



Trip Planner and Recommender with GenAI

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ABSTRACT.

Tripped is a user-friendly mobile application aimed at helping adventurers and travelers that focuses on an idea that caters to all the needs of someone who enjoys visiting new places. In traveling and planning of tour, the processes of selection, finding, grouping, and iterating destinations-related service and product such as stay, cafeteria, attractions and activities. Nowadays, huge number of riders and travelers are using travel mobile applications for researching and for booking up the holidays. By adding the chatbot powered by GenAI model will more comfortability and security. By the availability of a well-developed travel application, people need to rely upon compasses, maps, and guidelines for traveling. This is because a good app allows you to research new places, book tickets, find great restaurants, and access other travel-related assistance. Tripped offers users a variety of options that can be sorted based on their preferences. Additionally, the app provides several recommendations to enhance the user's experience. Deciding where to go and stay can be challenging, particularly for travelers unfamiliar with a destination. Knowing where to begin and end their experiences would greatly relieve travelers. This is where "Tripped" comes in, offering a sightseeing map and assisting tourists in prioritizing places to visit. The app provides the user with the freedom to Plan trips (on the bases of their preferences) and get insight into new and exotic locations. Tripped is a traveler's best buddy, his dream partner, and his guide in all the adventures he would ever embark on.

INTRODUCTION

Most of the Travelers are motivated to become more independent and less reliant on travel agents. They are more comfortable to plan their entire trips using a simple mobile application. People want satisfaction and least stress while planning their trips. You can become your own guide by using Tripped that permit access to guides for multiple travel destinations. Travelers will get more attractive information about a location by using tripped. If the traveler is new to the destination, the process of choosing places where to go and where to stay can be a problem. If they know where to start their journey and where they could finish them, then that would give them much reassurance. There is the relevance of Tripped come in. Tripped offers a map for seeing the sights and help tourists to prioritizes places to visit. Users need to comfortably reserve hotel rooms and other arrangements. Tripped give a variety of options to assist people to select lodging that best fits their travel.

Users require a single resource that consolidates all essential information about a destination, as sorting through multiple sources is time-consuming. Tripped is an app that offers vital travel information for destinations worldwide. Unlike numerous apps focusing on 'things to do' and 'places to eat,' Tripped prioritizes helping travelers find places and trips that align closely with their preferences. By providing tailored suggestions, the app aims to eliminate the need for users to compromise on their preferences and skip the tedious task of internet research. Tripped boasts a user-friendly interface, ensuring each field is easily tappable without accidental touches on nearby fields. The virtual keyboard occupies half the screen, leaving the rest of the form and the submit buttons accessible. Our dissertation aims to provide essential phrases for common conversations in different places travelers may visit. The most important intension of this research is to enhance an existing mobile travel guide application with additional features. In this specific scenario, the user interaction is a unique feature that sets apart Tripped from traditional travel experiences. The platform provides detailed information about tourist spots in specific areas, aiding in location understanding.

Tripped categorizes popular places such as malls, waterfalls, and beaches, making it easier for users to explore. For instance, if a user wants to visit beaches, tripped will provide a list of beaches in Kerala, complete with names, descriptions, directions, and nearby accommodations and dining options. This interactive aspect distinguishes Tripped from conventional travel experiences, offering a comprehensive guide tailored to user's preferences.

LITERATURE REVIEW

Traveling involves a balance between planning and spontaneity. While planning is essential, leaving room for serendipitous discoveries adds excitement to the journey. Over-planning can limit these unexpected joys, while too much spontaneity may lead to missed opportunities. Having the right selection of travel apps can help users strike the perfect balance between preparation and adventure.

The goal is to see how these programmers work and how they differ to see how they might be improved. Following are some of the apps which offer relatively similar services.

TABLE 1. Literature review Comparison

Sl.No	METHODOLOGY	RESEARCH CONTRIBUTION	RESEARCH GAP
[1]	Trip Planner and Recommender using Flutter and Tensor Flow	The primary intents that even though the data pertaining to traveling is available all over the internet, where that information are very generic to all the user who searches about it. These Interests will recommend top preferred places or restaurants but would not consider people preference.	Itineraries cannot be edited, Requires more time to train and test the model, Map features need to be improved to get a better UI.
[2]	An Approach Travel Recommendation System and Route Optimizer using AI	This Approach Travel Recommendation System and Route Optimizer using AI considers multiple factors, such as the traveler's age, preferences, weather condition at the time of trip, and the traffic jam in those cities at this moment and all.	No updates about price change, Customer services need to be improved, more expensive than other applications, Mainly a place for big hotel chains.
[3]	Sentiment Analysis on Trip advisor Hotel Review by Entity Recognition	Millions of hotels, must-go experiences, adventures, top dining hubs and cherished gems to more than 8M destinations are provides by the TripAdvisor [3] app at your perusal. Trip advisor is a website that focuses in tourism and travel related content, including traveler attractions, dining options and lodging.	No control over how the reviews appear, less control over content and moderation, No ownership of multimedia content uploaded.
[4]	Traveler's Recommendation System Using Data Mining Techniques	The system, which allows the visitors, can define their needs, preferences, hobbies and skills.	A small, poorly labeled training set could nonetheless yield the desired results and it can only be used by small research groups.

METHODOLOGY

The proposed system, integrated with GenAI Chabot, offers significant advantages over all of the existing systems [5]. Firstly, the addition of a Chabot improves the user experience by providing instant, personalized assistance, streamlining the process of trip planning, and making it more attractive and interactive. Unlike the existing system [6], where users had to manually search and filter through information, the Chabot can quickly answer questions, recommend destinations/places, and even make bookings of hotels, saving users valuable time. Moreover, the system integration with multiple API's ensures that users receive comprehensive and up-to-date travel information and opinions. This holistic approach bypasses the fragmented data sources of the existing system, providing a more seamless and reliable user experience. Additionally, the use of a centralized backend for handling user information, trip details, and API integrations enhances the system's efficiency and scalability, allowing for smoother maintenance and updates. Overall, the proposed system not only simplifies the user interface and improves functionality but also ensures a more cohesive and efficient travel planning process.

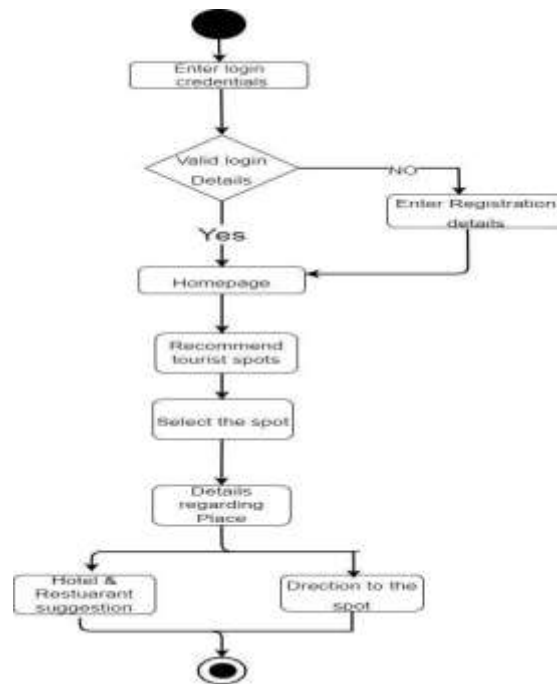


Figure: Activity Diagram

The integration of modern technologies like AI and machine learning, along with comprehensive API integrations, marks a significant upgrade from the existing system, offering users a more intuitive, efficient, and enjoyable travel planning experience.

CONCLUSION

Traveling and discovering new things is undoubtedly one of the most amazing things, and thanks to the internet, our lives have become much easier and convenient. It has become so easy to plan and schedule a vacation, purchase travel tickets, and explore new places. Most important, travel mobile apps have revolutionized access to the tourism industry to provide more personalized and value-added services to customers. More and more travelers use travel apps for research and to book their vacations. This essay presents “Tripped” travel composed of common information about all countries to popular travel destinations. Instead of other listing apps “what to do” and “where to eat”, Tripped was created to offer the same goals from a different angle. Rather than giving a million choices to users, tripped allows travelers to easily find places and trips that are most relevant to their desires. Tripped enables users to quickly discover what they need because all of its concepts are well-filtered.

A third benefit is that users will not have to look through the internet for information on travel. The platform has a simple user interface that allows users to easily find information they need to look up. Tripped will also enable users to customize their travel experiences by ensuring that each trip goes off without a hitch and that it is tailor-made according to the users’ desires.

REFERENCE

- [1] S. M. Hari Krishna et al., "Trip Planner and Recommender using Flutter and Tensor Flow," 2022 IEEE 7th International conference for Convergence in Technology (I2CT), Mumbai, India, 2022, pp. 1-7, doi: 10.1109/I2CT54291.2022.9824468..
- [2] P. Bapat, R. Jadhav, V. Mishra and A. Sahitya, "An Approach Travel Recommendation System and Route Optimizer using AI," 2022 5th International Conference on Advances in Science and Technology (ICAST), Mumbai, India, 2022, pp. 486-490, doi: 10.1109/ICAST55766.2022.10039531.
- [3] R. E. Nalawati, D. Y. Liliانا, F. Nugrahani, F. H. Abiyanka and R. Karrel, "Sentiment Analysis on Tripadvisor Hotel Review using Named Entity Recognition," 2022 5th International Conference on Information and Communications Technology (ICOIACT), Yogyakarta, Indonesia, 2022, pp. 311-316, doi: 10.1109/ICOIACT55506.2022.9972202.
- [4] S. Kokate, A. Gaikwad, P. Patil, M. Gutte and K. Shinde, "Traveler's Recommendation System Using Data Mining Techniques," 2018 Fourth International Conference on Computing Communication Control and Automation (ICCUBEA), Pune, India, 2018, pp. 1-5, doi: 10.1109/ICCUBEA.2018.8697862.
- [5] Alexander Smirnov; Alexey Kashevnik; Nikolay Shilov; Nikolay Teslya; Anton Shabaev, "Mobile application for guiding tourist activities: tourist assistant - TAIS" Proceedings of 16th Conference of Open Innovations Association FRUCT <https://ieeexplore.ieee.org/document/7000931>