System Requirements Specification (SRS) for Tourism Services & Travel Management App

2025

1 Introduction

1.1 Project Title

Tourism Services & Travel Management App

1.2 Defining the General Objective of the Project

The objective of this project is to develop two mobile applications: one for tourists and another for service providers. The tourist application provides essential services tailored to tourists' needs and preferences, ensuring an efficient and well-organized travel experience. Meanwhile, the service provider application enables service providers to showcase their offerings and communicate directly with tourists. This project aims to deliver a comprehensive tourism experience and create added value in the field of digital tourism.

Tourist Application: Allows tourists to explore cities, book accommodations, find restaurants, arrange transportation, and access cultural sites.

Tourism Service Distributor Application: Enables service providers to manage, promote, and offer their services, such as guided tours, dining, and transportation, while interacting directly with tourists.

2 System Requirements Design

2.1 System Actors

- Tourist
- Distributor Services

2.2 Functional Requirements

2.2.1 Tourist Application

User Registration & Authentication

- Supports email and third-party authentication (Google, Facebook, etc.).
- Enables password reset and profile management.
- Provides guest access with limited features (e.g., no booking).

City Exploration

- Lists cities with details on weather, culture, and events.
- Offers search and filter options based on budget, interests, or location.

Accommodation Booking

- Allows users to search and book hotels, apartments, and guesthouses.
- Provides filters for price, rating, and available amenities.

Restaurant Services

- Displays restaurant listings with menus, reviews, and ratings.
- Supports reservations and online ordering (optional).

Transport Services

- Offers car rentals, trains, buses, bicycles.
- Facilitates service comparison and booking, with optional external integrations (e.g., Yassir).

Historical & Cultural Sites

- Provides details on landmarks, museums, and cultural sites.
- Supports online ticket reservations for events and excursions.

Reviews & Ratings

• Enables users to rate and review services.

Notifications & Alerts

• Sends updates on bookings, special offers, and recommendations.

2.2.2 Tourism Service Distributor Application

Service Provider Registration & Authentication

- Supports account creation and login.
- Allows management of business profiles.

Service Management

- Enables adding, modifying, and removing listings (e.g., hotel rooms, tours, menus).
- Displays real-time booking availability.

Customer Interaction

• Integrates a messaging system for direct communication with tourists.

Promotions & Marketing

- Highlights special offers and discounts.
- Optionally integrates with social media for better visibility.

Notifications & Updates

• Sends alerts for new bookings and customer messages.

3 User Roles

3.1 Tourists

- Create and manage their account.
- Search for cities, accommodations, restaurants, and transportation.
- Book and manage reservations.
- Leave ratings and reviews for services.
- Receive notifications on bookings, offers, and updates.

3.2 Service Providers

- Register and manage their business profiles.
- Add, update, and delete service listings.
- Display real-time availability for bookings.
- Communicate with tourists.
- Promote services through special offers and social media integration.

4 Non-Functional Requirements

- Performance: Ensures smooth performance for multiple concurrent users.
- Security & Privacy: Implements encryption, secure authentication, and privacy compliance.
- Availability: Guarantees 24/7 uptime with scheduled maintenance.
- Usability: Provides an intuitive interface for tourists and service providers.
- Scalability: Supports future feature expansions and user growth.

5 System Constraints

- Supported Platforms: Android and iOS.
- Internet Dependency: Requires an active internet connection.
- Supported Languages: English & Arabic.

6 Risks

- Server failures causing downtime.
- Unreliable service provider updates leading to outdated information.
- Fake reviews affecting credibility.
- Booking issues such as cancellations or overbookings.

7 Conclusion

The Tourism Services & Travel Management App enhances the tourism experience by providing a platform for tourists and service providers. This SRS document outlines the project's objectives, functional and non-functional requirements, user roles, and potential risks.

8 System Design (UML Diagrams)

8.1 Use Case Diagram

Definition: The use case diagram describes how different actors interact with the system. It presents the main functionalities provided by the system as well as the actors involved in these interactions.

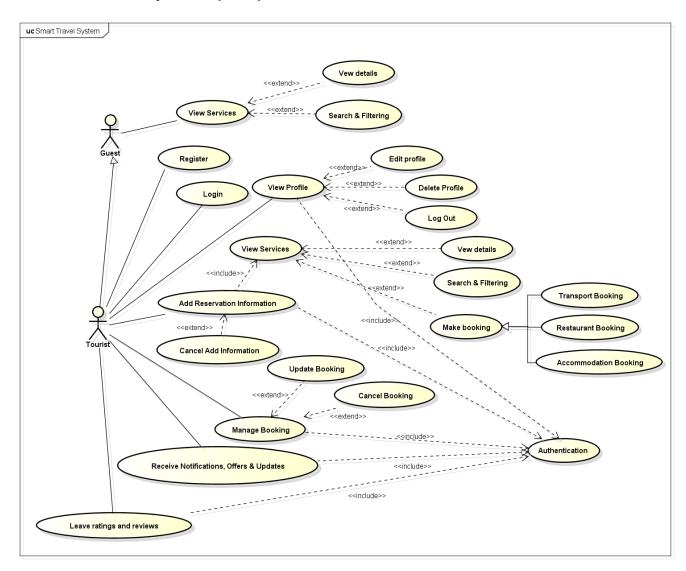


Figure 1: Use Case Diagram

8.2 Sequence Diagrams

Definition: Sequence diagrams represent interactions between system components in a time-sequenced manner. They are used to illustrate how functionalities are carried out step by step between the user and the system.

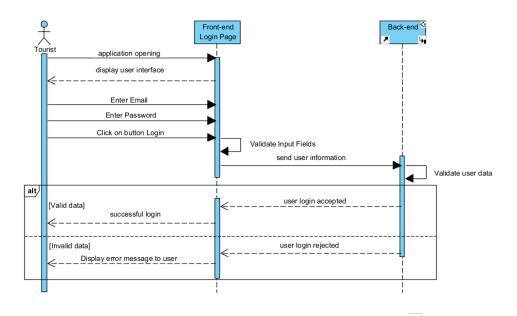


Figure 2: Sequence Diagram – User Login

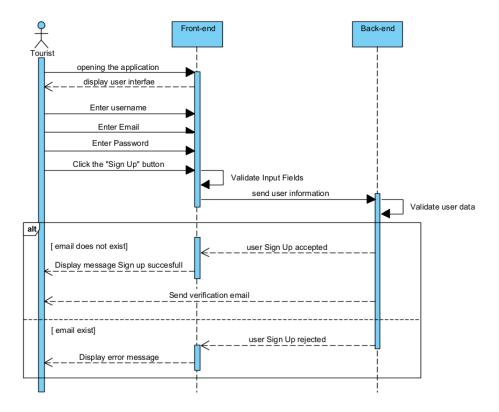


Figure 3: Sequence Diagram – User Registration

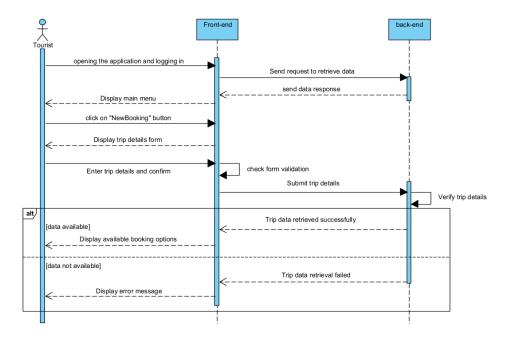
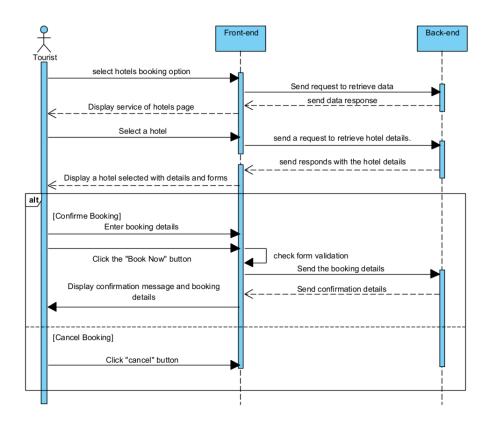


Figure 4: Sequence Diagram – Pre-Booking Services



 ${\bf Figure~5:~Sequence~Diagram-Hotel~Booking}$

8.3 Class Diagram

Definition: The class diagram illustrates the static structure of the system, including classes, attributes, methods, and relationships such as inheritance or associations between objects.

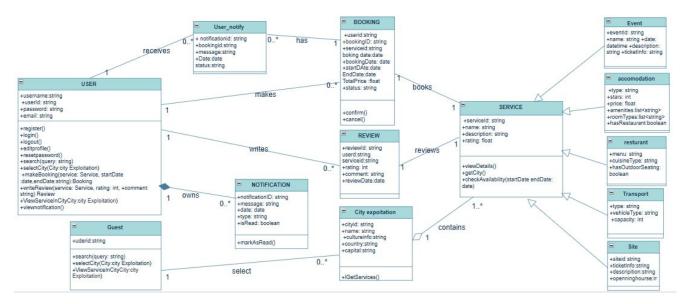


Figure 6: Class Diagram