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Final Project

PROJECT NAME: PARKING MANAGEMENT SYSTEM

PROJECT REQUIREMENTS:

User Management:

The user is able will be able to register on pressing the sign up on the signup page.

After successful signup, and email is sent and the user and the user waits for the confirmation/ activation of the by the administrator

The user during activation also assigns the location where the user will work.

The admin is the one with the ability to edit the user information.

Location Management:

Other than the users where the admin is the only one allowed to access the data, the user can add location name and the number of parking spots. The locations can be edited and deleted

Cars management

This is where the cars that entered in the parking spot are managed. When a car enters in the parking location, depending on the user and the location assigned to them, then the car is entered in the system with the location of the user. The time is automatically assigned to the car and when it goes out, the time is also assigned to the car as the time of exit and that is used to calculate the time spent in accordance with the pricing.

Authentication and Authorization:

The system is secured with a login, where only authenticated users have access the system and the where every user has restrictions depending on the user privilege(User or Admin).

Project Plan: Parking Management System

1. Project Initiation

Objective:

Project scope

The project will do user management, car management, price assignment, and location management.

Goals

Reduction of costs spent on printed tickets.

Increase productivity of the works(users) since time the car it entered, exited and amount to be paid is assigned automatically.

Increase profits. Since data is safely kept, there is supervision.

Timeline

The project took 2 weeks for development.

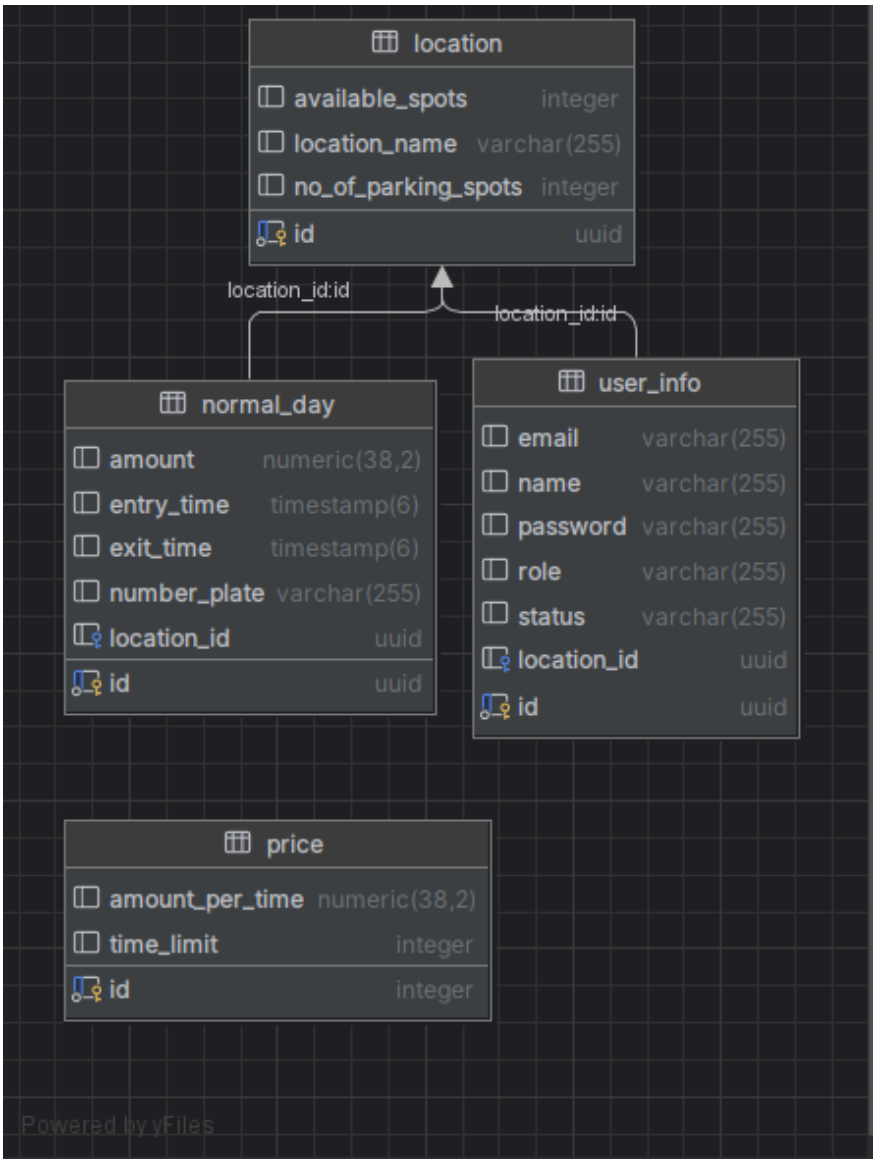
Resources

IntelliJ IDE(Ultimate version)

PostgreSQL(Database on render.com)

ChatGPT

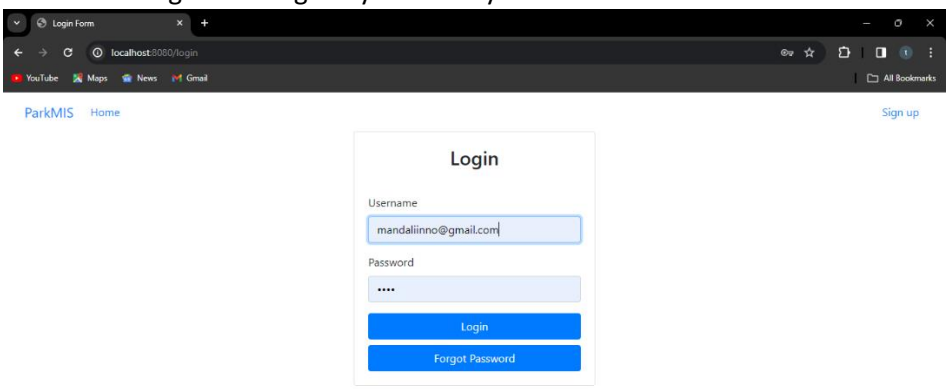
Database schema

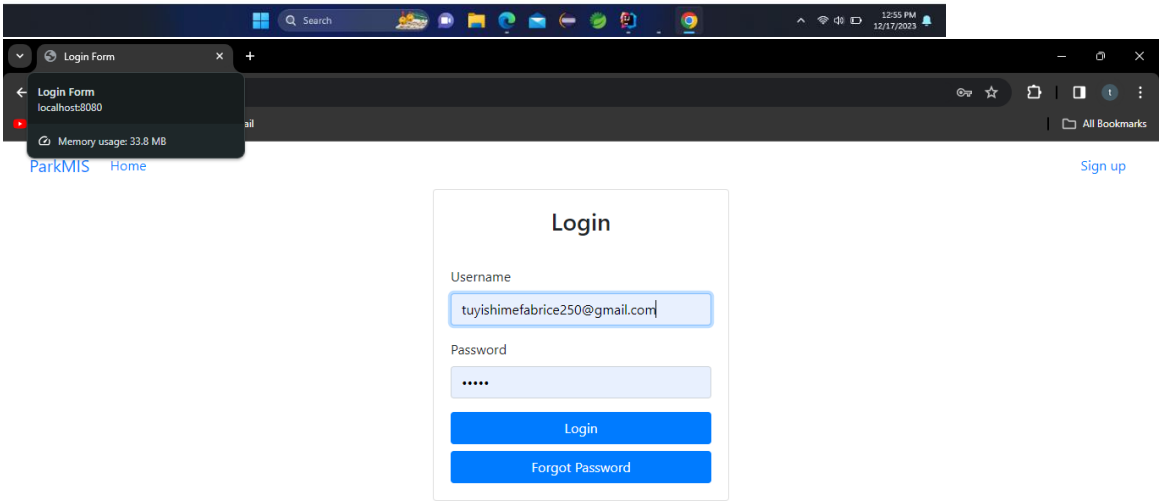


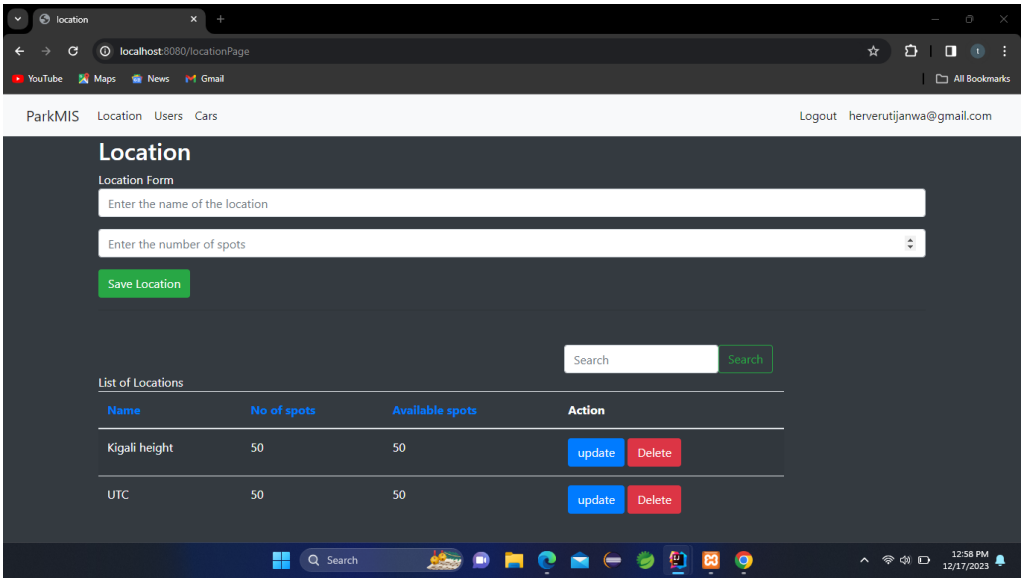
User Documentation

On opening the application, you go to the welcome page

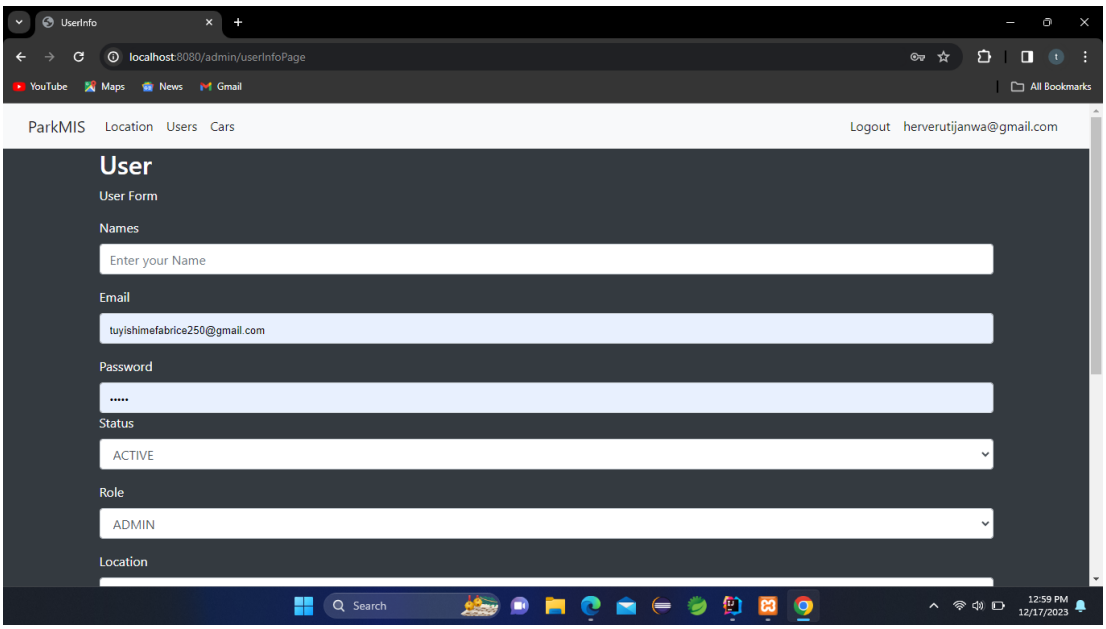
You can the sign in or login if you already have an account



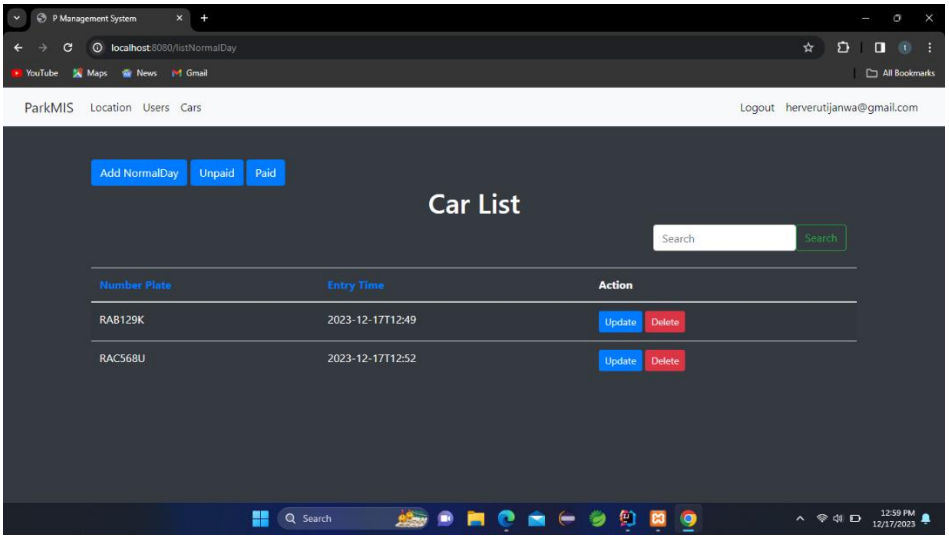




User Management



Car management



User Credentials

Username: mandaliinno@gmail.com

Password:12345

Technical Documentation

The languages used are Java, HTML, CSS and JavaScript.

Spring boot were the frame work user.

Spring MVC architecture was used during development.