

❖ SDA

❖ Lab Final:

➤ Submitted By: Noman Shakir

➤ Submitted To: Sir Mukhtiar  
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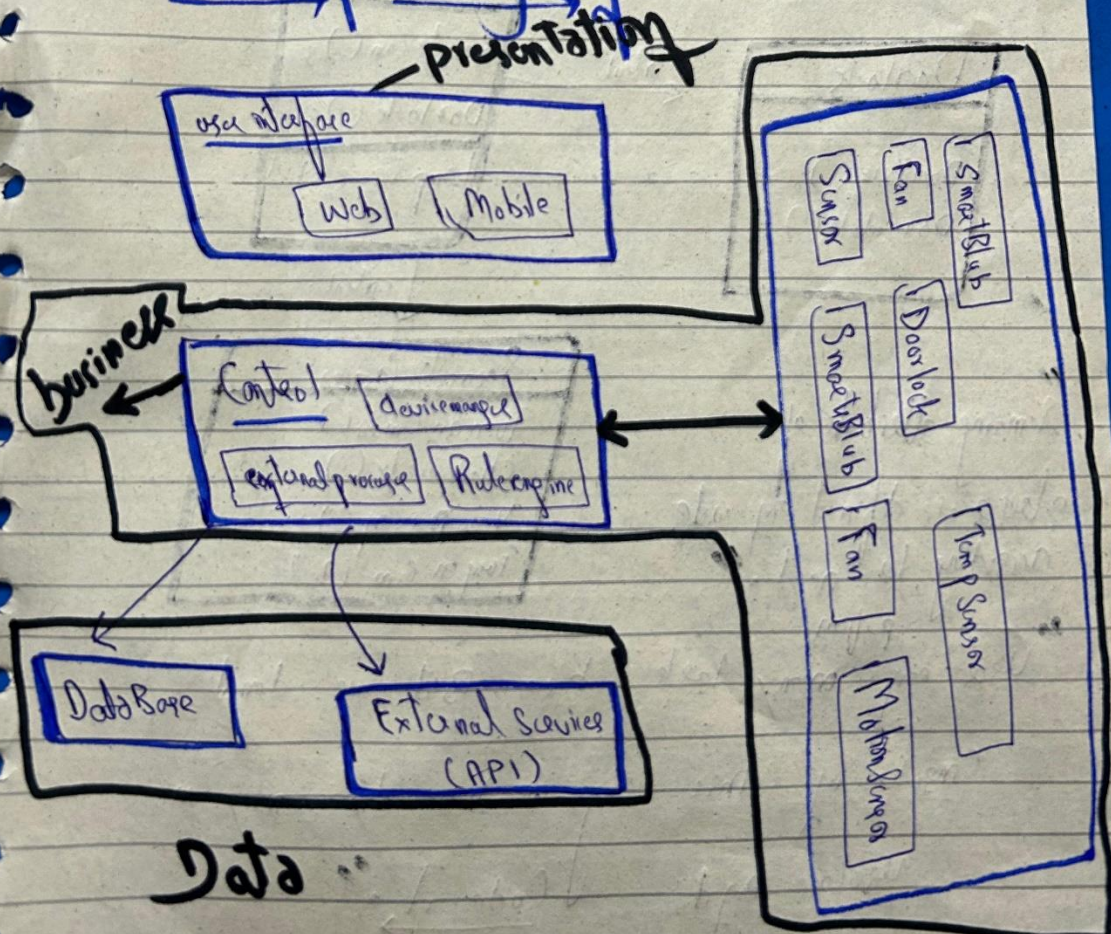
➤ Class = BSE-5A

①  
Name:- Noman Shakir :-

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Case Study :- Home automation System :-

Architecture Diagram :-



We will use Layer Architecture of GI :-

Along with this we can also use Microservices

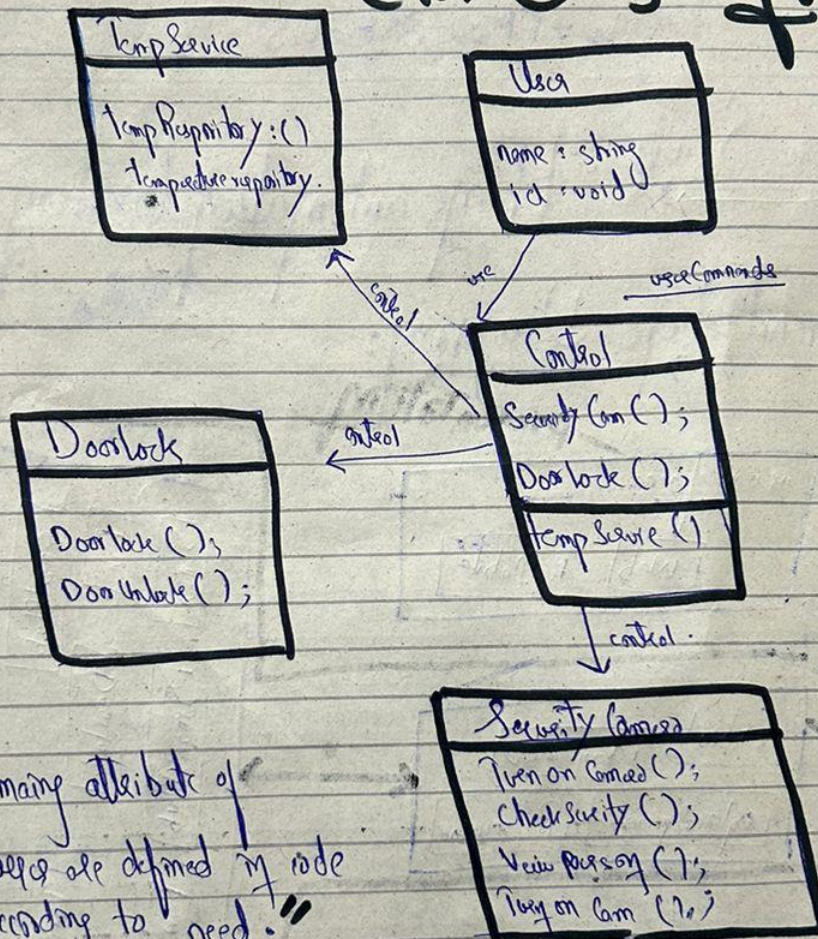


Along with use microservice for scalability and making development easy.

(2)

Doorlock, Security Camera, User Commands, Temp Repository

## Class Diagram:-



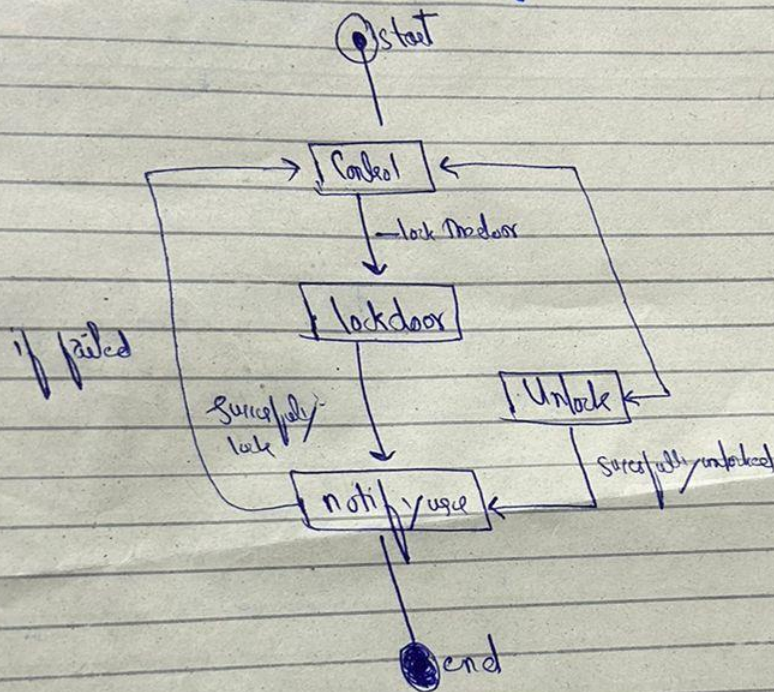
"Remaining attribute of classes are defined in code according to need."

Use can many task here But we don't consider in this cuz we have to only one User and Code it."

User can control Cameras, Doorlock, & Temperature Services



## State Transition :-



## In Code :-

We have presentation layer, Business layer and data layer. "if we implement it in Node.js we have to add more things and use 3rd party Connection".

So we will use Java for this "to achieve basic understanding of our use case".