



Web Based Get Rooms

A Report for the Evaluation 3 of Project 2

Submitted By

Tanuj Kumar Bhardwaj

(1613101878 / 17SCSE101945)

in partial fulfillment for the award of the degree

of

Bachelor in Technology

IN

Computer Science and Engineering

School of Computing Science and Engineering

Under the Supervision of

Dr. Sansar Singh Chauhan

Professor (SCSE)

APRIL/MAY-2020



School of Computing Science and Engineering

BONAFIDE CERTIFICATE

Certified that this project report “ WEB BASED GET ROOMS ” is the bonafide work of “ TANUJ KUMAR BHARDWAJ (1613101878) ” who carried out the project work under my supervision.

Signature of Head

Dr. Munish Sabharwal

Professor & Dean

School of Computing Science &

Engineering

Signature of Supervisor

Dr. Sansar Singh Chauhan

Professor

School of Computing Science &

Engineering

TABLE OF CONTENTS

PAGE NO.

| | | |
|-------|------------------------------|----|
| 1. | Abstract..... | 1 |
| 2. | Introduction..... | 2 |
| 2.1 | Project Objective..... | 3 |
| 2.2 | Project Overview..... | 3 |
| 2.3 | Project Scope..... | 4 |
| 2.4 | Study of the Systems..... | 4 |
| 3. | Existing System..... | 8 |
| 4. | Proposed System..... | 8 |
| 5. | Implementation..... | 9 |
| 5.1 | System Design..... | 9 |
| 5.2 | Input and Output Design..... | 10 |
| 5.3 | Database Design..... | 11 |
| 5.4 | System Tools..... | 11 |
| 5.5.1 | Front End..... | 11 |
| 5.5.2 | Back End..... | 12 |
| 5.5 | Database Tables..... | 13 |
| 5.6 | E R Diagram..... | 16 |
| 5.7 | Dataflow Diagram..... | 19 |
| 6. | Screenshot..... | 23 |
| 7. | Conclusion..... | 32 |
| | References | |

- **Abstract:**

The project “Online Hotel Booking System” is a system based on accessing the internet to book for rooms in a hotel. The purpose of this study is to develop and implement an online hotel reservation system for hotel, that will replace the manual method of booking for hotel rooms. The previous system for booking rooms were faced with so many problems like, delay in processing the customer booking or paying for rooms that is below or beyond his standard, causes difficulty for emergency booking.

The objects-oriented analysis and design methodology (OOADM) was therefore used to analyse the system in order to discover the various objects involved and how they interact with one another so that a new and improved system can be defined.

The use of online view of room rates and uploading of available rooms and facilities was used for the new system so that the customer can view and make his choice before arrival, and also in the case of emergency travelling. This new system assisted the hotel owners in managing their hotels, because they can also regulate the receptionist moves and avoid fraudulent activities. It also increased the efficiency of the hotel managers and also their profit margin, once they have better and good facilities.

INTRODUCTION

This project is a web based room booking system. The project objective is to book online room in any hotel into android platform.

Online room booking is the process whereby consumers directly book rooms from any hotel in any city in real-time, without an intermediary service, over the Internet. It is a form of electronic commerce. This project is an attempt to provide the advantages of online room booking to customers. It helps book the room in the hotel anywhere through internet by using an android device.

The manual method of booking for hotel rooms in Nigeria is characterized with numerous problems. Some of these are :customers having little or no information about the hotels within their vicinity; A guest checking into a hotel room that is either too expensive or too unbecoming for his/her personality; Prolonged delay by the receptionist in retrieving certain information about any particular guest that checked into the hotel whenever such information being demanded by the manager; The foul play that sometimes occurs when information about the guest that checked into a hotel are not officially documented by the receptionist etc. All these problems and more would definitely make a hotel experience a down turn in business

The main purpose of this work is therefore to develop a web application program that would circumvent all those problems encountered in the manual hotel booking system, so that customers can easily go online with their mobile phones, tablets or laptops in order to browse the

relevant information they need about the hotels within their locality so that they can book for the appropriate suite that is within their budget.

PROJECT OBJECTIVE:

The objective of the project is to make an application in android platform to book room in any hotel. In order to build such an application complete web support need to be provided. A complete and efficient web application which can provide the online room booking experience is the basic objective of the project. The web application can be implemented in the form of an android application with web view.

PROJECT OVERVIEW:

Customers can easily go online with their mobile phones or laptops to browse about hotels within their vicinity. Guests can be able to book for rooms within their budgets after seeing and accessing these hotels within their vicinity. Receptionists can easily access customer's information online without delay or with little delay. Fraud done by the receptionist by not registering every customer will not occur because the customer's details will be online and can be accessed by the managers too. The central concept of the application is to allow the customer to book room virtually using the Internet. The Server process the customers and the rooms are booked to the address submitted by them. The application was designed into two modules first is for the customers who wish to book the room. Second is for the storekeepers who maintains and updates the information pertaining to the articles and those of the customers. The end user of this product is a departmental store where the application is hosted on the web and the administrator maintains the database. The application which is deployed at the customer database, the details

of the items are brought forward from the database for the customer view based on the selection through the menu and the database of all the products are updated at the end of each transaction.

- **PROJECT SCOPE:**

This study is aimed at finding out how effective the online room reservation or booking system will improve the operations of room reservations in hotels. However, out of the several departments that make up the hotel, this research project is restricted to only one section (room reservation) section.

- **STUDY OF THE SYSTEM**

- **MODULES:**

The system after careful analysis has been identified to be presented with the following modules and roles. The modules involved are:

- Administrator
- Moderators
- Users

- **ADMINISTRATOR:**

The administrator is the super user of this application. Only admin have access into this admin page. Admin may be the owner of the hotel. The administrator has all the information about all the users and about all rooms.

This module is divided into different sub-modules.

1. Manage Booking

2. Edit/Delete Booking

3. See list of room

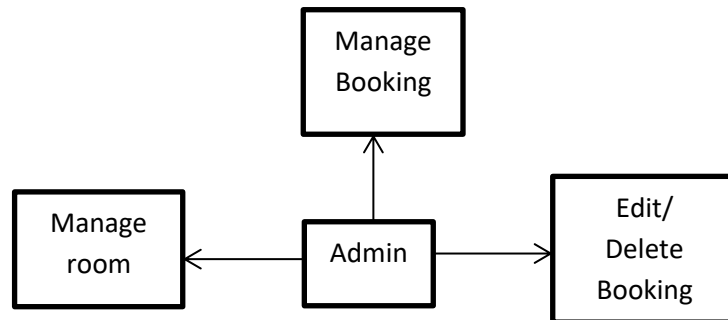


Fig 1.1: Admin module

➤ **MANAGE BOOKING:**

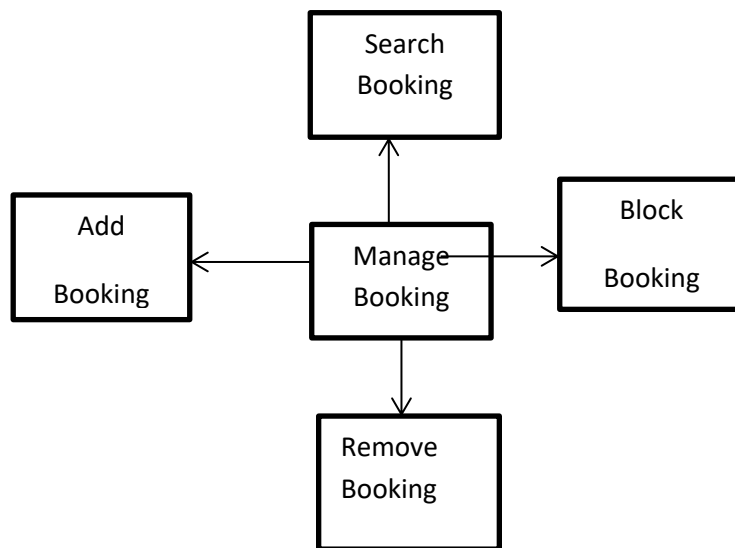


Fig 1.2: Manage Booking

- Add Booking :

Only admin is having the privilege to add a booking.

- Block Booking :

Admin can block the booking system of the rooms.

- Remove Booking :

Admin has privilege to delete a booking rooms who was added.

- Search Booking:

All existing booked rooms can be viewed by the administrator as a list. If there is number of rooms and admin need to find one of them, the admin can search for a room by name/room number.

➤ **MANAGE ROOM :**

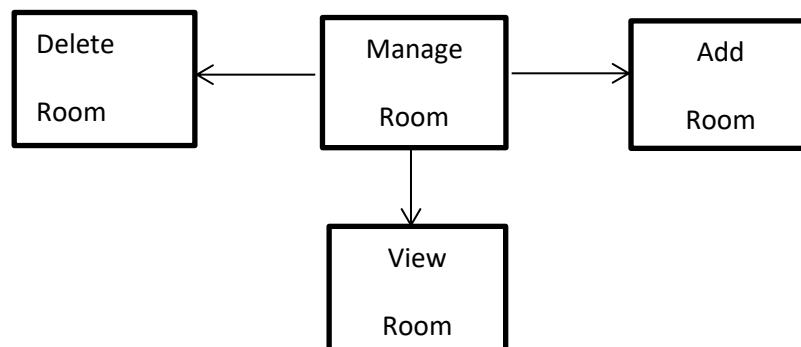


Fig 1.3: Manage Room

- Add Room

Admin can add room in the list.

- Delete Room

Administrator can delete the room based on the rooms in the hotel.

- Search Room

Admin will have a list view of all the existing booked rooms. He can also search for a particular room by name or number.

➤ **EDIT/DELETE BOOKING :**

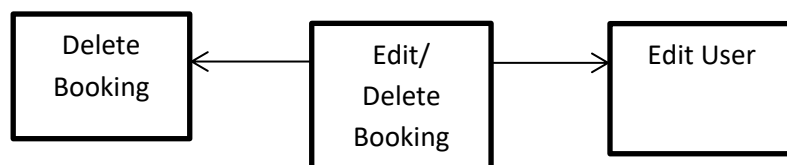


Fig 1.4: Edit/ delete booking

- Add Users

Admin has privileges to add a user directly by providing the details.

- Delete & Block/Unblock Users:

Administrator has a right to delete or block or unblock a user. The default status of a new user registered is set as blocked. The admin must accept the new user by unblocking him.

- **EXISTING SYSTEM**

1. It is less user-friendly.
2. User must go to hotel option and select rooms.
3. It is difficult to identify the required room.
4. Description of the hotel limited.
5. It is a time consuming process
6. Not in reach of distant users.

- **PROPOSED SYSTEM:**

In the proposed system customer need not go to the hotel to book room. He can book the room, he wishes to book through the application in his Smartphone.

- **SYSTEM DESIGN**

System design is the solution for the creation of a new system. This phase focuses on the detailed implementation of the feasible system. It emphasizes translating design specifications to performance specifications. System design has two phases of development.

- Logical design
- Physical design

During the logical design phase, the analyst describes inputs (sources), outputs (destinations), databases (data stores) and procedures (data flows) all in a format that meets the user requirements. The analyst also specifies the needs of the user at a level that virtually determines the information flow in and out of the system and the data resources. Here, the logical design is done through data flow diagrams and database design. The physical design is followed by physical design or coding. Physical design produces the working system by defining the design specifications, which specify exactly what the candidate system must do. The programmers write the necessary programs that accept input from the user, perform necessary processing on accepted data and produce the required report on a hard copy or display it on the screen.

- **INPUT AND OUTPUT DESIGN**

- **INPUT DESIGN:**

Input design is the link that ties the information system into the world of its users. The input design involves determining the inputs, validating the data, minimizing the data entry and provides a multi-user facility. Inaccurate inputs are the most common cause of errors in data processing. Errors entered by the data entry operators can be controlled by input design. The user-originated inputs are converted to a computer based format in the input design. Input data are collected and organized into groups of similar data. Once identified, the appropriate input media are selected for processing. All the input data are validated and if any data violates any conditions, the user is warned by a message. If the data satisfies all the conditions, it is transferred to the appropriate tables in the database. In this project the student details are to be entered at the time of registration. A page is designed for this purpose which is user friendly and easy to use. The design is done such that users get appropriate messages when exceptions occur.

- **OUTPUT DESIGN:**

Computer output is the most important and direct source of information to the user. Output design is a very important phase since the output needs to be in an efficient manner. Efficient and intelligible output design improves the system relationship with the user and helps in decision making. Allowing the user to view the sample screen is important because the user is

the ultimate judge of the quality of output. The output module of this system is the selected notifications.

- **DATABASE**
 - **DATABASE DESIGN:**

Databases are the storehouses of data used in the software systems. The data is stored in tables inside the database. Several tables are created for the manipulation of the data for the system.

Two essential settings for a database are

Primary Key- The field that is unique for all the record occurrences.

Foreign Key- The field used to set relation between tables.

Normalization is a technique to avoid redundancy in the tables.

– **SYSTEM TOOLS**

The various system tools that have been used in developing both the front end and the back end of the project.

– **FRONT END:**

JSP, HTML, CSS, JAVA SCRIPT, ANDROID are utilized to implement the frontend.

- **Java Server Pages (JSP)**

Different pages in the applications are designed using jsp. A Java Server Pages component is a type of Java servlet that is designed to fulfill the role of a user interface for a Java web application. Web developers write JSPs as text files that combine HTML or XHTML code, XML

elements, and embedded JSP actions and commands. Using JSP, one can collect input from users through web page.

- **HTML (Hyper Text Markup Language)**

HTML is a syntax used to format a text document on the web.

- **CSS (Cascading Style Sheets)**

CSS is a style sheet language used for describing the look and formatting of a document written in a markup language.

- **Java Script**

JS is a dynamic computer programming language. It is most commonly used as part of web browsers, whose implementations allow client-side scripts to interact with the user, control the browser, communicate asynchronously, and alter the document content that is displayed.

Java Script is used to create pop-up windows displaying different alerts in the system like “User registered successfully”, “Product added to cart” etc.

- **Android**

The application is delivered to customer through an android application. So android platform is used to develop the user application.

– **BACK END**

The back end is implemented using MySQL which is used to design the databases.

- **MySQL**

MySQL is the world's second most widely used open-source relational database management system (RDBMS). The SQL phrase stands for Structured Query Language. An application software called Navicat was used to design the tables in MySQL.

- Database Tables:

- Accounts:

The screenshot shows the 'accounts_profile' table in a SQLite database. The table has four columns: 'id', 'image_path', 'user_id', and 'phone'. The data is as follows:

| id | image_path | user_id | phone |
|----|-------------------|---------|------------|
| 1 | default.jpg | 5 | 7823114532 |
| 2 | profile_pics/p... | 6 | 9722334411 |
| 3 | profile_pics/p... | 7 | 8711342145 |
| 4 | default.jpg | 9 | 9811234533 |
| 5 | default.jpg | 10 | 9876231144 |
| 6 | default.jpg | 11 | 9877653211 |
| 7 | profile_pics/p... | 12 | 9876231123 |

- Users:

The screenshot shows the 'auth_user' table in a SQLite database. The table has twelve columns: 'id', 'password', 'last_login', 'is_superuser', 'username', 'first_name', 'email', 'is_staff', 'is_active', 'date_joined', and 'last_name'. The data is as follows:

| id | password | last_login | is_superuser | username | first_name | email | is_staff | is_active | date_joined | last_name |
|----|-----------------|-----------------|--------------|------------------|------------|------------------|----------|-----------|-----------------|-----------|
| 1 | pbkdf2_sha25... | 2020-02-14 0... | 1 | admin | | | 1 | 1 | 2019-05-21 0... | |
| 2 | pbkdf2_sha25... | NULL | 0 | vijay.gupta@... | Vijay | vijay.gupta@... | 0 | 1 | 2019-05-22 1... | Gupta |
| 3 | pbkdf2_sha25... | 2019-05-23 0... | 0 | pankaj.mishra... | Pankaj | pankaj.mishra... | 0 | 1 | 2019-05-22 1... | Mishra |
| 4 | pbkdf2_sha25... | 2019-05-23 1... | 0 | manoj.pande... | Manoj | manoj.pande... | 0 | 1 | 2019-05-22 1... | Pandey |
| 5 | pbkdf2_sha25... | NULL | 0 | vijay.sankar@... | Vijay | vijay.sankar@... | 0 | 1 | 2019-05-22 1... | Sankar |
| 6 | pbkdf2_sha25... | 2019-06-02 0... | 0 | vinay.pathak... | Vinay | vinay.pathak... | 0 | 1 | 2019-05-29 1... | Pethak |
| 7 | pbkdf2_sha25... | 2019-06-03 1... | 0 | mahima.gupt... | Mahima | mahima.gupt... | 0 | 1 | 2019-06-03 0... | Gupta |
| 8 | pbkdf2_sha25... | 2020-04-30 0... | 0 | ranjan.gupta... | Ranjan | ranjan.gupta... | 0 | 1 | 2020-02-12 1... | Gupta |

Admin log:

DB Browser for SQLite - C:\Users\dell\Desktop\getrooms\db.sqlite3

File Edit View Tools Help

New Database Open Database Write Changes Revert Changes Open Project Save Project Attach Database Close Database

Database Structure Browse Data Edit Pragma Execute SQL

Table: django_admin_log

| id | action_time | object_id | object_repr | change_message | content_type_id | user_id | action_flag |
|--------|-----------------|-----------|-----------------|------------------|-----------------|---------|-------------|
| Filter | Filter | Filter | Filter | Filter | Filter | Filter | Filter |
| 1 | 2019-05-21 0... | 1 | Hotel 1 | [{"added": {}} | 7 | 1 | 1 |
| 2 | 2019-05-21 0... | 2 | Hotel 2 | [{"added": {}} | 7 | 1 | 1 |
| 3 | 2019-05-21 0... | 3 | Hotel 3 | [{"added": {}} | 7 | 1 | 1 |
| 4 | 2019-05-21 0... | 4 | Hotel 4 | [{"added": {}} | 7 | 1 | 1 |
| 5 | 2019-05-21 0... | 4 | Hotel 4 | [{"changed": ... | 7 | 1 | 2 |
| 6 | 2019-05-21 0... | 5 | Hotel 5 | [{"added": {}} | 7 | 1 | 1 |
| 7 | 2019-05-21 0... | 6 | Hotel 6 | [{"added": {}} | 7 | 1 | 1 |
| 8 | 2019-05-21 0... | 1 | Hotel 1 | [{"changed": ... | 7 | 1 | 2 |
| 9 | 2019-05-21 0... | 2 | Hotel 2 | [{"changed": ... | 7 | 1 | 2 |
| 10 | 2019-05-21 1... | 1 | Delux | [{"added": {}} | 8 | 1 | 1 |
| 11 | 2019-05-21 1... | 2 | Classic | [{"added": {}} | 8 | 1 | 1 |
| 12 | 2019-05-21 1... | 3 | Super Delux | [{"added": {}} | 8 | 1 | 1 |
| 13 | 2019-05-21 1... | 4 | Family | [{"added": {}} | 8 | 1 | 1 |
| 14 | 2019-05-21 1... | 5 | Couple Friendly | [{"added": {}} | 8 | 1 | 1 |
| 15 | 2019-05-21 1... | 6 | Luxurious | [{"added": {}} | 8 | 1 | 1 |
| 16 | 2019-05-21 1... | 1 | Hotel 1 | [{"changed": ... | 7 | 1 | 2 |
| 17 | 2019-05-21 1... | 2 | Hotel 2 | [{"changed": ... | 7 | 1 | 2 |
| 18 | 2019-05-21 1... | 3 | Hotel 3 | [{"changed": ... | 7 | 1 | 2 |
| 19 | 2019-05-21 1... | 4 | Hotel 4 | [{"changed": ... | 7 | 1 | 2 |

1 - 19 of 91

Go to: 1

UTF-8

Content:

DB Browser for SQLite - C:\Users\dell\Desktop\getrooms\db.sqlite3

File Edit View Tools Help

New Database Open Database Write Changes Revert Changes Open Project Save Project Attach Database Close Database

Database Structure Browse Data Edit Pragma Execute SQL

Table: django_content_type

| id | app_label | model |
|--------|--------------|-------------|
| Filter | Filter | Filter |
| 1 | admin | logentry |
| 2 | auth | permission |
| 3 | auth | group |
| 4 | auth | user |
| 5 | contenttypes | contenttype |
| 6 | sessions | session |
| 7 | hotels | hotel |
| 8 | hotels | room |
| 9 | accounts | profile |
| 10 | hotels | booking |

1 - 10 of 10

Go to: 1

UTF-8

— Booking:

DB Browser for SQLite - C:\Users\dell\Desktop\getrooms\db.sqlite3

File Edit View Tools Help

New Database Open Database Write Changes Revert Changes Open Project Save Project Attach Database Close Database

Database Structure Browse Data Edit Pragma Execute SQL

Table: hotels_booking

| | id | check_in_date | check_out_date | umber_of_room | umber_of_gues | total_amount | customer_id | hotel_id | room_id |
|----|--------|-----------------|-----------------|---------------|---------------|--------------|-------------|----------|---------|
| | Filter | Filter | Filter | Filter | Filter | Filter | Filter | Filter | Filter |
| 1 | 2 | 2019-05-31 1... | 2019-06-01 1... | 1 | 1 | 1500.0 | 10 | 1 | 7 |
| 2 | 3 | 2019-06-01 1... | 2019-06-04 1... | 2 | 4 | 2000.0 | 10 | 1 | 1 |
| 3 | 4 | 2019-05-31 1... | 2019-06-03 1... | 1 | 2 | 8000.0 | 10 | 2 | 19 |
| 4 | 5 | 2019-05-31 1... | 2019-06-03 1... | 1 | 2 | 4000.0 | 10 | 2 | 20 |
| 5 | 6 | 2019-05-31 1... | 2019-06-03 1... | 1 | 2 | 3000.0 | 11 | 3 | 3 |
| 6 | 7 | 2020-02-14 1... | 2020-02-16 1... | 1 | 1 | 2500.0 | 12 | 2 | 13 |
| 7 | 8 | 2020-03-09 1... | 2020-02-14 1... | 1 | 1 | 1500.0 | 12 | 1 | 7 |
| 8 | 9 | 2020-02-19 1... | 2020-02-21 1... | 1 | 1 | 2000.0 | 12 | 1 | 8 |
| 9 | 10 | 2020-02-18 1... | 2020-02-19 1... | 1 | 1 | 2500.0 | 12 | 2 | 13 |
| 10 | 11 | 2020-03-30 1... | 2020-04-01 1... | 1 | 1 | 2500.0 | 12 | 2 | 13 |

1 - 10 of 10

Go to: 1

UTF-8

— Rooms:

DB Browser for SQLite - C:\Users\dell\Desktop\getrooms\db.sqlite3

File Edit View Tools Help

New Database Open Database Write Changes Revert Changes Open Project Save Project Attach Database Close Database

Database Structure Browse Data Edit Pragma Execute SQL

Table: hotels_room

| | id | type | total_rooms | available_rooms | price | capacity | added_date | updated_date | image_path | hotel_id |
|----|--------|-----------------|-------------|-----------------|--------|----------|-----------------|-----------------|----------------|----------|
| | Filter | Filter | Filter | Filter | Filter | Filter | Filter | Filter | Filter | Filter |
| 1 | 1 | Classic | 5 | 3 | 500 | 2 | 2019-05-21 1... | 2019-06-01 1... | rooms_image... | 1 |
| 2 | 2 | Delux | 10 | 10 | 1000 | 2 | 2019-05-21 1... | 2019-05-21 1... | rooms_image... | 2 |
| 3 | 3 | Super Delux | 5 | 4 | 1500 | 2 | 2019-05-21 1... | 2019-06-03 0... | rooms_image... | 3 |
| 4 | 4 | Family | 5 | 5 | 2000 | 4 | 2019-05-21 1... | 2019-05-21 1... | rooms_image... | 4 |
| 5 | 5 | Couple Friendly | 10 | 10 | 1000 | 2 | 2019-05-21 1... | 2019-05-21 1... | rooms_image... | 5 |
| 6 | 6 | Luxurious | 10 | 10 | 2000 | 2 | 2019-05-21 1... | 2019-05-22 0... | rooms_image... | 6 |
| 7 | 7 | Delux | 10 | 8 | 1500 | 2 | 2019-05-22 0... | 2020-02-13 0... | rooms_image... | 1 |
| 8 | 8 | Super Delux | 10 | 9 | 2000 | 2 | 2019-05-22 0... | 2020-02-13 0... | rooms_image... | 1 |
| 9 | 9 | Family | 5 | 5 | 2500 | 4 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 1 |
| 10 | 10 | Couple Friendly | 10 | 10 | 1500 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 1 |
| 11 | 11 | Luxurious | 5 | 5 | 2500 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 1 |
| 12 | 12 | Classic | 5 | 5 | 500 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 6 |
| 13 | 13 | Super Delux | 10 | 7 | 2500 | 2 | 2019-05-22 0... | 2020-04-30 0... | rooms_image... | 2 |
| 14 | 14 | Delux | 5 | 5 | 1500 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 6 |
| 15 | 15 | Family | 10 | 10 | 3000 | 4 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 6 |
| 16 | 16 | Super Delux | 5 | 5 | 2500 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 6 |
| 17 | 17 | Couple Friendly | 5 | 5 | 1500 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 6 |
| 18 | 18 | Classic | 10 | 10 | 1000 | 2 | 2019-05-22 0... | 2019-05-22 0... | rooms_image... | 2 |
| 19 | 19 | Family | 10 | 9 | 4000 | 4 | 2019-05-22 0... | 2019-06-01 1... | rooms_image... | 2 |

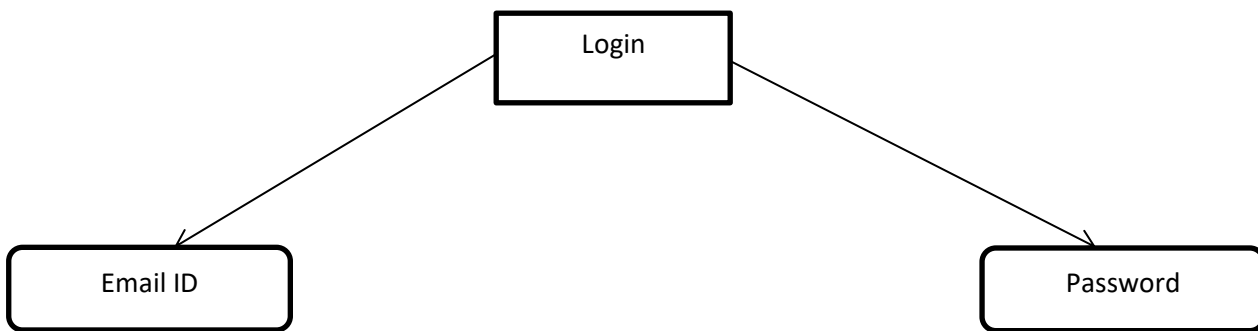
1 - 19 of 24

Go to: 1

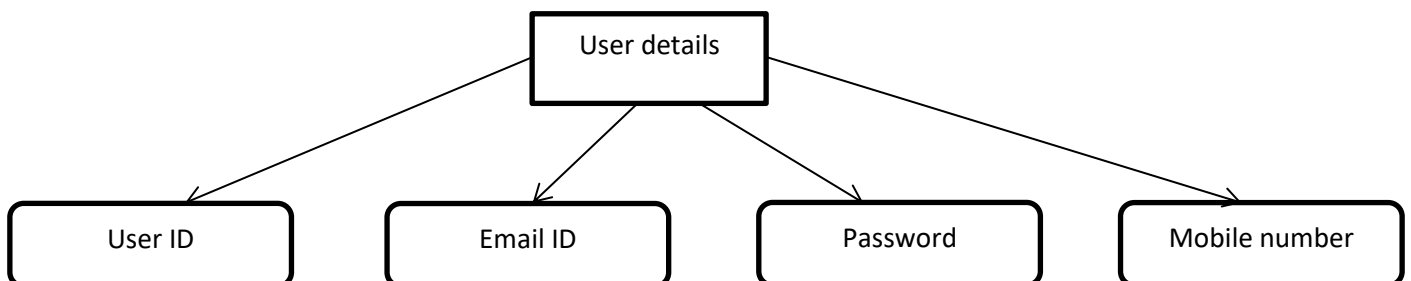
UTF-8

- **E R Diagram:** An ER diagram shows the relationship among entity sets. An entity set is a group of similar entities and these entities can have attributes. In terms of DBMS, an entity is a table or attribute of a table in database, so by showing relationship among tables and their attributes, ER diagram shows the complete logical structure of a database.

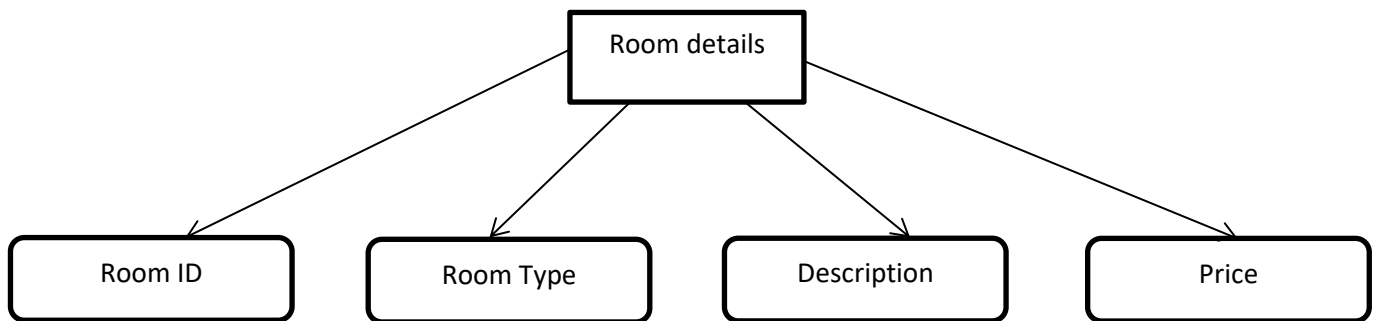
➤ **Login**



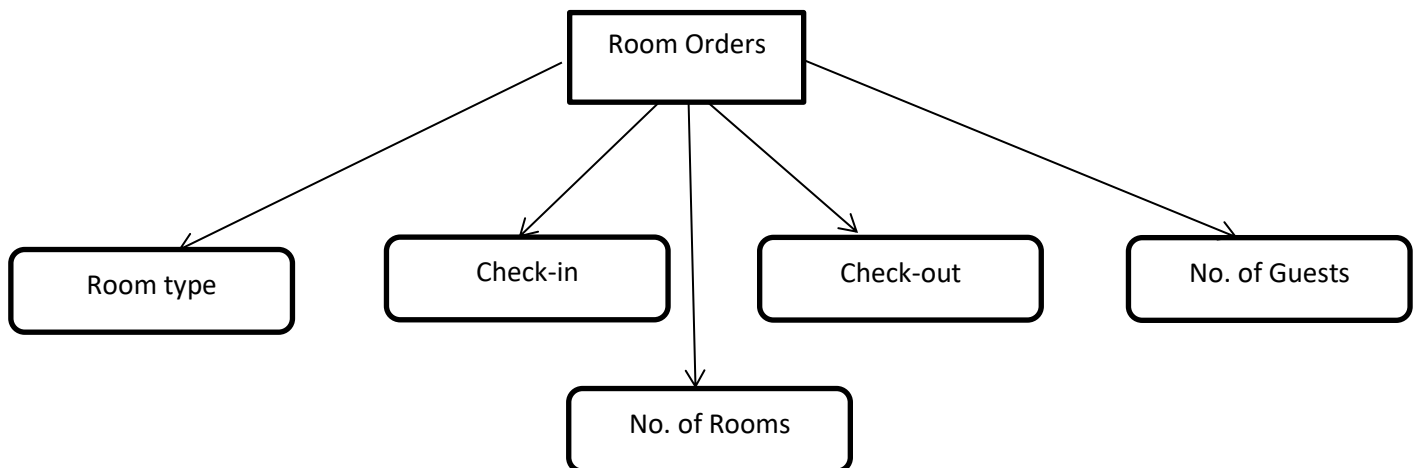
➤ **User Detail**



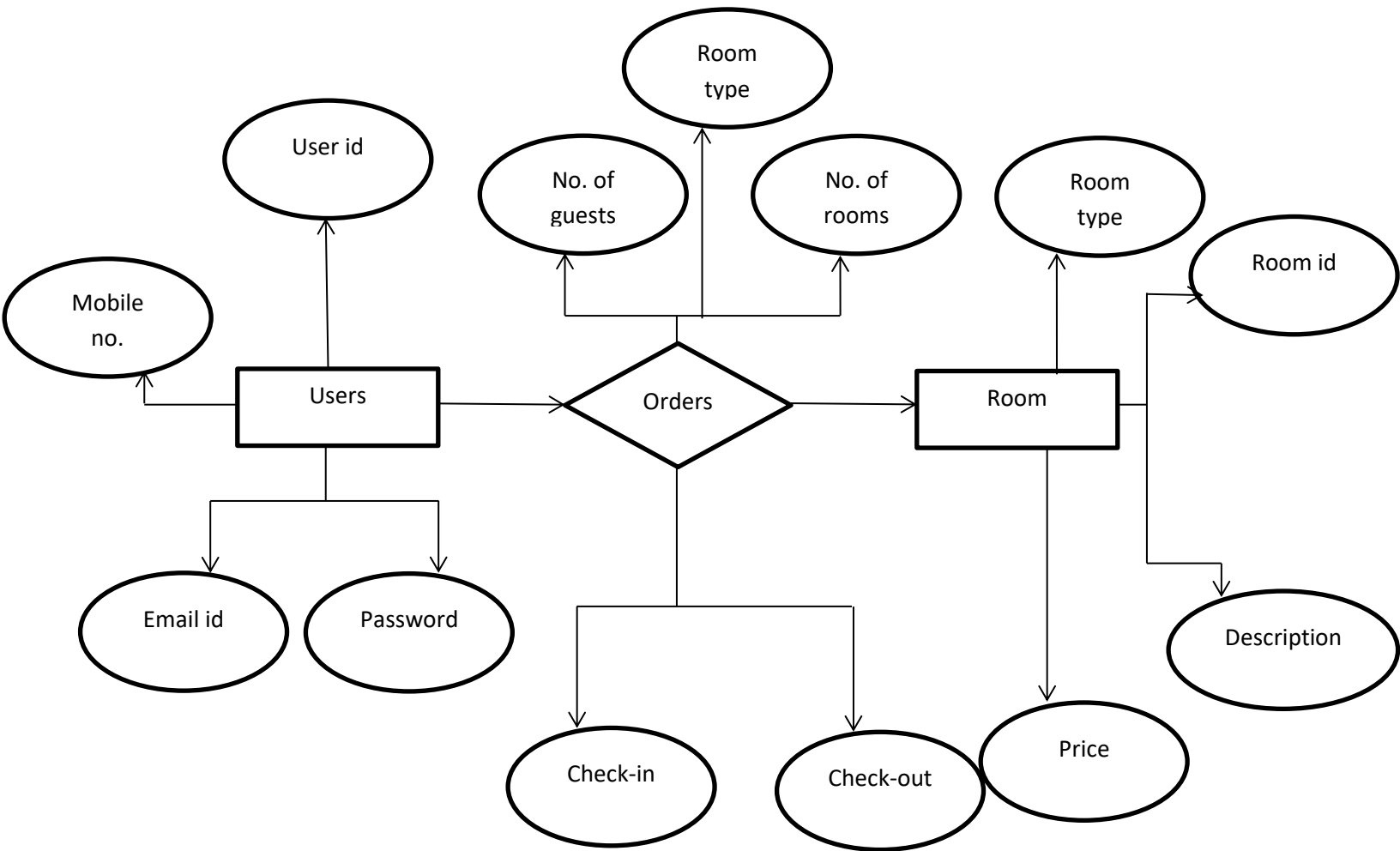
➤ **Room Details**



➤ **Room Booking**



➤ Complete Diagram



- **DATA FLOW DIAGRAM**

A Data Flow Diagram (DFD) is a structured analysis and design tool that can be used for flowcharting. A DFD is a network that describes the flow of data and the processes that change or transform the data throughout a system. This network is constructed by using a set of symbols that do not imply any physical implementation. It has the purpose of clarifying system requirements and identifying major transformations. So it is the starting point of the design phase that functionally decomposes the requirements specifications down to the lowest level of detail. DFD can be considered to an abstraction of the logic of an information-oriented or a process-oriented system flow-chart. For these reasons DFD's are often referred to as logical data flow diagrams.

EXTERNAL ENTITY

An external entity is a source or destination of a data flow. Only those entities which originate or receive data are represented on a data flow diagram. The symbol used is a rectangular box.

PROCESS

A process shows a transformation or manipulation of data flow within the system. The symbol used is an oval shape.

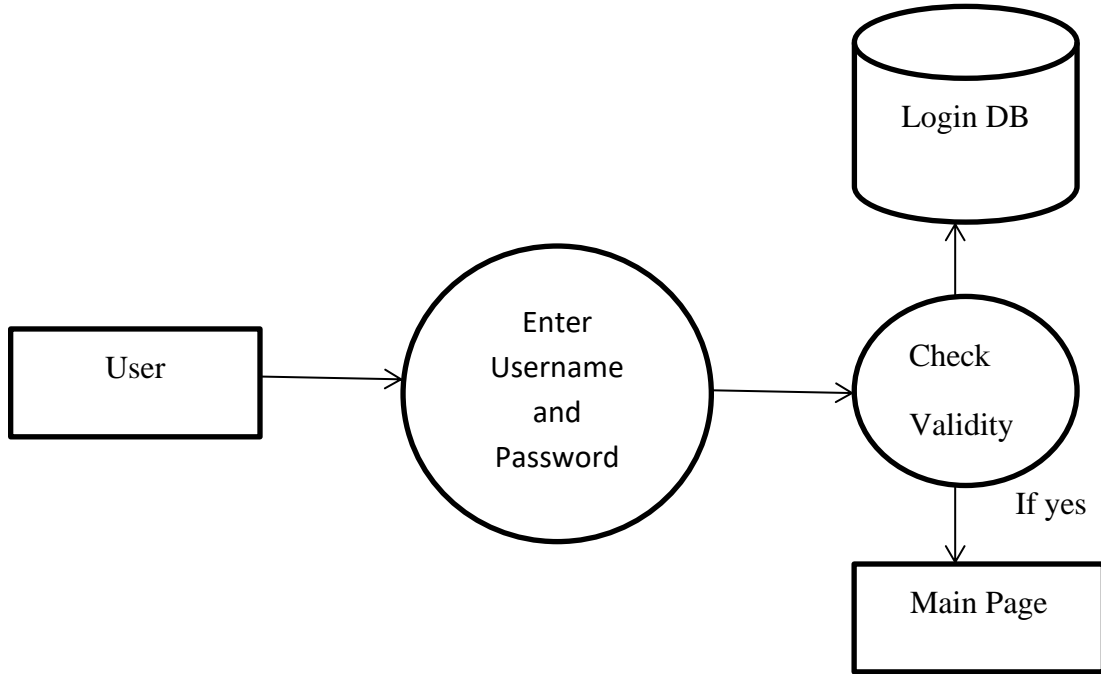
DATAFLOW

The data flow shows the flow of information from a source to its destination. Data flow is represented by a line, with arrowheads showing the direction of flow. Information always flows to or from a process and may be written, verbal or electronic. Each data flow may be referenced by the processes or data stores at its head and tail, or by a description of its contents.

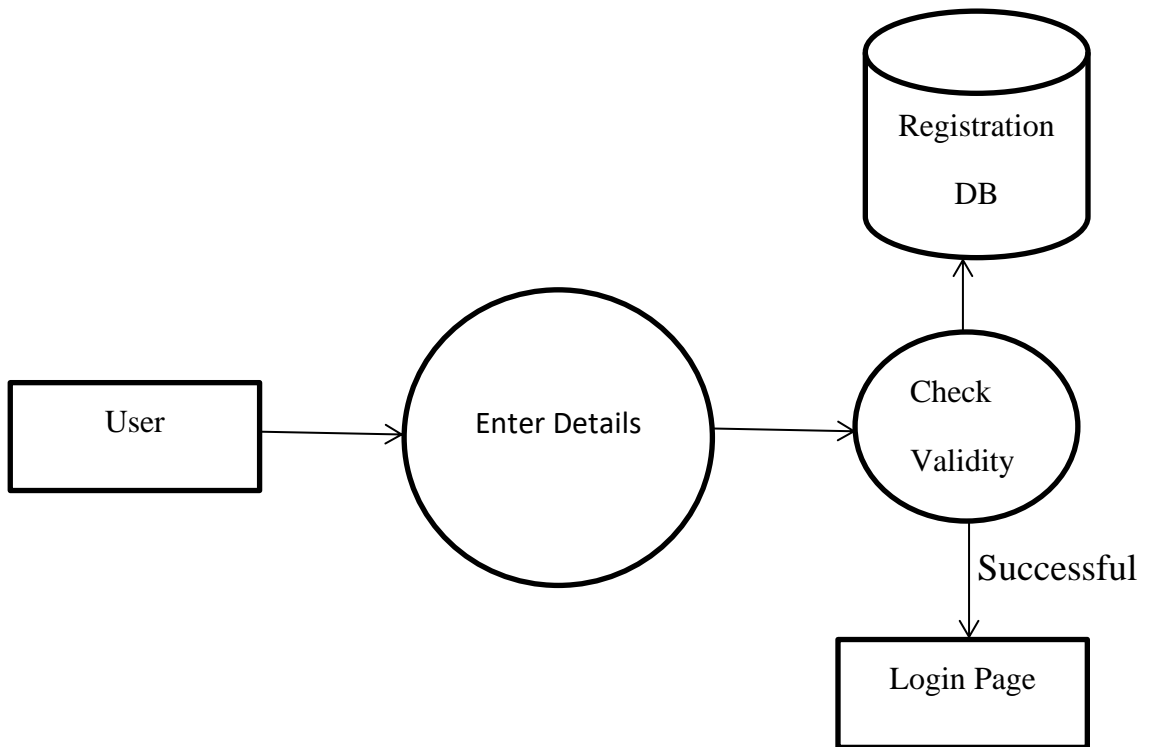
DATA STORE

A data store is a holding place for information within the system: It is represented by an open ended narrow rectangle. Data stores may be long-term files such as sales ledgers, or may be short-term accumulations: for example batches of documents that are waiting to be processed. Each data store should be given a reference followed by an arbitrary number.

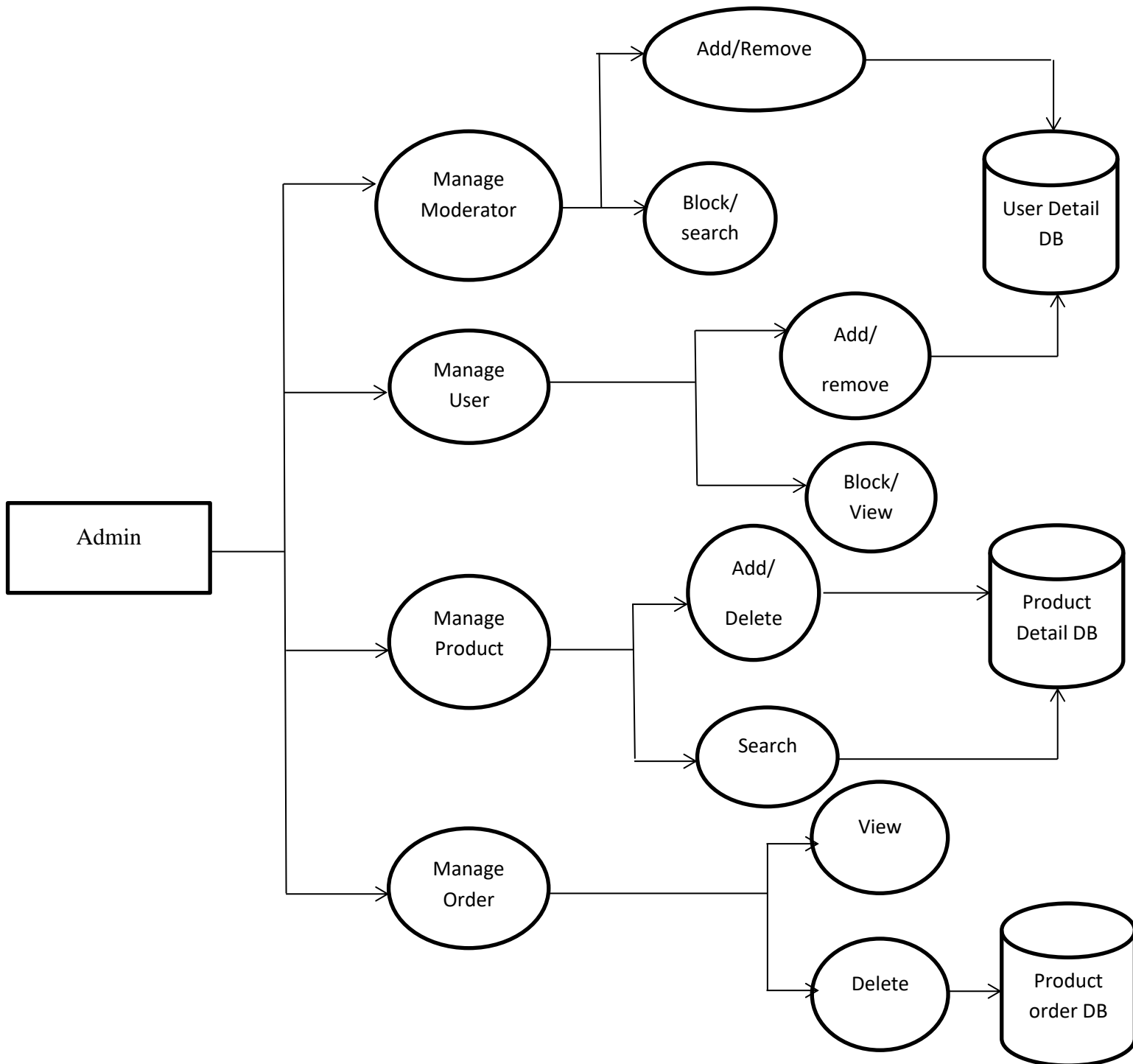
➤ **LOGIN DFD**



➤ **Registration DFD**

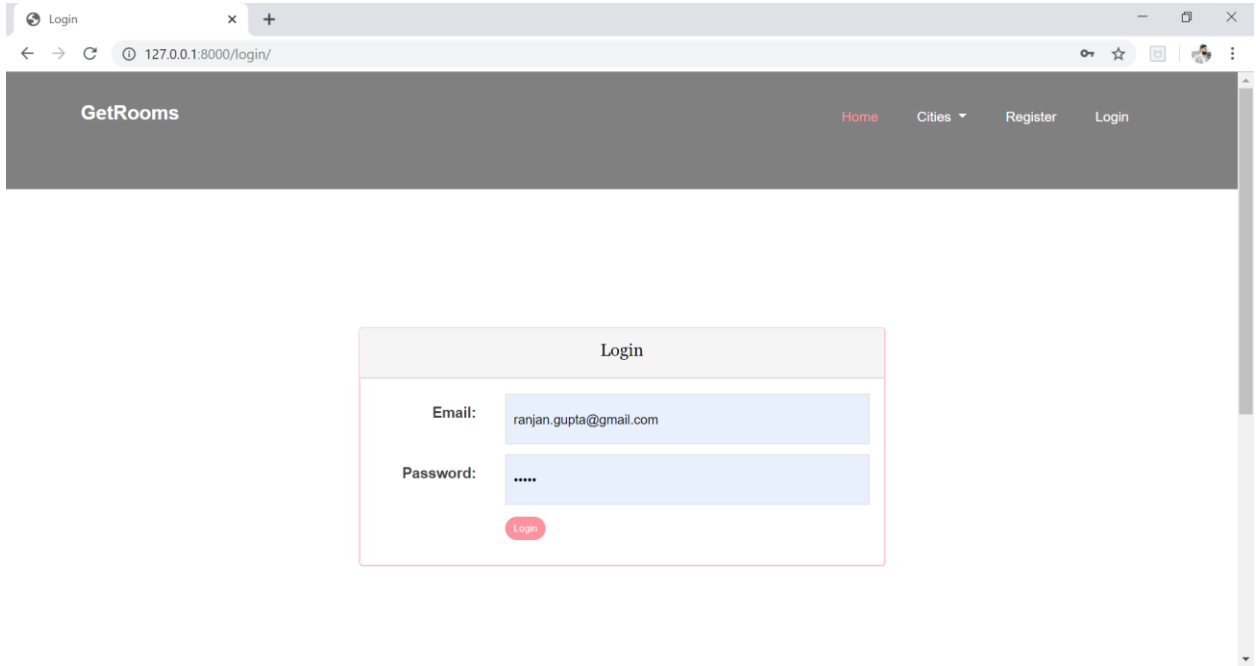


➤ Admin DFD

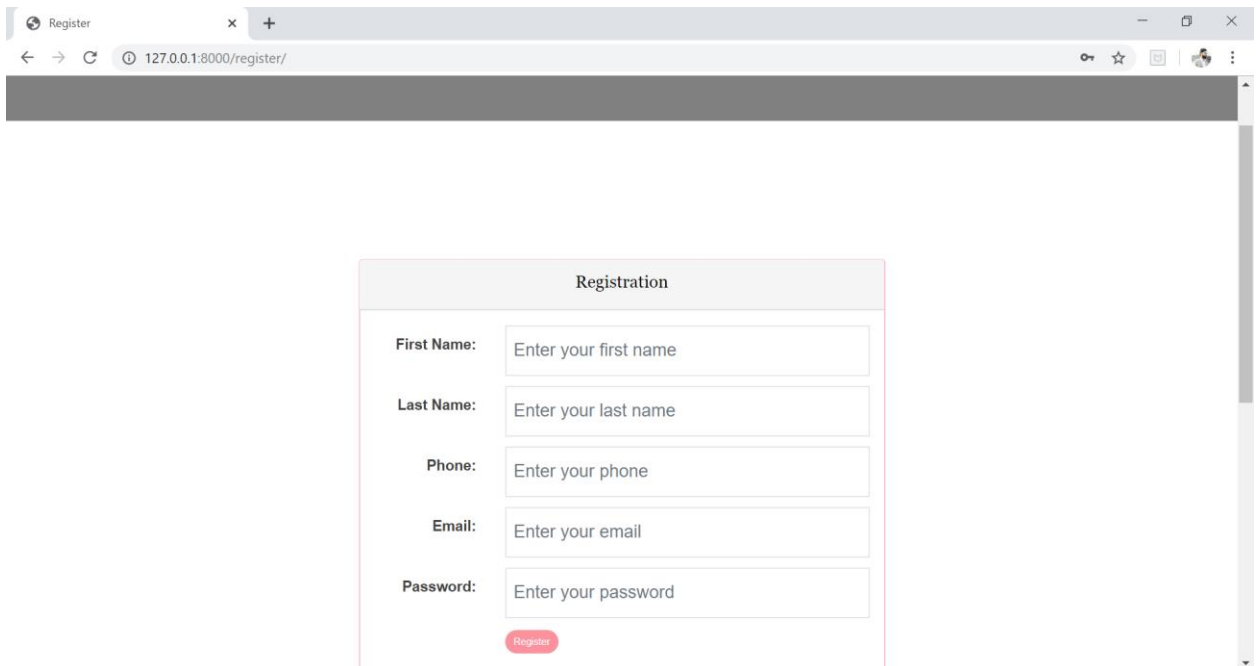


- **Screenshots**

Login



Registration



Home

Home x +

127.0.0.1:8000/home/

GetRooms Home Cities View Booking Profile Logout

Enter City CheckIn Date CheckOut Date

City Please enter check-in date in YYYY-mm Please enter check-out date in YYYY-mm Search Hotel



WELCOME TO GETROOMS

About Us

We are India's largest hotel network spread across 230 cities with 8500+ hotels offering standardized and hassle-free stay experiences at an unmatched price.

Anyone can compare price of same Room in Different Hotels and can book room online at the best price.

Rooms

Search Hotel x +

127.0.0.1:8000/searchhotels/

GetRooms Home Cities View Booking Profile Logout



Hotel Noida International

★★★★★

Address: Sec - 40, Noida



Noida City Center

★★★★★

Address: Sec - 54, Noida



Noida Golf View

★★★★★

Address: Sec - 24, Noida


Book Room

Search Room

127.0.0.1:8000/searchrooms/?id=2

ROOMS


Book A Room



Delux

Price **1000**/night


[Reserve A Room](#)



Super Delux

Price **2500**/night

[Reserve A Room](#)



Classic

Price **1000**/night

[Reserve A Room](#)

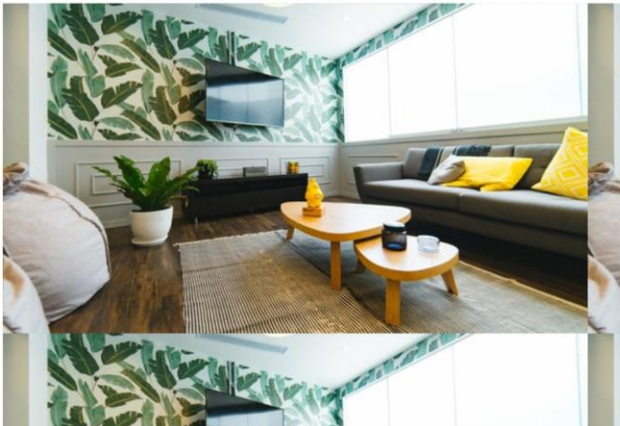
127.0.0.1:8000/bookroom/?id=13 [Reserve A Room](#)

Room Order

Book Room

127.0.0.1:8000/bookroom/?id=13

GetRooms Home Cities View Booking Profile Logout



Booking Details

Room: Noida City Center, Super Delux

Facilities: Pick and Drop, Swimming, GYM

CheckIn Date:

CheckOut Date:

No. of Rooms:

No. of Guests:

Price: **Rs. 2500 / night**

[Book Now](#)

Booking Details

View Bookings x +

127.0.0.1:8000/viewbookings/

GetRooms Home Cities View Booking Profile Logout

Booking Details

| Hotel Name | Room Type | Check In Date | Check Out Date | Number of Guests | Number of Rooms | Total Amount |
|---------------------------|-------------|---------------|----------------|------------------|-----------------|--------------|
| Noida City Center | Super Delux | 15 Feb, 2020 | 17 Feb, 2020 | 1 | 1 | 2500.0 |
| Hotel Noida International | Delux | 10 Mar, 2020 | 15 Feb, 2020 | 1 | 1 | 1500.0 |
| Hotel Noida International | Super Delux | 20 Feb, 2020 | 22 Feb, 2020 | 1 | 1 | 2000.0 |
| Noida City Center | Super Delux | 19 Feb, 2020 | 20 Feb, 2020 | 1 | 1 | 2500.0 |
| Noida City Center | Super Delux | 31 Mar, 2020 | 02 Apr, 2020 | 1 | 1 | 2500.0 |

➤ Sample Code:

```
views.py - C:\Users\dell\Desktop\getrooms\accounts\views.py (3.7.2)
File Edit Format Run Options Window Help
from django.shortcuts import render, redirect
from django.contrib.auth.models import User
from .models import Profile
from django.contrib.auth.hashers import make_password
from django.contrib.auth import authenticate, login, logout
from django.contrib.auth.decorators import login_required

# Create your views here.
def register_view(request):
    if request.method == 'POST':
        user = User(
            first_name = request.POST['firstname'],
            last_name = request.POST['lastname'],
            username = request.POST['email'],
            email = request.POST['email'],
            password = make_password(request.POST['password'])
        )
        user.save()
        Profile(user = user, phone = request.POST['phone']).save()
        return redirect('login')
    else:
        return render(request, 'Register.html')

def login_view(request):
    if request.method == 'POST':
        user = authenticate(
            username = request.POST['email'],
            password = request.POST['password']
        )
        if user is not None:
            login(request, user)
            return redirect('home')
        return render(request, 'Login.html')

def contact_view(request):
    return Render(request, 'Contact.html')

@login_required(login_url='login')
def profile_view(request):
    return Render(request, 'ViewProfile.html',
        {'user': User.objects.get(id=request.user.id)})
Ln: 1 Col: 0
```

```
views.py - C:\Users\dell\Desktop\getrooms\accounts\views.py (3.7.2)
File Edit Format Run Options Window Help

@login_required(login_url='login')
def profile_view(request):
    return Render(request, 'ViewProfile.html',
        {'user': User.objects.get(id=request.user.id)})

@login_required(login_url='login')
def edit_profile_view(request):
    if request.method == 'POST':
        user = User.objects.get(id=request.user.id)
        user.first_name = request.POST['firstname']
        user.last_name = request.POST['lastname']
        user.email = request.POST['email']
        user.username = request.POST['email']
        user.save()
        profile = Profile.objects.get(user_id = request.user.id)
        profile.phone = request.POST['phone']
        if 'changephoto' in request.FILES:
            profile.image_path = request.FILES['changephoto']
            profile.save()
            return redirect('viewprofile')
        else:
            return render(request, 'EditProfile.html',
                {'user': User.objects.get(id=request.user.id)})

@login_required(login_url='login')
def change_password_view(request):
    if request.method == 'POST':
        user = User.objects.get(id=request.user.id)
        user.password = make_password(request.POST['newpassword'])
        user.save()
        return redirect('home')
    else:
        return render(request, 'ChangePassword.html',
            {'user': User.objects.get(id=request.user.id)})

@login_required(login_url='login')
def logout_view(request):
    logout(request)
    return redirect('login')
Ln: 35 Col: 0
```

```
1 <!DOCTYPE html>
2 <html lang="en">
3 <head>
4   <meta charset="UTF-8">
5   <meta name="viewport" content="width=device-width, initial-scale=1, shrink-to-fit=no">
6
7
8
9 <link rel="stylesheet" href="/static/css/open-iconic-bootstrap.min.css">
10 <link rel="stylesheet" href="/static/css/animate.css">
11
12
13 <link rel="stylesheet" href="/static/css/owl.carousel.min.css">
14 <link rel="stylesheet" href="/static/css/owl.theme.default.min.css">
15 <link rel="stylesheet" href="/static/css/magnific-popup.css">
16
17
18 <link rel="stylesheet" href="/static/css/aos.css">
19 <link rel="stylesheet" href="/static/css/ionicons.min.css">
20 <link rel="stylesheet" href="/static/css/bootstrap-datepicker.css">
21 <link rel="stylesheet" href="/static/css/jquery.timepicker.css">
22 <link rel="stylesheet" href="/static/css/flaticon.css">
23 <link rel="stylesheet" href="/static/css/icomoon.css">
24 <link rel="stylesheet" href="/static/css/style.css">
25
26   <title>Home</title>
27 </head>
28 <body>
29 <!-- START nav -->
30 <nav class="navbar navbar-expand-lg navbar-dark ftco_navbar bg-dark ftco-navbar-light" id="ftco-navbar">
31   <div class="container">
32     <a class="navbar-brand" href="/home/">GetRooms</a>
33     <button class="navbar-toggler" type="button" data-toggle="collapse" data-target="#ftco-nav" aria-controls="ftco-nav" aria-expanded="false" aria-label="Toggle
navigation">
34       <span class="oi oi-menu"></span> Menu
35     </button>
36     <div class="collapse navbar-collapse" id="ftco-nav">
37       <ul class="navbar-nav ml-auto">
38         <li class="nav-item active"><a href="/home/" class="nav-link">Home</a></li>
39
```

```
38     <ul class="navbar-nav ml-auto">
39       <li class="nav-item active"><a href="/home/" class="nav-link">Home</a></li>
40       <li class="nav-item dropdown">
41         <a class="nav-link dropdown-toggle" href="#" id="navbarDropdownCity" role="button" data-toggle="dropdown" aria-haspopup="true" aria-
expanded="false">
42           Cities
43         </a>
44         <div class="dropdown-menu" aria-labelledby="navbarDropdownCity">
45           <a class="dropdown-item" href="/searchhotels/?city=Greater+Noida">Greater Noida</a>
46           <a class="dropdown-item" href="/searchhotels/?city=Noida">Noida</a>
47           <a class="dropdown-item" href="/searchhotels/?city=Delhi">Delhi</a>
48         </div>
49       </li>
50
51       <li class="nav-item"><a href="/register/" class="nav-link">Register</a></li>
52       <li class="nav-item"><a href="/login/" class="nav-link">Login</a></li>
53
54     </ul>
55   </div>
56 </nav>
57 <!-- END nav -->
58
59
60 <section class="ftco-booking">
61 <br>
62 <div class="container">
63   <div class="row align-items-center">
64     <div class="form-group mb-3 mb-lg-0 mr-4">
65       <input type="hidden" name="csrfmiddlewaretoken" value="c135eAvqikxC5DFsMQ9SxvubiQ4LQ0zC6cjye4zS367WnMLr1FHFCoatfhucqujc">
66       <div class="d-lg-flex align-items-md-end">
67         <div class="form-group mb-3 mb-lg-0 mr-4">
68           <label for="city">Enter City</label>
69           <input type="text" name="city" class="form-control" placeholder="City">
70         </div>
71         <div class="form-group mb-2 mb-lg-0 mr-2">
72           <label for="checkindate">CheckIn Date</label>
73           <input type="text" name="checkindate" class="form-control" placeholder="Please enter check-in date in YYYY-MM-DD format">
74         </div>
75
```



```
74         <div class="form-group mb-2 mb-lg-0 mr-2">
75             <label for="checkindate">CheckIn Date</label>
76             <input type="text" name="checkindate" class="form-control checkin_date" placeholder="Please enter check-in date in YYYY-mm-dd format">
77         </div>
78         <div class="form-group mb-2 mb-lg-0 mr-2">
79             <label for="checkoutdate">Checkout Date</label>
80             <input type="text" name="checkoutdate" class="form-control checkout_date" placeholder="Please enter check-out date in YYYY-mm-dd format">
81         </div>
82
83         <div class="form-group">
84             <input type="submit" value="Search Hotel" class="btn btn-primary py-3 px-4">
85         </div>
86     </form>
87 </div>
88 </div>
89 </div>
90 </div>
91 </section>
92 <section class="ftco-section ftco-no-pb ftco-no-pt bg-light">
93     <div class="container">
94         <div class="row">
95             <div class="col-md-5 p-md-5 img img-2 d-flex justify-content-center align-items-center" style="background-image: url(/static/images/bg_1.jpg);">
96                 <a href="#">
97                     <span class="icon-play"></span>
98                 </a>
99             </div>
100             <div class="col-md-7 py-5 wrap-about pb-md-5 ftco-animate">
101                 <div class="heading-section pt-md-5 pl-md-5 mb-5">
102                     <div class="m1-md-0">
103                         <span class="subheading">Welcome to GetRooms</span>
104                         <h2 class="mb-4">About Us</h2>
105                     </div>
106                 </div>
107                 <div class="pb-md-5">
108                     <p>We are India's largest hotel network spread across 230 cities with 8500+ hotels offering standardized and hassle-free stay experiences at an
109                     unmatched price.</p>
110                 </div>
111             </div>
112         </div>
113     </div>
114 </section>
```

```
110     </div>
111     <div class="pb-md-5">
112         <p>We are India's largest hotel network spread across 230 cities with 8500+ hotels offering standardized and hassle-free stay experiences at an
113         unmatched price.</p>
114         <p>Anyone can compare price of same Room in Different Hotels and can book room online at the best price. </p>
115         <ul class="ftco-social d-flex">
116             <li class="ftco-animate"><a href="#"><span class="icon-twitter"></span></a></li>
117             <li class="ftco-animate"><a href="#"><span class="icon-facebook"></span></a></li>
118             <li class="ftco-animate"><a href="#"><span class="icon-google-plus"></span></a></li>
119             <li class="ftco-animate"><a href="#"><span class="icon-instagram"></span></a></li>
120         </ul>
121     </div>
122 </div>
123 </div>
124 </section>
125 <br>
126 <br>
127
128 <!-- START Footer -->
129 <footer class="ftco-footer ftco-bg-dark ftco-section">
130     <div class="container">
131         <div class="row mb-5 d-flex">
132             <div class="col-md">
133                 <div class="ftco-footer-widget mb-4">
134                     <h2 class="ftco-heading-2">About GetRooms</h2>
135                     <p>We are India's largest hotel network spread across 230 cities with 8500+ hotels offering standardized and hassle-free stay experiences at an
136                     unmatched price.</p>
137                     <ul class="ftco-footer-social list-unstyled float-md-left float-lft mt-3">
138                         <li class="ftco-animate"><a href="#"><span class="icon-twitter"></span></a></li>
139                         <li class="ftco-animate"><a href="#"><span class="icon-facebook"></span></a></li>
140                         <li class="ftco-animate"><a href="#"><span class="icon-instagram"></span></a></li>
141                     </ul>
142                 </div>
143             </div>
144         </div>
145         <div class="col-md">
146             <div class="ftco-footer-widget mb-4">
147
```

```
Home x view-source:127.0.0.1:8000 x +
view-source:127.0.0.1:8000
146 <div class="col-md">
147 <div class="ftco-footer-wiget mb-4">
148 <h2 class="ftco-heading-2">Have a Question?</h2>
149 <div class="block-23 mb-3">
150 <ul>
151 <li><span class="icon icon-map-marker"></span><span class="text">103, Techno Tower, Commercial Area, New delhi</span></li>
152 <li><a href="#"><span class="icon icon-phone"></span><span class="text">9823271152</span></a></li>
153 <li><a href="#"><span class="icon icon-envelope"></span><span class="text">get@rooms.in</span></a></li>
154 </ul>
155 </div>
156 </div>
157 </div>
158 </div>
159 <div class="row">
160 <div class="col-md-12 text-center">
161 <p><!-- Link back to Colorlib can't be removed. Template is licensed under CC BY 3.0. -->
162 Copyright &copy;<script>document.write(new Date().getFullYear());</script> All rights reserved | GetRooms</a>
163 <!-- Link back to Colorlib can't be removed. Template is licensed under CC BY 3.0. --></p>
164 </div>
165 </div>
166 </div>
167 </div>
168 </footer>
169 <!-- END Footer -->
170
171 <!-- loader -->
172 <div id="ftco-loader" class="show fullscreen"><svg class="circular" width="48px" height="48px"><circle class="path-bg" cx="24" cy="24" r="22" fill="none" stroke-
width="4" stroke="#e9e9e9"></circle><circle class="path" cx="24" cy="24" r="22" fill="none" stroke-width="4" stroke-miterlimit="10" stroke="#F96D00"></circle></svg></div>
173
174 <script src="/static/js/jquery.min.js"></script>
175 <script src="/static/js/jquery-migrate-3.0.1.min.js"></script>
176 <script src="/static/js/popper.min.js"></script>
177 <script src="/static/js/bootstrap.min.js"></script>
178 <script src="/static/js/jquery.easing.1.3.js"></script>
179 <script src="/static/js/jquery.waypoints.min.js"></script>
180 <script src="/static/js/jquery.stellar.min.js"></script>
181 <script src="/static/js/owl.carousel.min.js"></script>
182 <script src="/static/js/jquery.magnific-popup.min.js"></script>
183 <script src="/static/js/aos.js"></script>
184 <script src="/static/js/jquery.animateNumber.min.js"></script>
185 <script src="/static/js/bootstrap-datepicker.js"></script>
186 <script src="/static/js/jquery.timepicker.min.js"></script>
187 <script src="/static/js/scrollax.min.js"></script>
188 <script src="https://maps.googleapis.com/maps/api/js?key=AIzaSyBVWaKrjvy3MaE7SQ74_uJiULgl1JY0H2s&sensor=false"></script>
189 <script src="/static/js/google-map.js"></script>
190 <script src="/static/js/main.js"></script>
191 </body>
192 </html>
```

```
Home x view-source:127.0.0.1:8000 x +
view-source:127.0.0.1:8000
154 </ul>
155 </div>
156 </div>
157 </div>
158 </div>
159 <div class="row">
160 <div class="col-md-12 text-center">
161 <p><!-- Link back to Colorlib can't be removed. Template is licensed under CC BY 3.0. -->
162 Copyright &copy;<script>document.write(new Date().getFullYear());</script> All rights reserved | GetRooms</a>
163 <!-- Link back to Colorlib can't be removed. Template is licensed under CC BY 3.0. --></p>
164 </div>
165 </div>
166 </div>
167 </div>
168 </footer>
169 <!-- END Footer -->
170
171 <!-- loader -->
172 <div id="ftco-loader" class="show fullscreen"><svg class="circular" width="48px" height="48px"><circle class="path-bg" cx="24" cy="24" r="22" fill="none" stroke-
width="4" stroke="#e9e9e9"></circle><circle class="path" cx="24" cy="24" r="22" fill="none" stroke-width="4" stroke-miterlimit="10" stroke="#F96D00"></circle></svg></div>
173
174 <script src="/static/js/jquery.min.js"></script>
175 <script src="/static/js/jquery-migrate-3.0.1.min.js"></script>
176 <script src="/static/js/popper.min.js"></script>
177 <script src="/static/js/bootstrap.min.js"></script>
178 <script src="/static/js/jquery.easing.1.3.js"></script>
179 <script src="/static/js/jquery.waypoints.min.js"></script>
180 <script src="/static/js/jquery.stellar.min.js"></script>
181 <script src="/static/js/owl.carousel.min.js"></script>
182 <script src="/static/js/jquery.magnific-popup.min.js"></script>
183 <script src="/static/js/aos.js"></script>
184 <script src="/static/js/jquery.animateNumber.min.js"></script>
185 <script src="/static/js/bootstrap-datepicker.js"></script>
186 <script src="/static/js/jquery.timepicker.min.js"></script>
187 <script src="/static/js/scrollax.min.js"></script>
188 <script src="https://maps.googleapis.com/maps/api/js?key=AIzaSyBVWaKrjvy3MaE7SQ74_uJiULgl1JY0H2s&sensor=false"></script>
189 <script src="/static/js/google-map.js"></script>
190 <script src="/static/js/main.js"></script>
191 </body>
192 </html>
```

• CONCLUSION

The project entitled Get rooms was completed successfully. The system has been developed with much care and free of errors and at the same time it is efficient and less time consuming. The purpose of this project was to develop a web application and an android application for purchasing items from a shop. This project helped us in gaining valuable information and practical knowledge on several topics like designing web pages using html & css, usage of responsive templates, designing of android applications, and management of database using mysql . The entire system is secured. Also the project helped us understanding about the development phases of a project and software development life cycle. We learned how to test different features of a project. This project has given us great satisfaction in having designed an application which can be implemented to any city book various kinds of rooms by simple modifications. There is a scope for further development in our project to a great extent. A number of features can be added to this system in future like providing moderator more control over rooms so that each moderator can maintain their own rooms. Another feature we wished to implement was providing classes for customers so that different offers can be given to each class. System may keep track of history of booking of each customer and provide suggestions based on their history. These features could have implemented unless the time did not limited us.

REFERENCES

1. <https://readthedocs.org/projects/django-shop/downloads/pdf/latest/>
2. https://platforma-kooperativa.org/media/uploads/article-documents/beginning_django_e-commerce.pdf
3. <https://snipcart.com/blog/django-ecommerce-tutorial-wagtail-cms>
4. <https://docs.djangoproject.com/en/3.0/>