

HCM University of Technology
Faculty of Computer Science & Engineering



Software Engineering

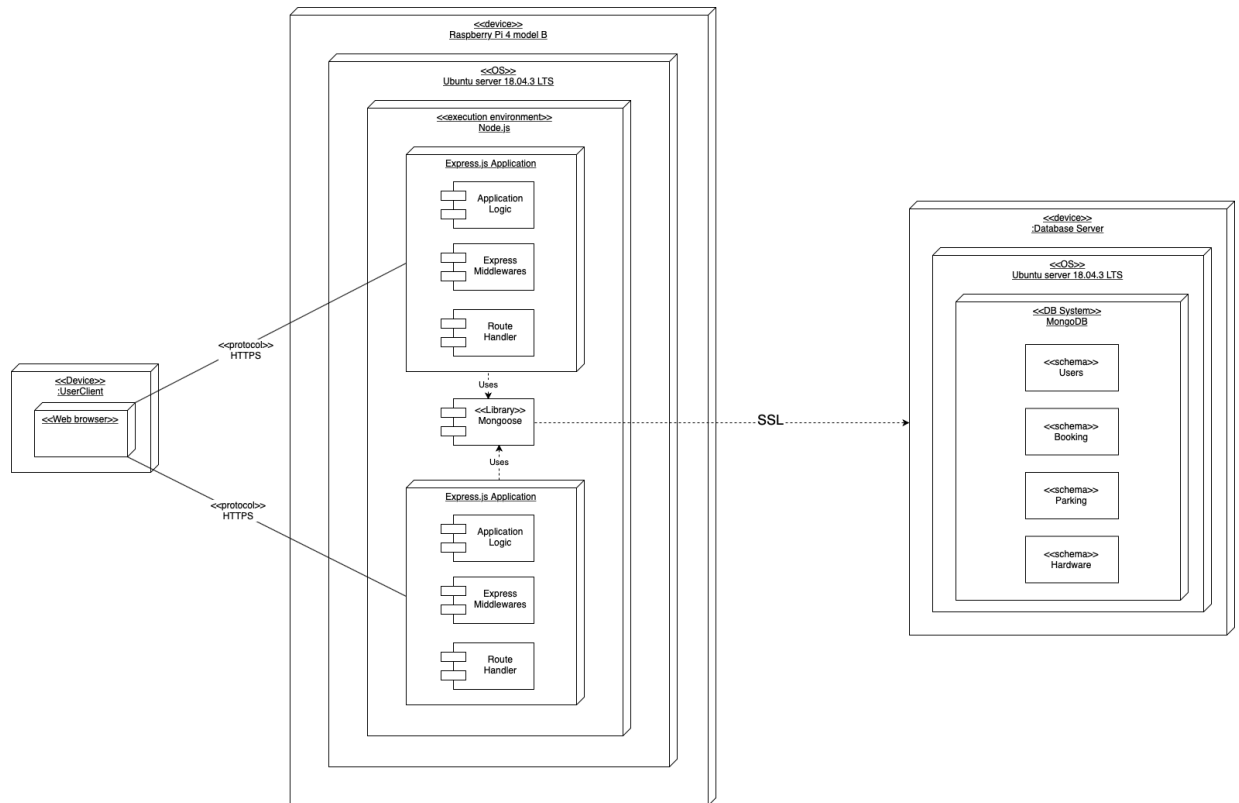
Assignment 3: Architectural design

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Project: Smart Parking

Instructor:
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1 Deployment view:



- The deployment diagram shows that web browser on the client device accesses to server by protocol HTTPS.
- Server device is Raspberry pi 4 model B.
- On Ubuntu server OS version 18.04.3 LTS, we use execution environment that is Node.js and use.
- Express.js application to process data.
- First Express.js application is used for process data of users.
- Second Express.js application is used for configuring data of IT managers.
- Mongoose library is used for convey data to the Database server.
- MongoDB stores several schemas of data including Users schema, Booking schema, Parking schema, Hardware schema.

2 Deployment View:

2.1 Package Diagram:

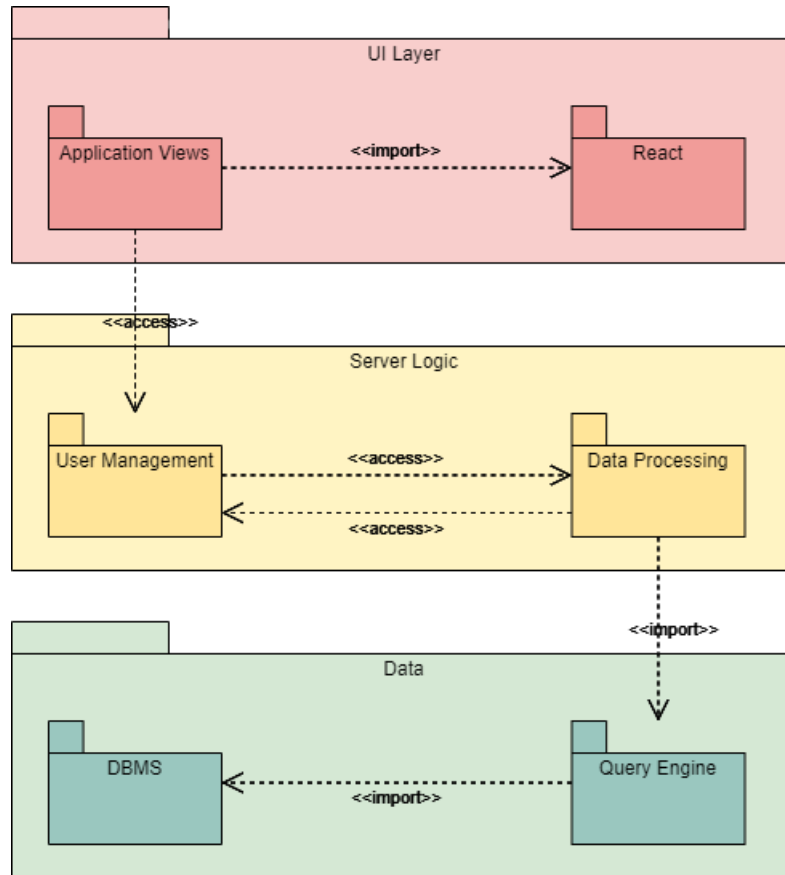


Figure 1: Package Diagram for User Management

2.2 Component Diagram:

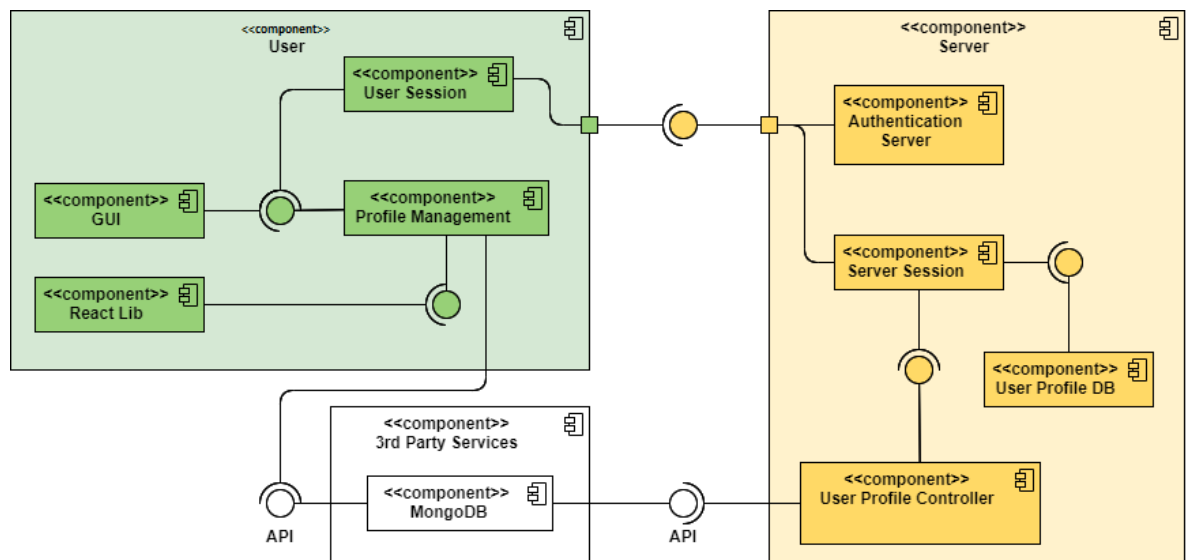


Figure 2: Component Diagram for User Management