Innovative Projects- Raspberry-pi Using Python (CSE1003)

Phase –II Review Presentation

IoT Based Automatic Car Parking System

Submitted to the Presidency University, Bengaluru in partial fulfillment of the requirements for the Innovative Project- Raspberry-pi using Python

By:

IPR-101

Name	Roll Number
SHREYA RAVI KUMAR	20211CSE0229
VAIBHAV BHARADWAJ	20211CCS0052
NEHA R	20211CSE0224
SAHANA R PRASAD	20211CIT0066
KISHOR B	20211ECE0207

Under the supervision of:

Dr. Rajkumar N

Assistant Professor

Department of Computer Science Engineering

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PRESIDENCY UNIVERSITY

Private University Estd. in Karnataka State by Act No. 41 of 2013

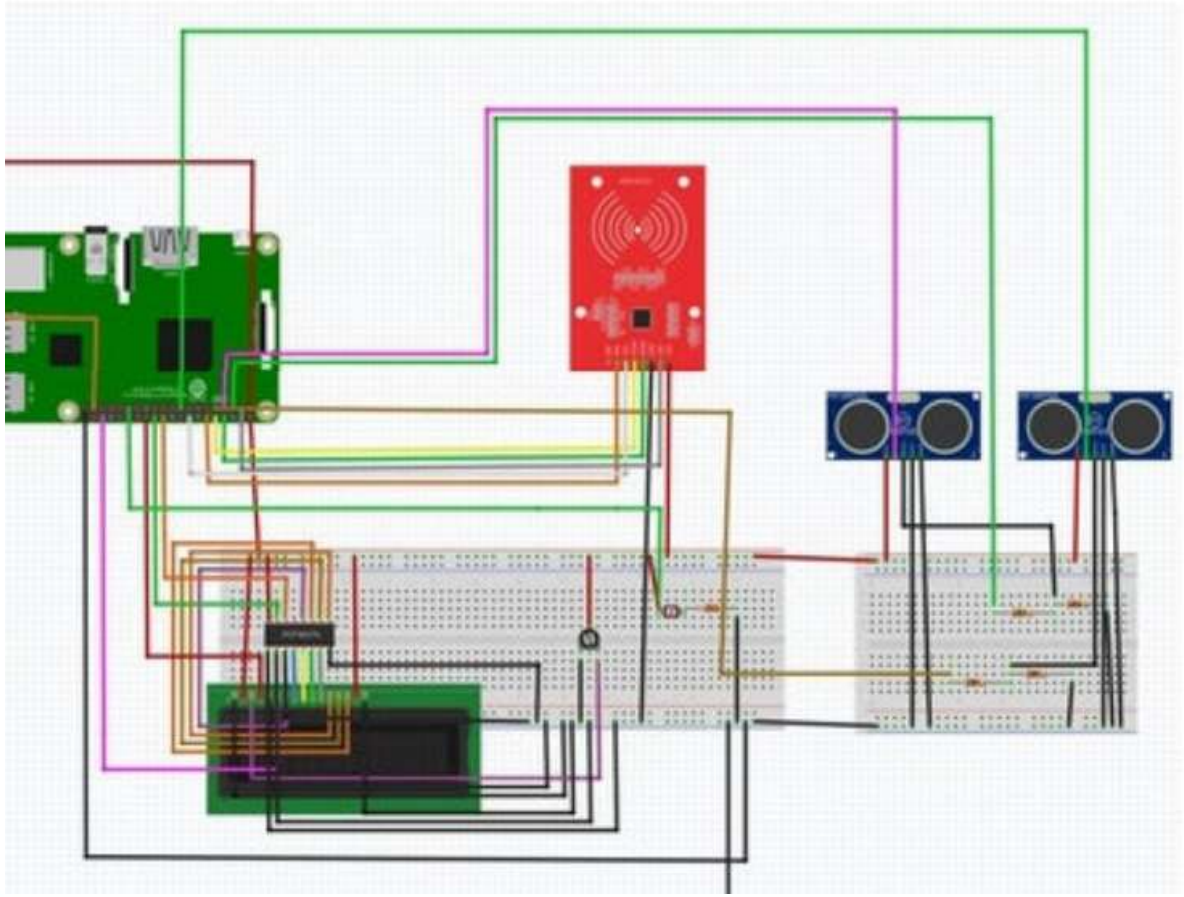
Project Brief Summery

- Smart Parking system helps to maintain the database for visitors, and it has authentication as well as auto-detection of charges based on parking time.
- IOT based parking management system allows for efficient parking space utilization using IOT technology. To demonstrate the concept, IR sensors are used to monitor the parking slot. This system reads the number of vacant parking slots and updates status in the server to allow for checking parking slot availability online. This allows users to check for available parking spaces online from anywhere and avail hassle free parking.
- Features: Webserver – Slot status | Database – Visitors | Authentication – Parking Time

Challenges Faced in Project

- Selecting the title of the project was a tedious and challenging task as we had to research possible industry-related projects and build on them.
- Researching hardware and software libraries pertaining to our project was also a demanding task.
- Since the start of the 3rd semester and our packed schedules, meeting offline has become a herculean task, and hence most of our discussions are held through the online platform.

Circuit/Block Diagram



Obtained Results so far.

As of Now 40% We have Completed the code part And tinker Cad circuit diagram

The assembling of parts will take place in the next 10 days and the trial run will be done

Final implementation will be done in the Final phase review

The Python Code Link for the simulation is here :

BETA CODE MODIFIED IPR-101 AUTOMATIC CAR PARKING SYSTEM USING IOT

https://colab.research.google.com/drive/13mvvWFR7GYnLx8sJG0KcmsikgtIVqeWp?usp=sharing

Project Timeline

Note: Write in the below table what u have achieved in each phase and what you will be achieving before phase 3

Phase 1	Phase 2	Phase 3
Our project topic was approved on 23rd September. A brief presentation was given on 13th October, 2022	40% of the work completed: - Project documentation - Tinkercad circuit - software code - components brought	Assembly and final review of our project in December

Q&A

Thank you !!