

Overview

This AI-powered travel platform is a web-based application designed to simplify the trip planning and booking process through real-time travel data, intelligent itinerary generation, and a conversational assistant. By integrating APIs for flights, hotels, and experiences, the platform enables users to plan personalized, budget-optimized trips and complete bookings seamlessly. Future expansion to mobile is planned to extend accessibility.

Problem Statement

Planning travel involves juggling multiple platforms for flights, hotels, and activities — often resulting in fragmented experiences, missed opportunities, and inefficient budgeting. Users lack a unified, intelligent platform that can recommend, plan, and book trips based on their preferences in a conversational, human-like manner.

Solution Offered

The platform integrates travel APIs (Duffel for flights, hotel, and activity data), Stripe for payments, and OpenAI for dynamic itinerary generation. An AI chatbot assists users in discovering destinations, adjusting travel plans, and finalizing bookings. With support for OCR-based passport scanning, guest access, and real-time search, it streamlines the entire travel planning lifecycle in one intuitive flow.

Core Features

- ★ Real-time API integrations for flights, hotels, and activities via Duffel
- ★ AI-powered itinerary builder using OpenAI based on user preferences
- ★ Conversational chatbot for personalized travel planning and modifications
- ★ OCR integration (Google Vision/Tesseract) for easy passport scanning
- ★ One-click booking for flights, stays, and experiences
- ★ Budget optimization with intelligent suggestions
- ★ Guest mode access for casual browsing without sign-up
- ★ Admin panel to manage users, bookings, and analytics

Technical Challenges

- Real-Time Data Synchronization  
Handled dynamic availability and pricing updates across multiple APIs to maintain accuracy during the booking process.
- AI Recommendation Accuracy  
Tuned OpenAI prompts and itinerary logic to deliver relevant, context-aware travel plans based on changing user inputs.

Conclusion

This AI-driven travel platform offers an all-in-one solution that simplifies the user journey from inspiration to booking. By merging real-time data, intelligent planning, and conversational UX, it provides a modern, intuitive experience for travelers — while laying the groundwork for scalable, multi-device expansion in the travel tech space.

Screenshots

