Booking Management System

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Abstract – The online booking management industry is a business venture for owner and a salace for the traveler and/or tourist. through this study it is observed that for a customer to be guaranteed a room, he or she has a physically come to hotel since the attendants paid more attention to that. It looked at creating an online booking system to enable users choose the room they wanted after a tour to guarantee him a room.

Keywords - Author Guide, web development

1. Introduction

Accommodation management software often becomes a great advantage to the modern world. Still, lots of ready solutions offer complex interfaces, low functionality, and a bunch of worthless features. That's why more companies tend to develop software specifically for their In our article, we are going to cover the main functions accommodation management system, explain what different latest technologies are use for its production and explain why booking system that we are developing can run twice as effective with a top-rated system. Being a foundation, for which an accommodation system is built, helps to reach out people based in several centres based in and out of India updating them with upcoming events, shivirs and booking accommodation for the same being located at their specific locations.

2. Features and Characteristics:

- Work 24/7 – This system works all the time. This gives freedom to potential users to book a room anytime they want. It also maximises sales/publicity because system does not tend to working hours
- Hassle-Free Management of Bookings - Hotel reservation systems will make staff more efficient. What's more, admin's will be able to take bookings around the clock, 7 days a week.
- Get Smarter Insights – There are some systems available that come with lots of different analytical tools and they keep track of some reservation and other details.
- Guests who booked rooms online are likely to show up, online booking system will automatically free the reserved room, making it available for booking
Appointment reminders are also a great way to ensure that User’s will turn up.

Payments are Easy and Fast - Payments are also easy with an online booking system. System can require User’s to pay when they book and not worry about payments when they arrive. In addition, in case of a no-show, system can keep some of the money as compensation.

Cut Workload - Online reservation systems lower workloads for hotel staff and optimize customer service. These platforms make booking availability is updated with each new bookings system makes the process untroublesome

A New Booking Trend – The whole world is online now in these days the customers use the google to discover everything. If you are not using the internet or google then you loose great opportunity.

Working of System:-

Register – User can get registered themselves as User, guest User, temporary User depending on their conditions.

Login - Once registered, users have their own unique credentials to login to further access the facilities.

Booking - Based on user's check-in/check-out date through a specific login can further get access to the available accommodation.

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Payment - Do the online payment for the the type of accommodation and the number of the users for whom the bookings have been done.

Product Function:-
Some major Product Functionality are as follows:-

1) Booking Details:- Types of rooms, no_of_rooms booked/available, check in date, check out date, number of guests, guest details, location

2) User Description:- name, address, mobile number, email.

3) Reservation Description:- User Details, Booking_Id, date of booking, date of travel.

System Requirements:-
Intended Audience and Reading Suggestions: User of the system are staff, managers and members of any organization. The members are assumed to have basic knowledge of Computer and Internal Browsing while the administrator should have more knowledge so that he/she can resolve small problems and perform information.

The intended audience includes all stakeholders as mentioned below: 1) Developer 2) Users 3) Tester

The System is a web based application can work on any operating system with a well equipped web browser. It just requires internet Connection to book and avail.

External Interface Requirements:- Use Interfaces will be a web page which consists of sign-in and sign-up option. where users needs to sign-up on the system before booking accommodation. Also there is a requirement field where users needs to upload necessary documents and do online payment for the specific booking done by the user (if any).
Hardware Interfaces in which Client PC with good Internet Connection. & Software Requirements in which some tools are there like, Postamn, framer, Workbench, Spring suite tool4, Microsoft Teams, Jira & Visual Studio.

Functional Requirements: 1) View room- when clicked on the specific room should show the details of the same and no other. 2) Google Map- Accurate map from the users location to the correct destination should be precise. 3) Login- New user id and password or incorrect when entered shouldn’t login into the system. once logged in should open different UI depending on the user and admin.

Non Functional Requirements: 1) Data Input Requirements: Necessary documents to be uploaded for KYC should be scanned and be in specific size. 2) Security Requirements: System should not grant authentication to any unauthorised person. The system ensure some software quality attribute like Reliability, Efficiency, Security.

Literature Survey:- There are some Advantage and Disadvantage of Booking Management System:-

Advantage- There is no limitation to booking hours of system also the system itself helps guide the facilities available. Business information is no longer confined to a desktop computer with a cloud based booking system. Manual Data entry might be your one chance in the day to turn off your brain and listen to a podcast. Also prevents cancellations and no shows.

Disadvantage- It takes time to set up. you have to train your staff how to efficiently use the system. May cause huge traffic on site sometimes. and should be organized enough in case of bookings.

While brainstorming during system requirements and functionalities we came across various sites of booking management system. One of which was airbnb, which has efficient bookings i.e. when users are booking at the same time, the respective room is show booked for 15 minutes even if the whole booking process till payment has not been done to avoid conflicts. Also the disadvantage of respective system is that they do not have update booking option which we have tried to implement in our system. Users of the system should be able to receive booking information of the respective information from database. The types of rooms available, payment mode and payment invoice, booking confirmation quick links, google map. The system will support two types of user privileges i.e. user and employee (admin). User will have access to the user functions and the employee will have access to both user and booking management system.

Conclusion- In this we successfully implemented the task given to us. For frontend the team build wireframes for the complete application using framer prototyping tool. This helped at finalizing the scope and developing business logic and gave an idea to the product owners. At the backend the team was able to build nearly 20 APIs to implement the development logic and capacity management logic as per the requirements. We were also able to show PoC integration of frontend and backend. System, further modules in scope. Not only bookings but we can have reminders for upcoming events and get reminders for vacancies. And manage multiple events with similar accommodation type and same unique credentials.

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