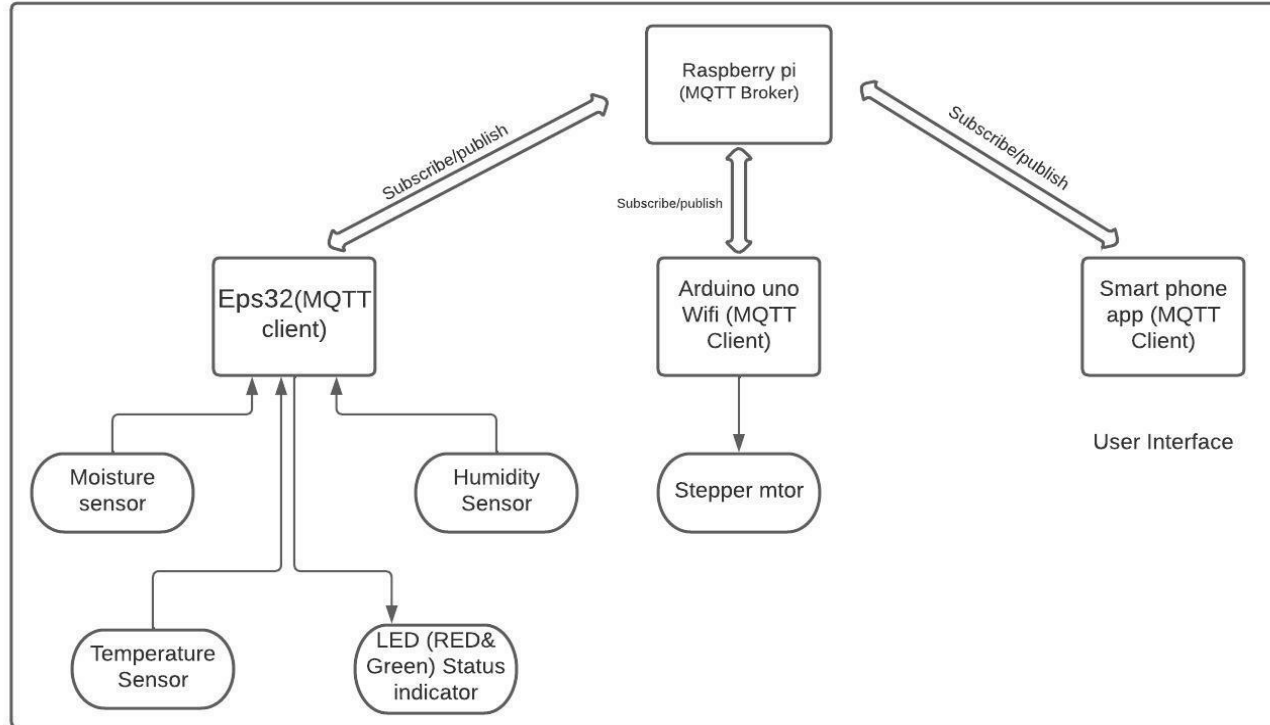
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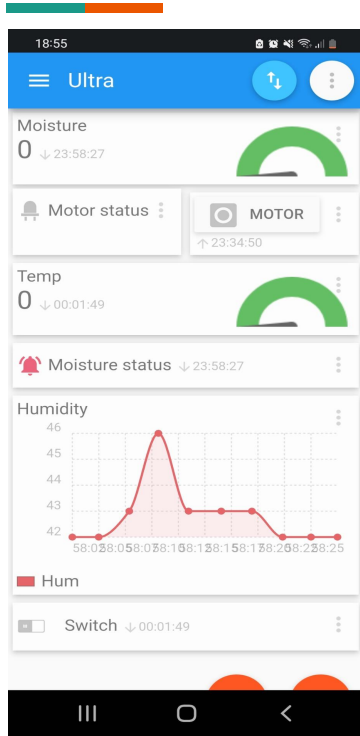


[6]

MQTT

(Message Queuing Telemetric Transport)







Automating the whole process of watering the plant

A simple python script is implemented to monitor the changes in the moisture level of the soil.

Applications / Use cases



- Offices
- Holiday



References

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- [3] https://www.reichelt.de/arduino-feuchtesensor-fuer-bodenfeuchte-ard-sen-wet1-p282511.html?PROVID=2788&gclid=CjwKCAjwtcCVBhA0EiwAT1fY79TXnUVht3-BB0SvqBkxO_Metz4OtC305AhsqIU8XDhH7D93AqykkhoCj_0QAvD_BwE
- [4] <https://www.amazon.de/ESP-32-Dev-Kit-V4-Parent/dp/B07Z83MF5W?th=1>
- [5] https://www.reichelt.de/arduino-uno-wifi-rev2-atmega-4809-arduino-uno-rev2-p248661.html?PROVID=2788&gclid=CjwKCAjwtcCVBhA0EiwAT1fY72fjJK2zmu35t0cO3TaVqIX53rqmufEVQivmeAEYSlqXZ9DDc4wwRoCFugQAvD_BwE
- [6] https://www.reichelt.de/entwicklerboards-schrittmotor-inkl-steuerung-uln2003-debo-moto1-p192146.html?PROVID=2788&gclid=CjwKCAjwtcCVBhA0EiwAT1fY72AfZkL5vcBqoo4m-7V_FgP7vVCvEDnr6O2wXquNZuJG9z2Nv_P_wBoC5iMQAvD_BwE
- [7] <https://lovepik.com/image-610825885/life-series-hand-drawn-cartoon-mobile-phone-iphone.html>