

# Event Tent: An AR Based Venue Booking System

Anjana Girish  
TLY19CS014

Department of Computer Science  
College of Engineering Thalassery

Navya P K  
TLY19CS039

Department of Computer Science  
College of Engineering Thalassery

Aswathi S  
TLY19CS018

Department of Computer Science  
College of Engineering Thalassery

Vishnu K  
TLY19CS059

Department of Computer Science  
College of Engineering Thalassery

Prof. Sneha B K

Department of Computer Science  
College of Engineering Thalassery

**Abstract:-** Event Tent is a mobile application that provides a reliable and easy-to-use online reservation system for wedding halls, party halls, and all other bookable venues. The application is designed to simplify the process of venue booking by providing a search facility that allows users to check the availability of venues and book them without having to physically visit the venue. The application provides comprehensive information about each venue, including facilities, amenities, and images, to assist users in making informed decisions. The application also offers a flexible booking system and an augmented reality platform to view personalized décor and also allow users to visualize and explore venues in 3D, providing an immersive experience that would help them make more informed decisions about which venue to choose. The app could also provide interactive virtual tours, real-time availability information, online booking capabilities, and reviews and ratings from previous users of the venues. With these features, the app would simplify and streamline the venue booking process, making it faster, more intuitive, and more enjoyable for users. Ultimately, an AR-powered venue booking app could significantly improve the event planning experience and help people create unforgettable events.

## I. INTRODUCTION

Currently, the event assiduity plays a vital part in our society. People have come up with a lot of occasions for organizing events similar as educational events, birthdays, transnational conferences, company parties etc. Generally speaking, events are also a part of mortal beings' social life because they get to know and talk with different people with different backgrounds. Still, in order to organize a good and successful event, it requires a thorough and detailed planning process. Event directors and event fellow need to unite in order to formulate the most feasible plan for events. In order to make events successful and wellorganized, all of the stages in the entire planning process also need to be in harmony and be identified with one another. Typically for an event operation company, services have been established in those sections each having finance director, event diary, mortal resource

director. The company provides services on a diurnal base on colourful events. Presently, the event planning system available provides services only during the working days meaning that guests have limited time to make reservations for particular services. The guests take their time to travel to the event operation services to book for the event and indeed going to the bank and pay the plutocrat. There's a lot of paper work pertaining the events listed and those pending schedules, they also use phone calls. All these challenges bear an online event operation system that will enable the client make booking, schedule events online at any favoured time.

“Event Tent” is a mobile application which act as a bridge between potential users, venue owners, event planners, photographers and the entrepreneurs in this field. This project organizes the facilities such as Venues & Accommodation, Sets, Themes, Concepts & Decorations, Menu Planning to help people create unforgettable events.

## II. LITERATURE SURVEY

Thepaper [1] analyses the benefits of an academic school, reservations for rooms in various buildings may be handled by various departments, with the majority of these bookings being made via the mail system. Numerous difficulties that users of this system encounter include not knowing about open spaces, tediousness, improper management of reservations, conflicts over reservations, poor communication, etc. These demonstrated the requirement for a clear, effective, visual, and user-friendly area management system. In order to make BOOKiiT user-friendly and effective in its various use contexts. This is a system for booking venues that makes it possible to reserve a slot for any venue across an entire institute. The critical part of the system uses a level of mutual exclusion to manage the synchronous and real-time bookings. It solves the issue of group booking for large-capacity venues as well as numerous bookings by a single user. By categorising them when they log in, it also solves the issue of teacher bookings at locations that have already been reserved by students.

The paper [2] discusses about a website that makes it simple to access information about every event space and displays a unique schedule for each one. We can view the hall's and the lawn's access for a specific date. It has web-based choices and is easy to use. It will offer open reservations. An effective and user-friendly method is needed to reserve the space in advance and make the data accessible to others so they can confirm the availability of the space before making a reservation. The system aids users in scheduling venues for events like birthdays, weddings, meetings, and other gatherings. We create a web portal to save users' time and money when looking for a venue in a metropolis. The viewer can locate the location using this portal.

The paper [3] proposes to address the problem of unequal use of university sports facilities, the online booking system of university sports venues, which is based on the table tennis hall of Zhengzhou University is designed. It combines the knowledge gained from the development of the existing domestic and international online booking systems, as well as important methodologies. The core functionality of the system—including user registration and login, online location booking, online payment, personal centre, message board, and database creation—is developed in compliance with an analysis of the requirements as a whole. The use of the system has compensated for the management of sports venues' current unlucky state by successfully completing duties like online reservations and payments. The online problems with the university sports facilities have been resolved and the system's use has made up for the management of sports venues' present bad luck. The issues fixed with the university sports venues' online booking function, increased the effectiveness of the venues, and met the demands of effective venue use. The system can be used as management training for other collegiate sports venues.

In paper [4] users can reserve meeting rooms across multiple agencies or ministries using the conference web portal. It is a web- and intranet-based system that can be accessed through a browser from any computer. It has web-based choices and is easy to follow. It will offer adaptable repetitive reservations. Using the user database for current users for authentication ensures that entries that conflict cannot be entered. It is necessary to reserve the hall in advance and make the information accessible to others so they can confirm the status of the hall before making a reservation. Every organization needs meetings so that employees can discuss important issues or simply exchange knowledge and information. Most studies focus on making scheduling software better so that participants can choose the best time for meetings or creating smart meeting spaces where audio-visual materials are automatically recorded for later viewing in order to support those activities. There are very few tools that can control meeting rooms in terms of availability and utilization in real time.

### III. EXISTING SYSTEMS

Searching for venues throughout the city and then whittling down your choices based on criteria such as cost, amenities, size, etc. can be a time-consuming process when selecting a location for an event. Customers who need to make reservations for events under the current method typically need to go to the dealers' location. In the current system, customers call the business to manage events. He describes the occasion's specifications in depth. He describes the event's objectives, duration, structure (parties, presentations, workshops, and/or exhibitions, for example), anticipated number of attendees, equipment and furniture needs, possibility of delegate packs or marketing materials, and other facilities needed. The event coordinator researches the specifications of the event using the event administration system with care. The business provides customers with a selection of pre-made products. If the client concurs, the event is scheduled and the business receives the advance payment. Different bookings are made depending on the event's needs. A thoughtful plan is created to ensure the event runs smoothly.

### IV. PROPOSED SYSTEM

The proposed AR-based venue booking app is designed to provide users with an easy and convenient way to find and book event spaces. One of the key features of the app is a search function based on a given location, which allows users to quickly and easily find venues that are close to their desired location. The app also offers categorization based on capacity, rate, and availability, allowing users to filter their search results based on specific criteria.

Another key feature of the app is the ability to pre-book venues without payment, giving users the flexibility to reserve a space before making a final decision. The app also provides a facility to book caterers according to the user's budget, making it easier to plan and organize events.

The proposed system also includes the ability to provide information about a user's booking choice, allowing them to get a better sense of the space and its amenities. Users can submit their queries through the app, and the app also offers a mailing facility to reply to clients. This makes it easier for users to get the information they need and make informed decisions about their event planning.

The app also includes online booking and cancellation functionality, allowing users to book and pay for their event space online, as well as cancel their reservation if needed. This makes the booking process more streamlined and convenient for users. The proposed AR-based venue booking app also includes additional features such as photos and reviews, which can help users make more informed decisions about their event planning.

Another important feature of the app is the ability to maintain records of users, including their booking history and preferences. This can help users save time when booking future events, as the app can suggest venues based on their past choices and preferences.

The application also offers an augmented reality platform to view personalized décor and also allow users to visualize and explore décor models in 3D, providing an immersive experience.

Overall, the proposed AR-based venue booking app "EVENT TENT" offers a range of features and functionality that make it easier and more convenient for users to make event planning more efficient and hassle-free.

## V. CONCLUSION

A number of locations that need to manage various events could adopt an online event management system. No matter how big or small an event is, this system can handle it. Many event management systems are available and doing well, but this initiative offers a number of additional features that some event management systems do not have. This event organising tool is efficient and useful. The study revealed that events play a significant role in who we are as people and that numerous events occur every day. The amount of paperwork required for managing those activities wastes both time and money. To save time and effort, events must be managed digitally, which is why this initiative was created.

Small-scale events may profit greatly from this project because they typically receive less attention than large-scale events that take place locally. This endeavour offers a wide range of potential implementation strategies. Overall, the AR-based venue booking app is a powerful and innovative solution that can help make the event planning process more efficient and hassle-free. The app's combination of advanced features, search functions, and user-friendly interface can make it an invaluable tool for anyone looking to book a venue for an event.

## REFERENCES

- [1.] Himanshu Singh, Rajiv Ratn Shah, "BOOKiiIT - Designing a Venue Booking System (Technical Demo)," in 2020 IEEE Sixth International Conference on Multimedia Big Data (BigMM), 2020, pp. 1-2, doi:<https://doi.org/10.1109/BigMM50055.2020.00050>
- [2.] Aakansha Ghuse, Nancy Mouses, Puja Datir, Samiksha Adgokar, Sayali Mahulkar, "Web-based venue booking system," International Journal of Creative Research Thoughts (IJCRT), vol. 8, no. b, April, 2020. <https://ijcrt.org/papers/IJCRT2004282.pdf>
- [3.] Can Li, Junjie Li, Hongxiang Cao, Zhan Meng, (2017). Design and implementation of online booking system of university sports venues. MATEC Web of Conferences, 100. <https://doi.org/10.1051/mateconf/201710002024>
- [4.] Prof. Chetan Bulla, Priyanka Mane S, Pooja Kabade, Pooja Madiwal and Pooja Galatage. "Conference Room Booking System Across Multiple Ministries/Department In Different Buildings". Advances in Natural and Applied Sciences; Volume 4, Issue 1, Jan-June /2017
- [5.] Ghule, S. N., Mohurle, H. M., Shegaonkar, A. P., Abdul Saleem, Z. P., & Borkar, P. S. (2019, February 12). A Review: Venue Booking System. International Journal of Scientific Research in Computer Science, Engineering and Information Technology, 491–494. <https://doi.org/10.32628/cseit1951118>.