

**MINI PROJECT**  
**(2020-21)**  
**“HOTEL MANAGEMENT WEBSITE”**  
**Project Report**



**Institute of Engineering & Technology**

**Submitted By -**

Satyam Tiwari (191500733)  
Shaurya Gupta (191500751)  
Pranav Pandey (191500566)  
Utkarsh Kulshrestha (191500879)  
Rishika Sharma (191500656)

**Under the Supervision Of**

**Mr. Akash Kumar**

**Choudhary**

**Technical Trainer**

**Department of Computer Engineering & Applications**



**Department of Computer Engineering and Applications**  
**GLA University, 17 km. Stone NH#2, Mathura-Delhi Road,**  
**Chaumuha, Mathura – 281406 U.P (India)**

### **Declaration**

I/we hereby declare that the work which is being presented in the Bachelor of technology. Project “**Hotel Management Website**”, in partial fulfillment of the requirements for the award of the ***Bachelor of Technology*** in Computer Science and Engineering and submitted to the Department of Computer Engineering and Applications of GLA University, Mathura, is an authentic record of my/our own work carried under the supervision of **Mr. Akash Kumar Choudhary, Technical Trainer, Dept. of CEA, GLA University.**

The contents of this project report, in full or in parts, have not been submitted to any other Institute or University for the award of any degree.

**Sign:** *Satyam Tiwari*

**Name of Candidate:** Satyam Tiwari

**University Roll No.:** 191500733

**Sign:** *Shaurya Gupta*

**Name of Candidate:** Shaurya Gupta

**University Roll No.:** 191500751

**Sign:** *Pranav Pandey*

**Name of Candidate:** Pranav Pandey

**University Roll No.:** 191500566

**Sign:** *Utkarsh Kulshrestha*

**Name of Candidate:** Utkarsh Kulshrestha

**University Roll No.:** 191500879

**Sign:** *Rishika Sharma*

**Name of Candidate:** Rishika Sharma

**University Roll No:** 191500656



**Department of Computer Engineering and Applications**  
**GLA University, 17 km. Stone NH#2, Mathura-Delhi Road,**  
**Chaumuhan, Mathura – 281406 U.P (India)**

## **Certificate**

This is to certify that the project entitled “Hotel Management Website”, carried out in Mini Project – I Lab, is a bonafide work by Satyam Tiwari, Shaurya Gupta, Pranav Pandey, Utkarsh Kulshrestha and Rishika Sharma and is submitted in partial fulfillment of the requirements for the award of the degree Bachelor of Technology (Computer Science & Engineering).

**Signature of Supervisor:**

**Name of Supervisor:** Mr. Akash Kumar Choudhary

**Date**



**Department of Computer Engineering and Applications**  
**GLA University, 17 km. Stone NH#2, Mathura-Delhi Road,**  
**Chaumuhan, Mathura – 281406 U.P (India)**

## **ACKNOWLEDGEMENT**

Presenting the ascribed project paper report in this very simple and official form, we would like to place my deep gratitude to GLA University for providing us the instructor Mr. Akash Kumar Choudhary, our technical trainer and supervisor.

He has been helping us since Day 1 in this project. He provided us with the roadmap, the basic guidelines explaining on how to work on the project. He has been conducting regular meeting to check the progress of the project and providing us with the resources related to the project. Without his help, we wouldn't have been able to complete this project.

And at last but not the least we would like to thank our dear parents for helping us to grab this opportunity to get trained and also my colleagues who helped me find resources during the training.

Thanking You

**Sign:** *SatyamTiwari*

**Name of Candidate:** Satyam Tiwari

**University Roll No.:** 191500733

**Sign:** *ShauryaGupta*

**Name of Candidate:** Shaurya Gupta

**University Roll No.:** 191500751

**Sign:** *PranavPandey*

**Name of Candidate:** Pranav Pandey

**University Roll No.:** 191500566

**Sign:** *UtkarshKulshrestha*

**Name of Candidate:** Utkarsh Kulshrestha

**University Roll No.:** 191500879

**Sign:** *RishikaSharma*

**Name of Candidate:** Rishika Sharma

**University Roll No:** 191500656

## **ABSTRACT**

This project aims at creating on Hotel Management System which can be used by Admin and Customers. The admin to advise/publish the availability of rooms in different hotels and customers are checking the availability of room in required hotel. Customers should be able to know the availability of the rooms on a particular date to reserve in hotel. They should be able to reserve the available rooms according to their need in advance to make their stay comfortable. The Admin hands the booking information of customers. The users can register and log into the system. The administrator will know the details of reservation and daily income. The hotel department maintains the seat availability and booking details in certain database. This project provides high security to Admin and user information.

The main objective of this project is to design a hotel management system for running a hotel business. The system should be as flexible as possible so that it can be used for different hotels. You have to find out which procedures hotels have used for different hotels. You have to find out which procedures hotels have and based on that information, you should create a system which makes it efficient. You need to find out how a hotel system works on the internet, use your own experience or directly talk to people in the hotel business. The more diverse the sources of your information are, the better will be the resulting system and, possibly, your grade.

# CONTENTS

Cover Page .....	i
Declaration .....	ii
Certificate .....	iii
Acknowledgement .....	vi
Abstract .....	vii
Content .....	viii
List Of figures .....	ix
Chapter 1 Introduction .....	1
• 1.1 Context.....	1
• 1.2 Motivation.....	1
• 1.3 Objective.....	2
• 1.4 Existing System .....	2
• 1.4 Sources.....	3
Chapter 2 Software Requirement Analysis.....	4
• 2.1 About the project .....	4
• 2.2 Problem Statement.....	5
• 2.3 Hardware and Software Requirements .....	6
• 2.4 Modules and Functionalities.....	6
• 2.5 Working Methodology.....	7
Chapter 3 Software Design .....	8
• 3.1 Use Case Diagram .....	8

• 3.2 Data Flow Diagram .....	11
Chapter 4 Technology Used.....	13
• 4.1 Web Development .....	13
• 4.2 Types of web development.....	14
• 4.3 Tools and Languages .....	15
Chapter 5 Implementation and User Interface .....	19
• 5.1 Implementation .....	19
• 5.2 User Interface.....	23
Chapter 6 Conclusion .....	31
<b>References .....</b>	<b>32</b>

## LIST OF FIGURES

1. Web development .....	14
2. Frontend .....	22
3. Backend .....	23
4. Home page .....	26
5. Menu .....	27
6. Services .....	28
7. Rooms .....	29
8. Costumer review .....	29
9. Other Information .....	30



# CHAPTER-1

## INRODUTION

### 1.1 CONTEXT

This Web Application “HOTEL MANAGEMENT WEBSITE” has been submitted in partial fulfillment of the requirements for the award of the degree of Bachelor of Technology in Computer Science and Engineering at GLA University, Mathura supervised by Mr.Akash kumar Chuodhary. This project has been completed approximately three months and has been executed in modules, meetings have been organized to check the progress of the work and for instructions and guidelines.

## **1.2 MOTIVATION**

As we know the importance of website in business fields and in fields like hotel it's more important to a website of a hotel so we can manage things very easily and without any losses and save money and manpower by having a website both hotel and customer have advantages hotel can easily manage things and a customer can easily look and check the property and easily book services without any of its convinces and it helps hotel to reach more people and spread its business easily and by this web application we can replace traditional system of managing things of paper and because of website data will be more secure and safe. And as more and more people are on internet it will give an edge to hotel owners to have more business.

## **1.3 OBJECTIVE**

The Main Objective of the hotel Organizations could be improved by integrating service-oriented operation with project management principles. Such integration would instill innovation, proactive attitudes and regulated risk-taking needed to pursue ongoing improvement and proactive response to change. By managing each change as a project, embedded in smoothly running operation, hotels would extend their life span by continuously reinventing themselves. Due to which the customers can easily book the hotels rooms.

## **1.1 EXISTING SYSTEM**

Currently in hotel all the work is done manually. When a guest makes a reservation, all the reservation details (including guest details) are recorded in a hotel register. At the time of checkout of customer, calculations of bills and inventory items are done manually too. Doing all the work manually and storing information in register takes much time and wastes much precious man hours. Manual calculation of bill is also error prone. If management wants any old information like room record or reservation details then finding old records is a very tiresome task and it takes a lot of time to find records from old files.

Following are the main problem in managing hotel manually

- Manually keeping records is very time consuming.
- Data is not always reliable as it is hand written and some human errors might have occurred example wrong telephone number among other.
- Slow process of reservation. User has found manually whether room is available or not.
- Hotel information data are not secured. It can be easily theft or altered.
- Finding records are very time consuming.
- Retrieval of guest records is extremely difficult. User has to manually search each records to find the required information. It takes lot of time.

## **1.2 SOURCES**

The source of our project (including all the project work, documentations and presentations) will be available at the following link:

<https://github.com/Satyam-tiwari-hub/Hotel-Management-Website>

# **CHAPTER -2**

## **SOFTWARE REQUIREMENT ANALYSIS**

### **2.1 ABOUT THE PROJECT**

This project is designed to create a platform that allows both the user and administrator to keep track of transactions like room reservations, room booking, online reservation and other day to day activities involved in the running and management of a hotel. The implementation is based on the requirements for a hotel management system. This project accomplished the task of building a system that ensures accurate record maintenance which was done through proper identification of customers and the proper designation of user functions with most of the processes being done automatically. The project was designed with the use of Microsoft Visual Studio which is an integrated development environment made by Microsoft. It can be used to develop console and graphical user interface applications along with windows form application websites. The database system was created using Microsoft SQL server (MySQL).

## 2.2 PROBLEM STATEMENT

The problems faced by the existing system and hope to be solved by the Hotel Management System are described below:

- ⌘ Difficulty in maintenance of records
- ⌘ Time consuming
- ⌘ Editing of data becomes a tedious job
- ⌘ No security of data
- ⌘ Mistakes occurring in Calculation of funds
- ⌘ Lack of efficiency
- ⌘ Data redundancy
- ⌘ Data inconsistency
- ⌘ Incidence of Fraud

## 2.3 HARDWARE AND SOFTWARE REQUIREMENTS

### Hardware Requirement

- Processor : Intel i3

- Operating System : Windows 7/8/10
- RAM : 4 GB (or higher)
- Hard disk : 64GB

### **Software Requirement**

- Software used: VS code, XAMMP
- Language used : HTML, CSS, JS,PHP
- Database: MySQL
- Brower : Google Chrome

## **2.4 MODULES AND FUNCTIONALITIES**

- **Home:** First Screen come in front of user in home page which has some into about hotel and includes hotel name and all also consists of menu tab.
- **Menu tab:** it's a navigation tab open when click its consists home, services, rooms, Costumer's reviews and covidInfo and login and signup button.
- **Services :** In this section of website there are no. of services listed provided by hotel
- **Room:** In this section of website there are types of room listed that are present in hotel with information about rooms.
- **Costumers Review:** This section of website includes the costumers review about hotel and services.
- **Other Information:** This section includes other information like about hotel social media handles, contact number, address and many more.

- **Login Page:** This page has login facilities for admin login to check information about hotel and manages thinks and this page open when click on login button from menu tab
- **Signup Page:** This page has Signup facilities for new user its open when click on signup button in menu tab.
- **Room Booking:** This page has booking facilities for costumers open when click on book button in website in rooms section.

## **2.5 WORKING METHODOLOGY**

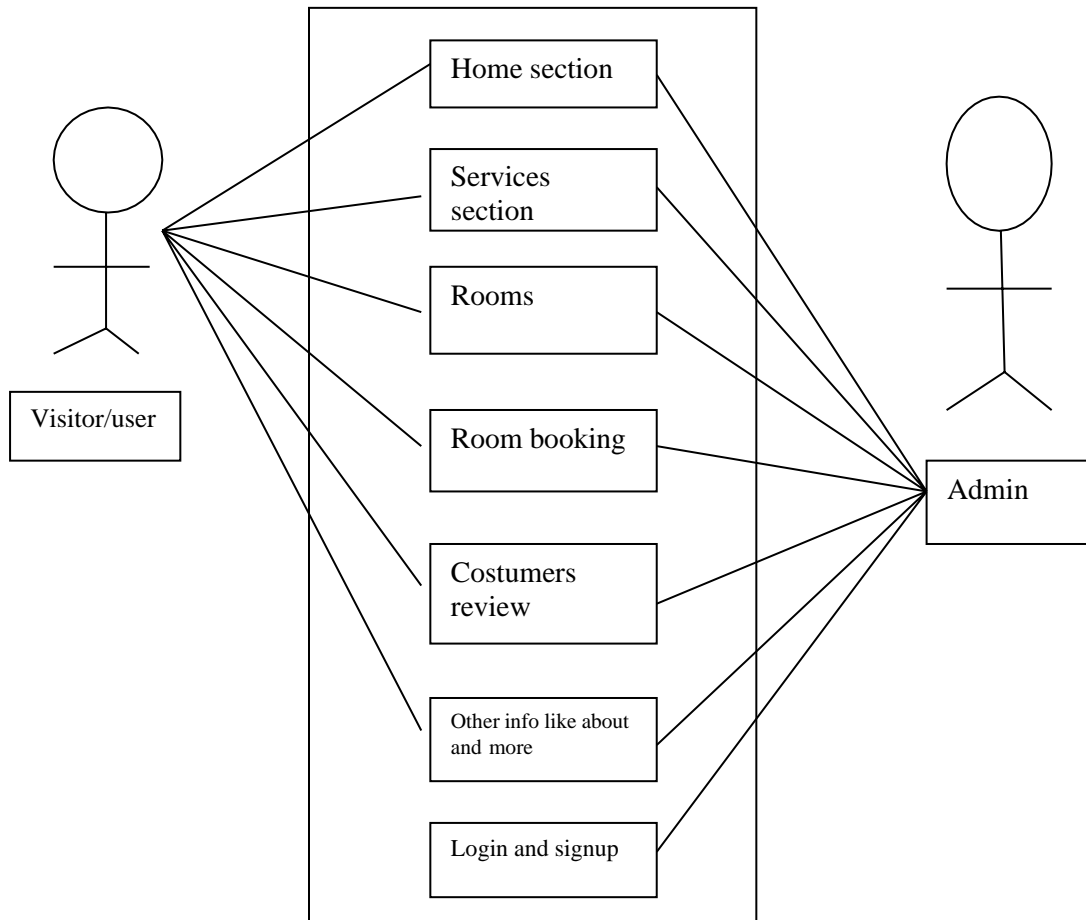
In this project, we divided the web-application in two modules first deals with administrative activities and second module user activities. If a user visit our website he/she will able to view room, gallery, see services and able to book room which connect to database which we created using MySQL and when administrative visit our website he/she able to login and see room booking, room status, payment status, and then logout this all connected with backend database created using MySQL



## CHAPTER- 3

### SOFTWARE DESIGN

#### 3.1 USE-CASE DIAGRAM:

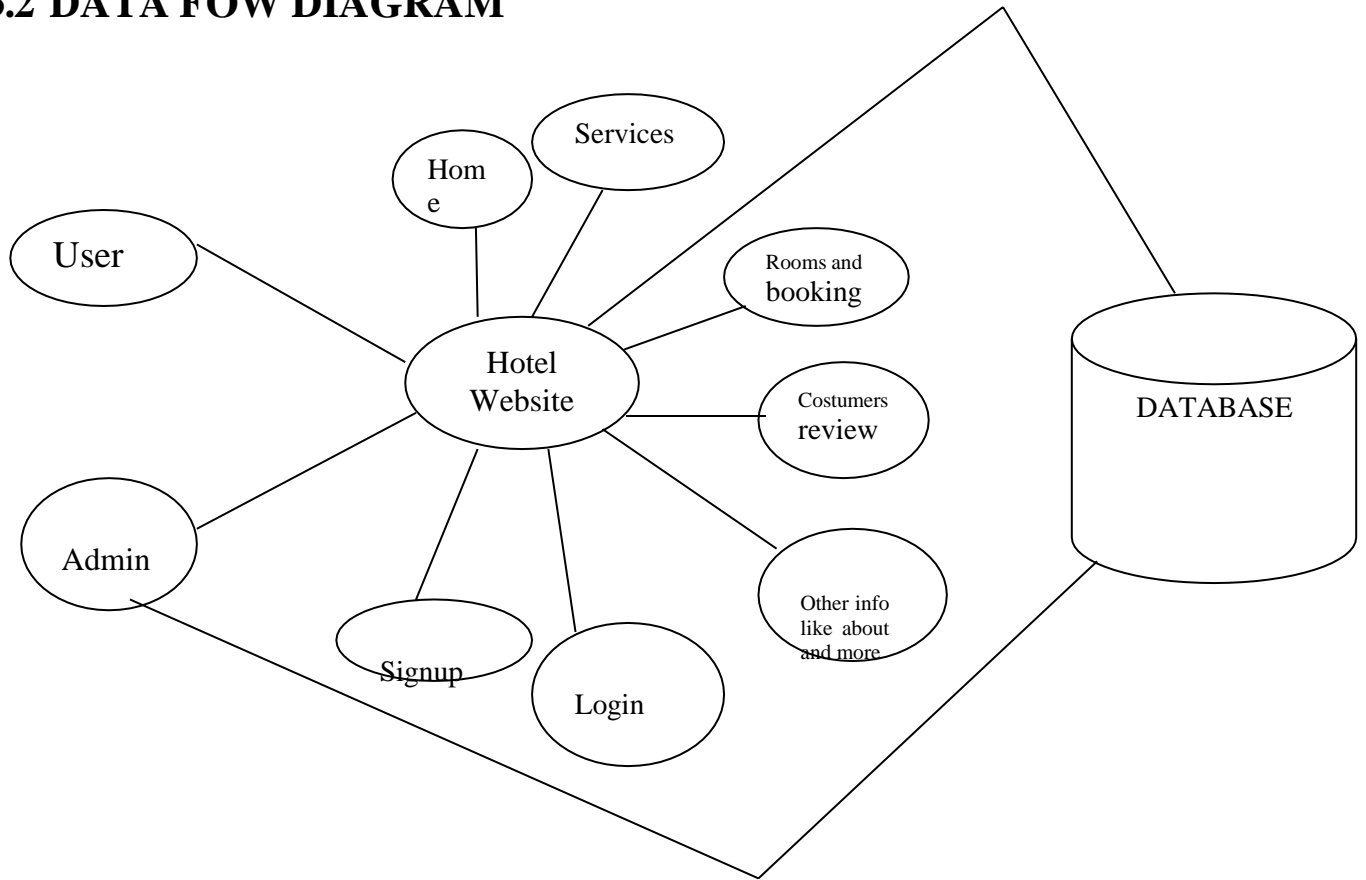


So the above diagram represents the point of view of the user, the admin, and the arrows to each module show the interactivity of the person.

The visitor/user will visit the website and be able to interact and user first see the home page section and then in home user will see some information about hotel and a menu tab for further action like services provided by hotel and then rooms and able to see the facilities in room with amount of room booking and user will be able to book room just by clicking on book button take user to booking page and then user will be able to see hotel customers reviews and then user see other information of hotel like about hotel social media handles and address and contact information.

And the second user interact with website is admin we will be able to do all the activities that a user can do and also be able to sign up and login into admin portal just by clicking login and sign up button and be able to check all the activities in hotel and admin can edit room information and if admin forget the password admin be able to login by clicking forget password.

## 3.2 DATA FOW DIAGRAM



## CHAPTER-4

### TECHNOLOGY USED

#### 4.1 WEB DEVELOPMENT

Web development refers to the building, creating, and maintaining of websites. It includes aspects such as web design, web publishing, web programming, and database management. It is the creation of an application that works over the internet i.e. websites.

The word Web Development is made up of two words, that is:

**Web:** It refers to websites, web pages or anything that works over the internet.

**Development:** Building the application from scratch.



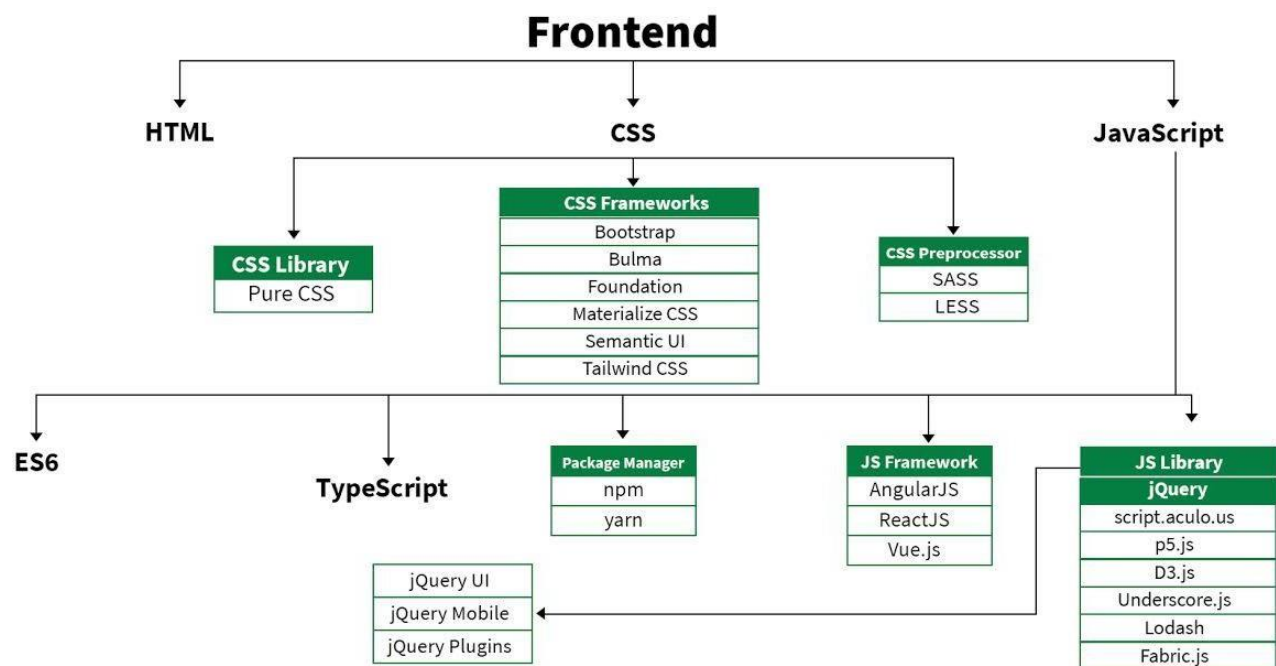
## 4.1 TYPES OF WEB DEVELOPMENT

**Web Development can be classified into two ways:**

Frontend Development

Backend Development

**Frontend Development:** The part of a website that the user interacts directly is termed as front end. It is also referred to as the 'client side' of the application.



**Frontend Frameworks and Libraries:**

AngularJS

React.js

VueJS

jQuery

Bootstrap

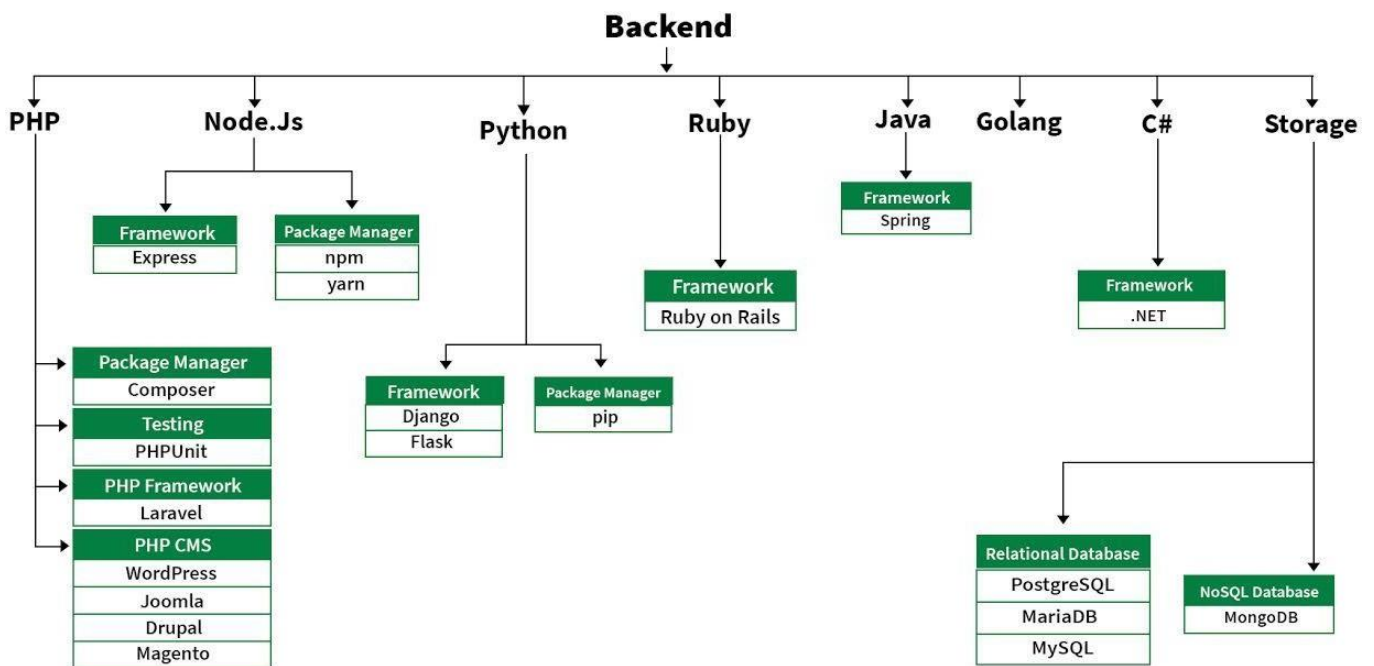
Material UI

Tailwind CSS

jQuery UI

Some other libraries and frameworks are: Handlebar.js Backbone.js, Ember.js etc.

**Backend Development:** Backend is the server side of a website. It is the part of the website that users cannot see and interact. It is the portion of software that does not come in direct contact with the users. It is used to store and arrange data.



## 4.2 TOOLS AND LANGUAGES

Tools used to build the web development are:-

**Visual Studio Code:** Visual Studio Code is a source-code editor made by Microsoft for Windows, Linux and macOS. Features include support for debugging, syntax highlighting intelligent code completion, snippets, code refactoring, and embedded Git. Users can change the theme, keyboard shortcuts, preferences, and install extensions that add additional functionality.

Visual Studio Code was first announced on April 29, 2015, by Microsoft at the 2015 Build conference. A preview build was released shortly thereafter.

On November 18, 2015, the source of Visual Studio Code was released under the MIT License, and made available on GitHub. Extension support was also announced. On April 14, 2016, Visual Studio Code graduated from the public preview stage and was released to the Web. Microsoft has released most of Visual Studio Code's source code on GitHub under the permissive MIT License, while the releases by Microsoft are proprietary freeware.

In the Stack Overflow 2021 Developer Survey, Visual Studio Code was ranked the most popular developer environment tool, with 70% of 82,000 respondents reporting that they use it.

**HTML:** HTML stands for Hypertext Markup Language. It is used to design the front end portion of web pages using markup language. It acts as a skeleton for a website since it is used to make the structure of a website.

**CSS:** Cascading Style Sheets fondly referred to as CSS is a simply designed language intended to simplify the process of making web pages presentable. It is used to style our website.

**JavaScript:** JavaScript is a scripting language used to provide a dynamic behavior to our website.

**PHP:** PHP is a server-side scripting language designed specifically for web development.

**MySQL:** is an open source relational database management system. Its name is a combination of “My” the name of co-founder Michael Widenius’s daughter, and “SQL” the abbreviation for Structured Query Language.

## **CHAPTER -5**

# **IMPLEMENTATION AND USER INTERFACE**

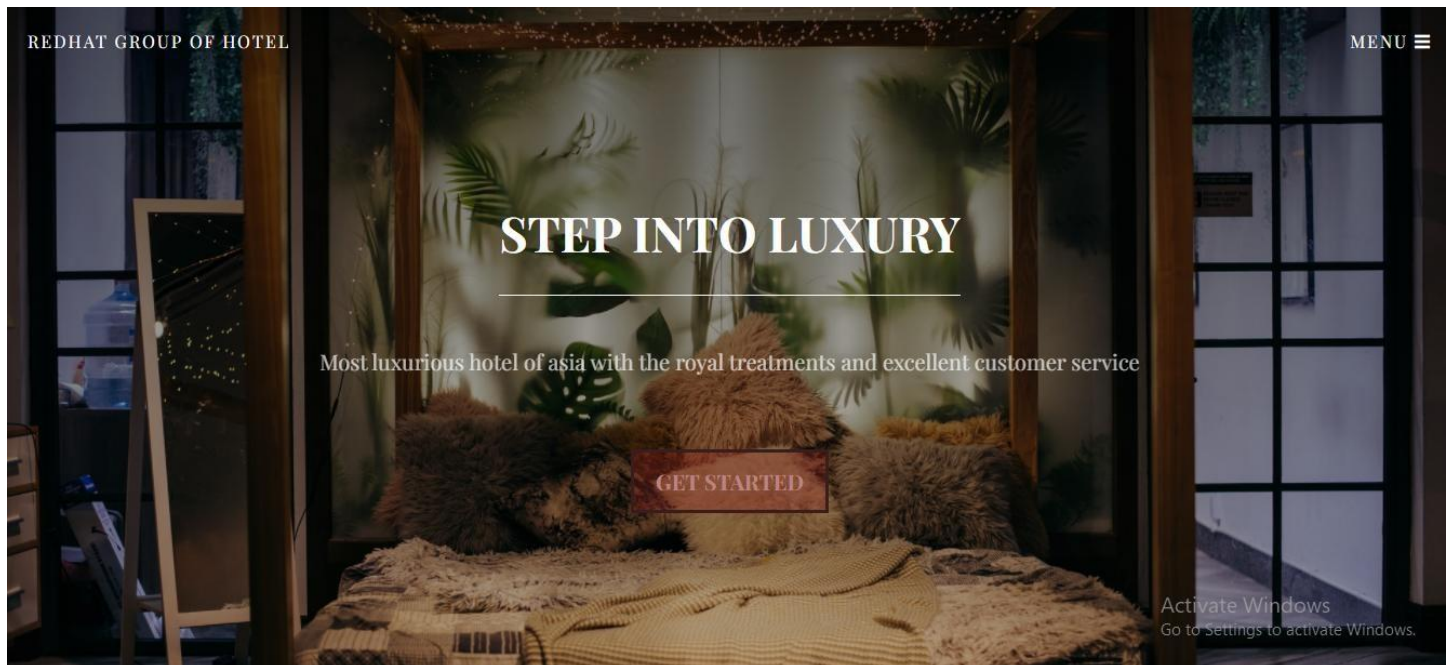
The term implementation has different meanings ranging from the conversion of a basic application to a complete replacement of a computer system. The procedures however, are virtually the same.

Implementation includes all those activities that take place to convert from old system to new. The new system may be totally new replacing an existing manual or automated system or it may be major modification to an existing system. The method of implementation and time scale to be adopted is found out initially. Proper implementation is essential to provide a reliable system to meet organization requirement.

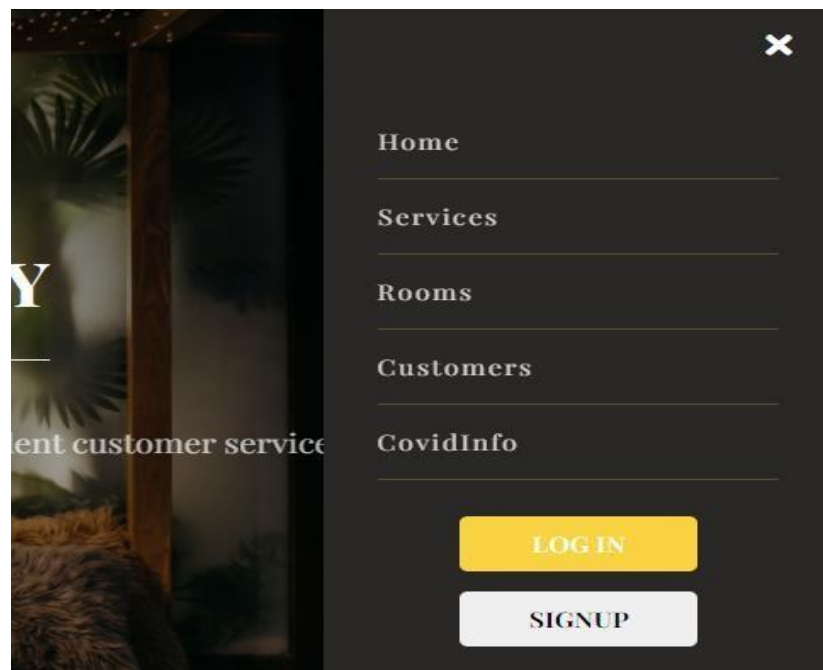


## 5.1 User Interface

- **Home**



- **Menu Tab**



- **Services**

---

SERVICES

---



### Food Service

We provide world class food with a lots of variety at very affordable prices. We have several variety in food like all major dishes that are popular in india and we also provide international variety in food like continental, chinese, italian, mexicon and many more which prepared with high quality food making standards by exprienced and professionl chefs.

[KNOW MORE](#)



### Refreshment

We provided some world class refreshment services like pool, gym, spa, indoor games, movies rooms, and all are of international standardes, like we have total of 5 pools which includes one infinity pool, two medium size pools with jacuzzi and two children pools and we also have kids play area.

[KNOW MORE](#)



### Housekeeping

We at redhat hotels our first priority is your health and wellness so our hotel have some world class hygene facilities and services our all rooms are well maintended and clean and we provide 24x7 housekeeping services

[KNOW MORE](#)



### Room Security

In terms of security we can confidently say we have one of the best hotel security in india, 24x7 CCTV surveillance with night vision and biometric key for room access.

[KNOW MORE](#)

Activate Windows  
Go to Settings to activate Windows.

## Rooms:

### ROOMS



#### STANDARD ROOM

- ➔ Non-AC rooms
- ➔ Attached bathroom



#### Moderate Rooms

- ➔ with AC
- ➔ Attached bathroom

Activate Windows  
Go to Settings to activate Windows.

## Costumers Review:

### CUSTOMERS



#### We Loved it

Last week my wife and I had the privilege of staying for two nights at your beautiful hotel, and was the perfect place to get away for a few days and we enjoyed every minute. We were given one of the rooms in the original part of the hotel that overlooked the ocean. It couldn't have been any better. Please convey my appreciation to anyone else responsible for making this a very memorable stay for my wife and I. Truly a place I will long remember.



#### Love the food

Few days ago i visted this amazing hotel and had a exprience that i remember long and best part of this hotel was its delicious and varity of food love to visti this hotel again






Lana Rose, Dubai

Activate Windows  
Go to Settings to activate Windows.

- **About:**

### About Us

We Redhat group of hotel are one of the biggest hotel chain in india we have 20 hotel all over india in differnt states and we aslo got many awards and reconigation by world class hotel management groups for our world class facilites and services.




### Useful Links


- Blog
- Rooms
- Subscription
- Gift Card


### Privacy

- Career
- About Us
- Contact Us
- Services

### Have A Question

 45, Shree Ram Road, Lucknow, UP, india

 +91 8484445542

 [info@redhathotel.com](mailto:info@redhathotel.com)

Activate Windows  
Go to Settings to activate Windows.

## **CHAPTER -7**

### **CONCLUSION**

The conclusion of this project is A Hotel management system is a computerized management system. This system keeps the records of hardware assets besides software of this organization. The proposed system will keep a track of Workers, Residents, Accounts and generation of report regarding the present status. This project has GUI based software that will help in storing, updating and retrieving the information through various user- friendly menu-driven modules. The project “Hotel Management System” is aimed to develop to maintain the day-to-day state of admission/Vacation of Residents, List of Workers, payment details etc. Main objective of this project is to provide solution for hotel to manage most there work using computerized process. This software application will help admin to handle customers’ information, room allocation details, payment details, billing information etc. Detailed explanation about modules and design are provided in project documentation. The existing system is a manually maintained system. All the Hotel records are to be maintained for the details of each customer, Fee details, Room Allocation, Attendance etc. All these details are entered and retrieved manually, because of this there are many disadvantages like Time Consuming, updating process, inaccuracy of data. For avoiding this we introduced or proposed a new system in proposed system the computerized version of the existing system. Provides easy and quick access over the data.

## REFERENCES

**1. Introduction to Web development:**

<https://www.w3schools.com/whatis/>

**2 .VS Code:**

<https://code.visualstudio.com/>

**3. *Web development course:***

[https://www.youtube.com/watch?v=6mbwJ2xhgzM&list=PLu0W\\_9lII9agiCUZYRsvtGTXdxkzPyItg](https://www.youtube.com/watch?v=6mbwJ2xhgzM&list=PLu0W_9lII9agiCUZYRsvtGTXdxkzPyItg)

---

**4. Tutorial point:**

[https://www.tutorialspoint.com/internet technologies/websites development.htm](https://www.tutorialspoint.com/internet_technologies/websites_development.htm)

**5. *XAMMP***

<https://www.apachefriends.org/download.html>