

SC2006: Software Engineering

Lab 3 Deliverables

WanderMap

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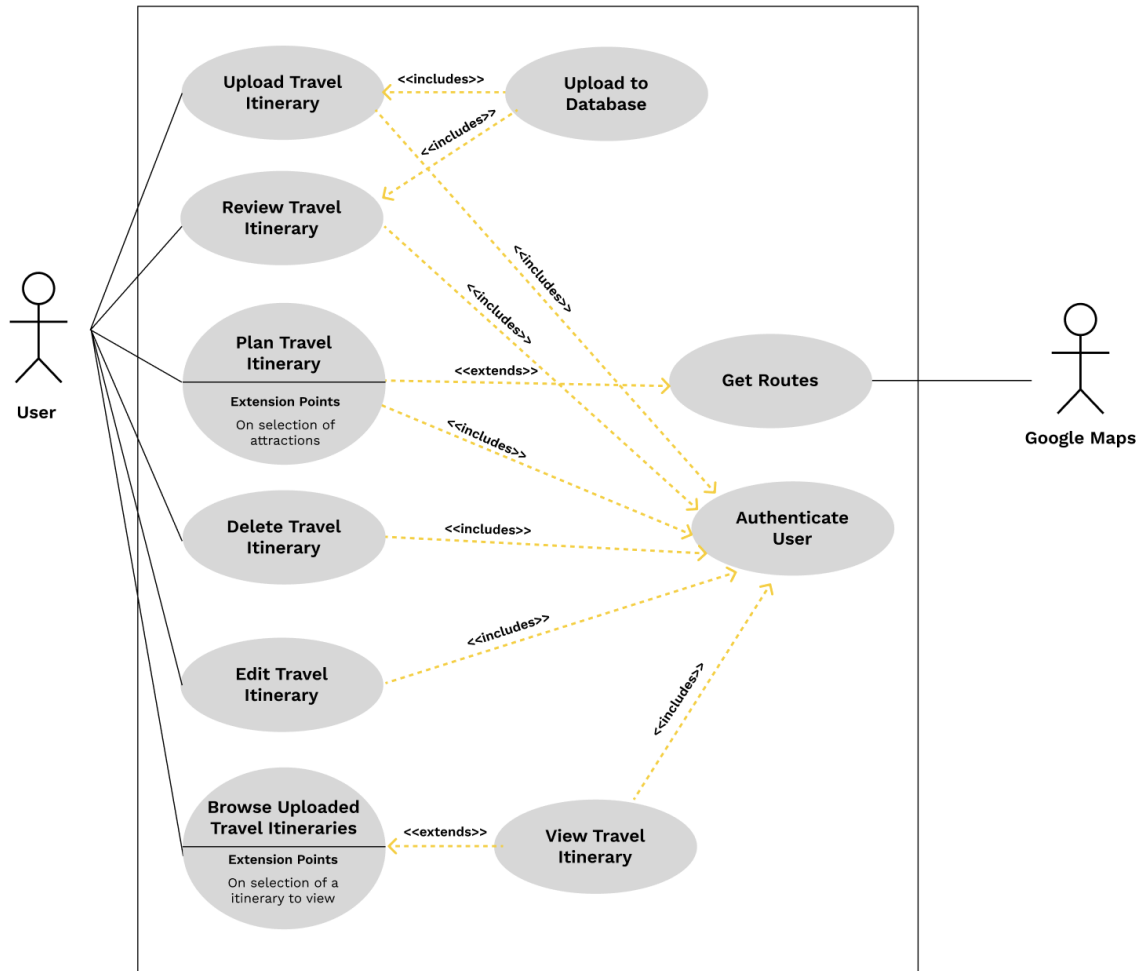
Dan He (N2304782D)

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Use Case Model

Use Case Diagram



Use Case Description

Use Case ID:	001		
Use Case Name:	Authenticate user		
Created By:	Eyan Chua	Last Updated By:	Eyan Chua
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	Users of the website
Description:	All users must be able to log into their account before they are able to plan or post itineraries. This is to provide legitimacy for the itineraries uploaded and protect the quality of posted itineraries.
Precondition:	User has not been authenticated.
Postcondition:	User has successfully signed in or signed up.
Priority:	High
Frequency of Use:	Frequent
Flow of Events:	<ol style="list-style-type: none">1. Users can choose to sign in if they have already created an account, or sign up if they are a first time user.2. If the user chooses to sign up, the app requests for a valid email and password.3. If the user chooses to sign in, the app requests for the email and password that was previously used to create the account.4. If the sign up credentials are valid, the system creates a new account for the user.5. If the sign in credentials are correct, the user is able to access their account.
Alternative Flows:	<p>AF - S4 If the sign up credentials are not valid, the app will display an error message and the app will return to step 2.</p> <p>AF - S5 If the sign in information is not found, the app will display an error message and the app will return to step 3.</p>
Exceptions:	-
Includes:	-
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	002		
Use Case Name:	Create and plan travel itinerary		
Created By:	Ang Yvette	Last Updated By:	Ang Yvette
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	User
Description:	User can input addresses of different attractions or activities he/she would like to visit.
Precondition:	User has the website opened and an account created.
Postcondition:	User receives a suggested itinerary with estimated time required.
Priority:	Medium
Frequency of Use:	Frequent
Flow of Events:	<ol style="list-style-type: none"> 1. User selects the 'Plan travel' option. 2. User inputs the title, description and image of the itinerary. 3. User inputs the locations they would like to travel to. 4. If more than one attraction is chosen, user can select the order they wish to visit the attractions. 5. The app uses the Google Maps API to calculate and display an end-to-end route from the different locations. 6. User can choose to save as draft or submit and share the planned itinerary.
Alternative Flows:	AF - S3 If the Google Maps API is unable to provide a route for the imputed attractions, an error message will be displayed. App returns to Step 3.
Exceptions:	-
Includes:	<ol style="list-style-type: none"> 1. Google Maps Routes API to plan routes. 2. Google Maps Places API to get valid businesses.
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	003		
Use Case Name:	Get routes		
Created By:	Tan Hui Ling	Last Updated By:	Tan Hui Ling
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	Google Maps
Description:	Retrieve route between listed attractions in the travel itinerary on an integrated map feature. The route shall follow the order imputed by the user.
Precondition:	User has inputted a minimum of 2 attractions into their travel itinerary.
Postcondition:	System successfully displays the route on the integrated map feature to the user.
Priority:	High
Frequency of Use:	Frequent
Flow of Events:	<ol style="list-style-type: none"> 1. User selects the attractions they wish to visit. 2. User selects the order they wish to visit the attractions. 3. If Google Maps Routes API can find the imputed addresses and a valid route, it returns the details of route to the system. 4. The system displays the route returned by Google Maps Routes API on the Integrated Map.
Alternative Flows:	AF - S3 If Google Maps Routes API cannot find a valid route between attractions, the system will return an error message and prompt the user to re-enter all attractions. The system will return to step 2.
Exceptions:	-
Includes:	-
Special Requirements:	Google Maps Location API
Assumptions:	-
Notes and issues:	-

Use Case ID:	004		
Use Case Name:	Post travel itinerary		
Created By:	Tan Hui Ling	Last Updated By:	Tan Hui Ling
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	User
Description:	Users can upload their travel itineraries onto the website for other users to view and interact with. The travel itinerary includes information such as the rating of the route, addresses of attractions included in the route, and descriptions of the route and the attractions. This allows users to plan out their day with more confidence and efficiency.
Precondition:	User is logged into the system
Postcondition:	Travel itinerary is successfully uploaded onto the website
Priority:	High
Frequency of Use:	Frequent
Flow of Events:	<ol style="list-style-type: none"> 1. User selects "Create new travel itinerary" on the homepage of the website. 2. User selects and adds the attractions they wish to visit or have visited into the itinerary. 3. The user selects to upload the travel itinerary. 4. The system processes the information. 5. The system uploads the travel itinerary and adds it to its database 6. The website displays a confirmation message to the user.
Alternative Flows:	AF - S4 If the system is unsuccessful in uploading the travel itinerary, the website will return an error message and prompt the user to try again. The system returns to step 2.
Exceptions:	-
Includes:	-
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	005		
Use Case Name:	Edit travel itinerary		
Created By:	Eyan Chua	Last Updated By:	Eyan Chua
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	Users
Description:	User can edit draft itineraries.
Precondition:	User is successfully logged in and has previously uploaded itineraries.
Postcondition:	Itinerary is successfully edited.
Priority:	Medium
Frequency of Use:	Seldom
Flow of Events:	<ol style="list-style-type: none"> 1. User selects an itinerary that they have created and saved but not yet uploaded. 2. User now has the option to edit the itinerary. 3. The user can choose to make amendments to the itinerary through adding attractions, deleting attractions, or editing the title and description of the itinerary. 4. The app processes the edit request. 5. The app displays a success message if the request has been processed.
Alternative Flows:	AF - S4 If the app is unable to process the request, an error message will be displayed and the app returns back to step 3.
Exceptions:	-
Includes:	<ol style="list-style-type: none"> 1. Authentication of user as a user can only edit their own itineraries.
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	006		
Use Case Name:	Delete travel itinerary		
Created By:	Eyan Chua	Last Updated By:	Eyan Chua
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	Users
Description:	User can delete their draft itineraries.
Precondition:	User is successfully logged in and has previously uploaded itineraries.
Postcondition:	Itinerary is successfully edited or deleted.
Priority:	Medium
Frequency of Use:	Seldom
Flow of Events:	<ol style="list-style-type: none"> 1. User selects a draft itinerary that they have yet to upload. 2. User now has the option to delete the itinerary. 3. The app sends a confirmation message to delete the itinerary. 4. The app then processes the delete request. 5. The app displays a success message if the request has been processed.
Alternative Flows:	AF - S4 If the app is unable to process the request, an error message will be displayed and the app returns back to step 2.
Exceptions:	-
Includes:	<ol style="list-style-type: none"> 1. Authentication of user as a user can only edit/delete their own itineraries.
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	007		
Use Case Name:	Browse uploaded travel itineraries		
Created By:	Ang Yvette	Last Updated By:	Ang Yvette
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

Actor:	User
Description:	User can browse travel itineraries uploaded by others. User can filter itineraries according to preset categories (attractions, nightlife, food, sightseeing, chill). User can click into each itinerary to view locations, budget and more information provided.
Precondition:	User has a registered account.
Postcondition:	User views a list of itineraries based on applied categories and views further information on the interested travel itinerary.
Priority:	High
Frequency of Use:	Frequent
Flow of Events:	<ol style="list-style-type: none"> 1. User selects the "Browse Travel Ideas" option. 2. User applies categories (e.g., attractions, nightlife, food, sightseeing) to narrow down the list of itinerary ideas. 3. The app retrieves and displays itinerary ideas based on the applied categories. 4. User can click on an itinerary idea to view more information. 5. User views a map feature with locations for that itinerary and a list of information such as price and activities to be done.
Alternative Flows:	AF - S2 If no itinerary ideas match the applied filters, the app informs the user accordingly. App returns to Step 2.
Exceptions:	-
Includes:	<ol style="list-style-type: none"> 1. Get shared itinerary from other users
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	008		
Use Case Name:	Delete travel itinerary		
Created By:	Eyan Chua	Last Updated By:	Eyan Chua
Date Created:	01/02/2024	Date Last Updated:	01/02/2024

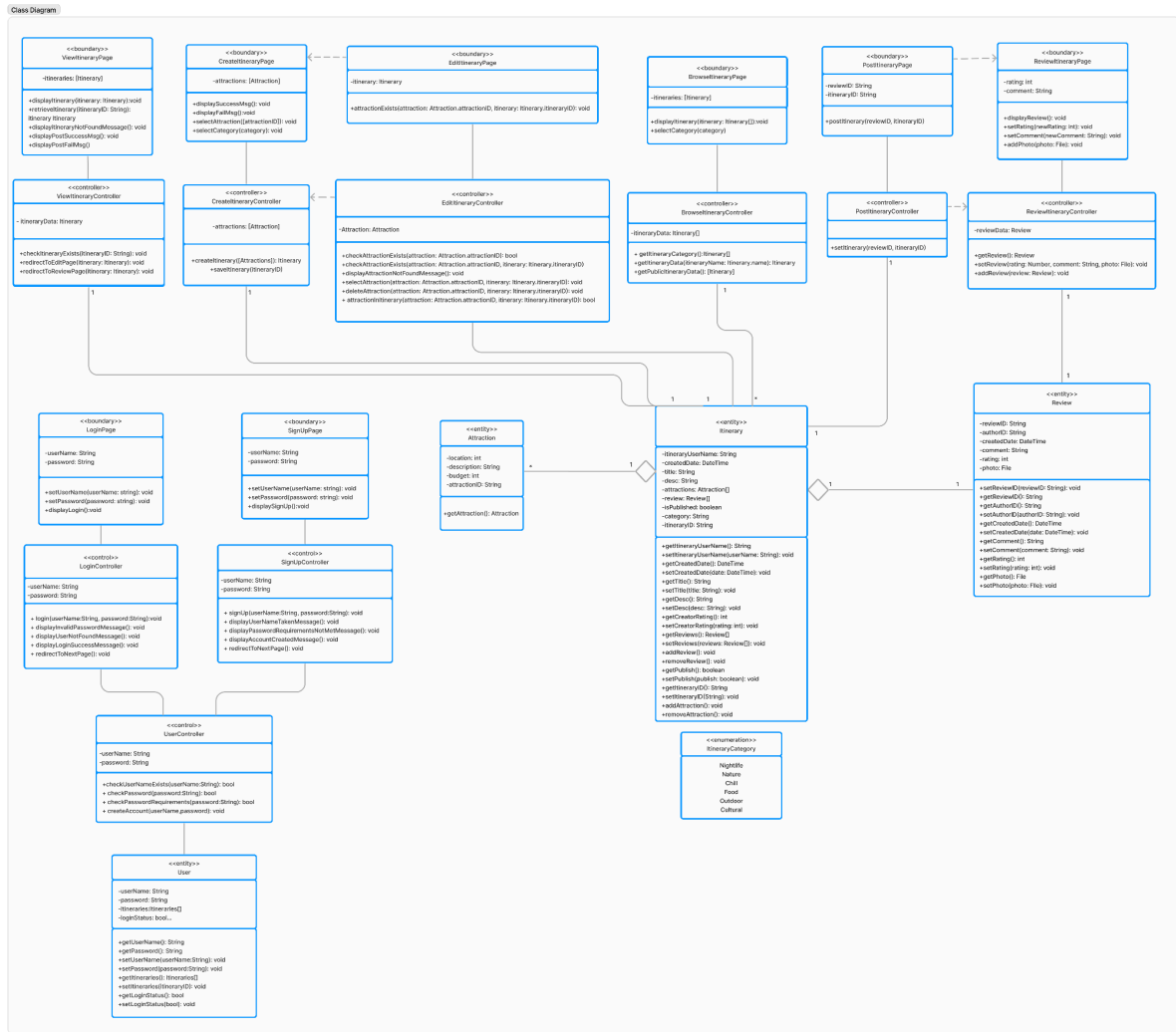
Actor:	Users
Description:	User can delete their uploaded itineraries.
Precondition:	User is successfully logged in and has previously uploaded itineraries.
Postcondition:	Itinerary is successfully edited or deleted.
Priority:	Medium
Frequency of Use:	Seldom
Flow of Events:	<ol style="list-style-type: none"> 1. User selects an itinerary that they have previously uploaded. 2. User has the option to delete the itinerary. 3. The app sends a confirmation message to delete the itinerary. 4. The app then processes the delete or edit request. 5. The app displays a success message if the request has been processed.
Alternative Flows:	AF - S2 If the app is unable to process the request, an error message will be displayed and the app returns back to step 2.
Exceptions:	-
Includes:	<ol style="list-style-type: none"> 1. Authentication of user as a user can only edit/delete their own itineraries.
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

Use Case ID:	009		
Use Case Name:	Review travel itinerary		
Created By:	Eyan Chua	Last Updated By:	Eyan Chua
Date Created:	13/02/2024	Date Last Updated:	13/02/2024

Actor:	Users
Description:	User can review others' itineraries.
Precondition:	User is successfully logged in.
Postcondition:	Review is successfully posted and tagged to the itinerary.
Priority:	Medium
Frequency of Use:	Seldom
Flow of Events:	<ol style="list-style-type: none"> 1. User selects an itinerary that they see when browsing itineraries. 2. User now has the option to upload a text review, a rating and a photo. 3. The app processes the review data and stores it in the database under the itinerary. 4. User receives a success message if the review has been posted.
Alternative Flows:	AF - S2 If the app is unable to process the review (e.g. wrong file type), an error message will be displayed and the app returns back to step 2.
Exceptions:	-
Includes:	Authentication of users as only registered users can upload reviews.
Special Requirements:	-
Assumptions:	-
Notes and issues:	-

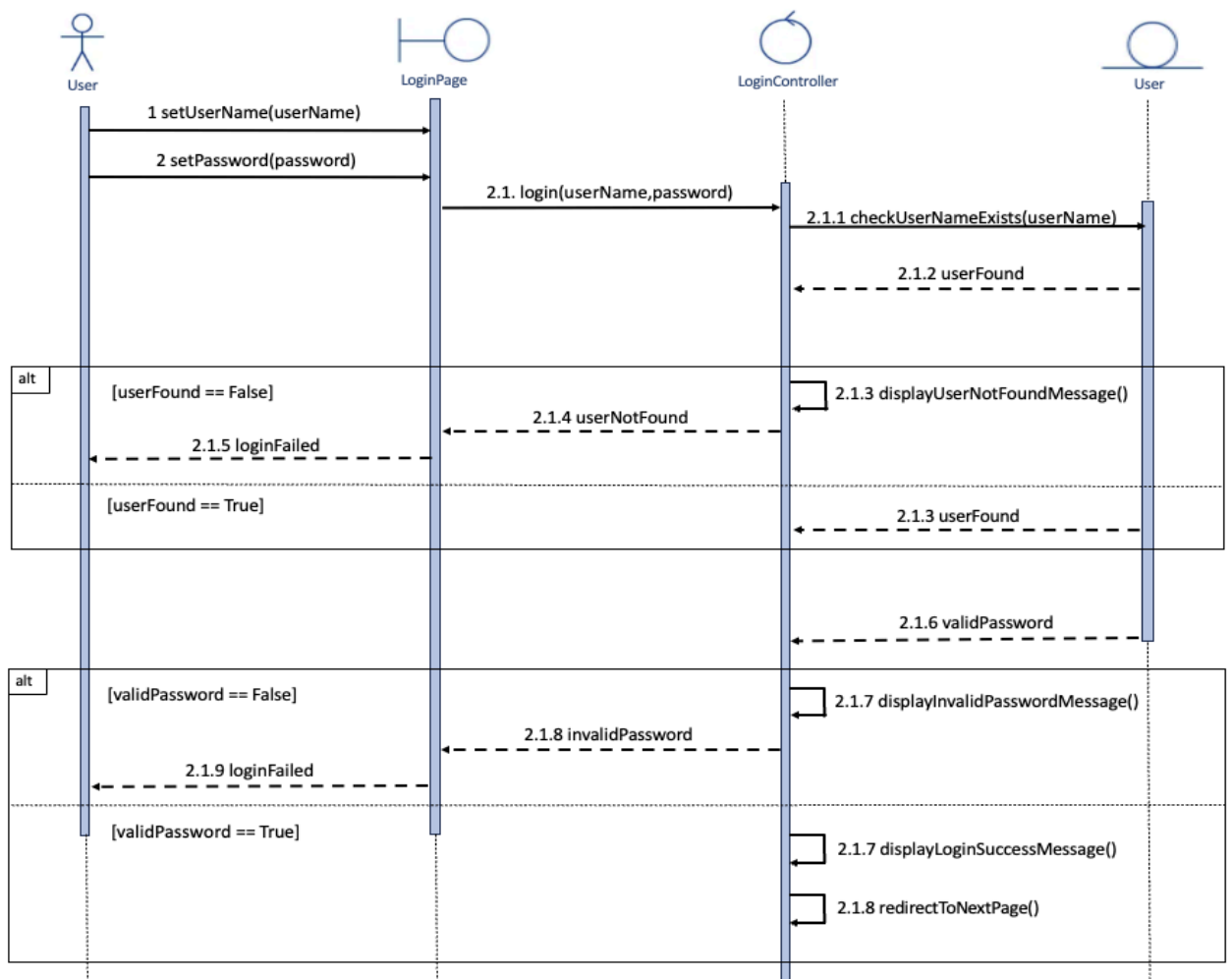
Design Model

Class Diagram

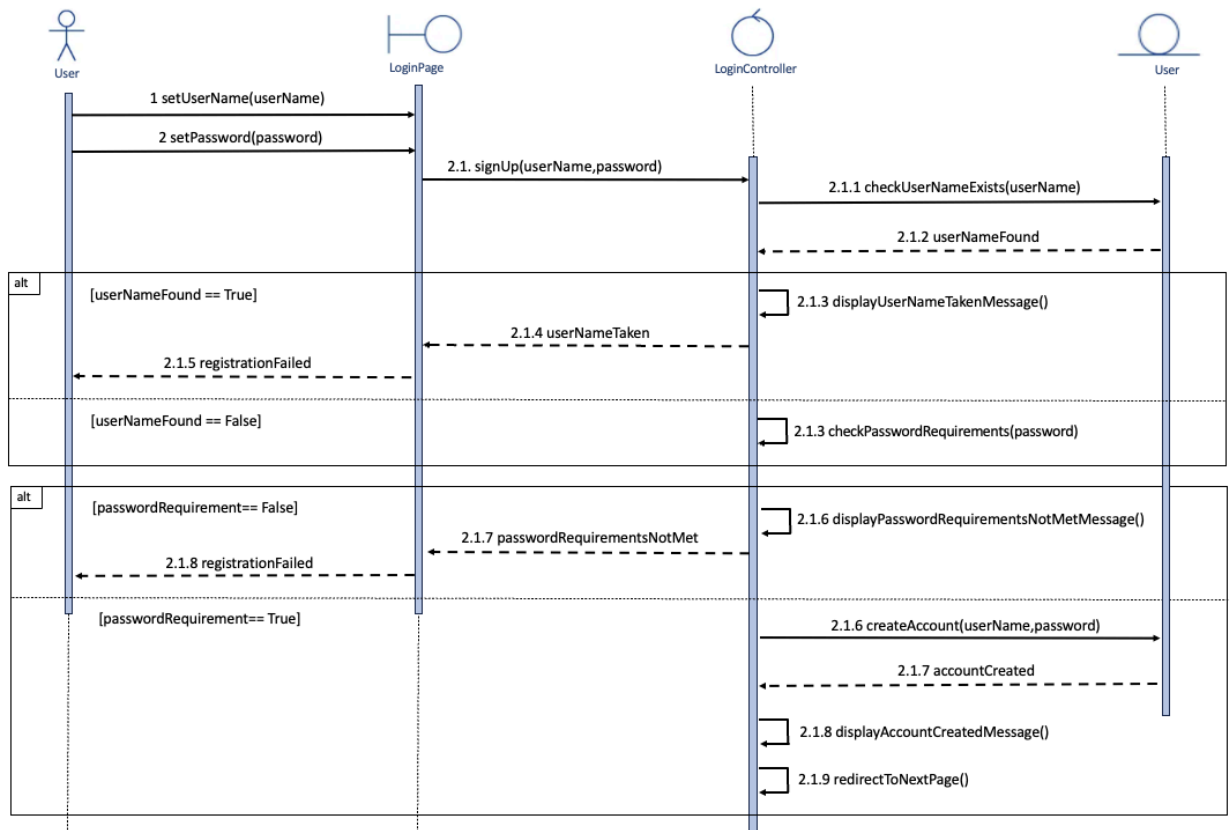


Sequence Diagram

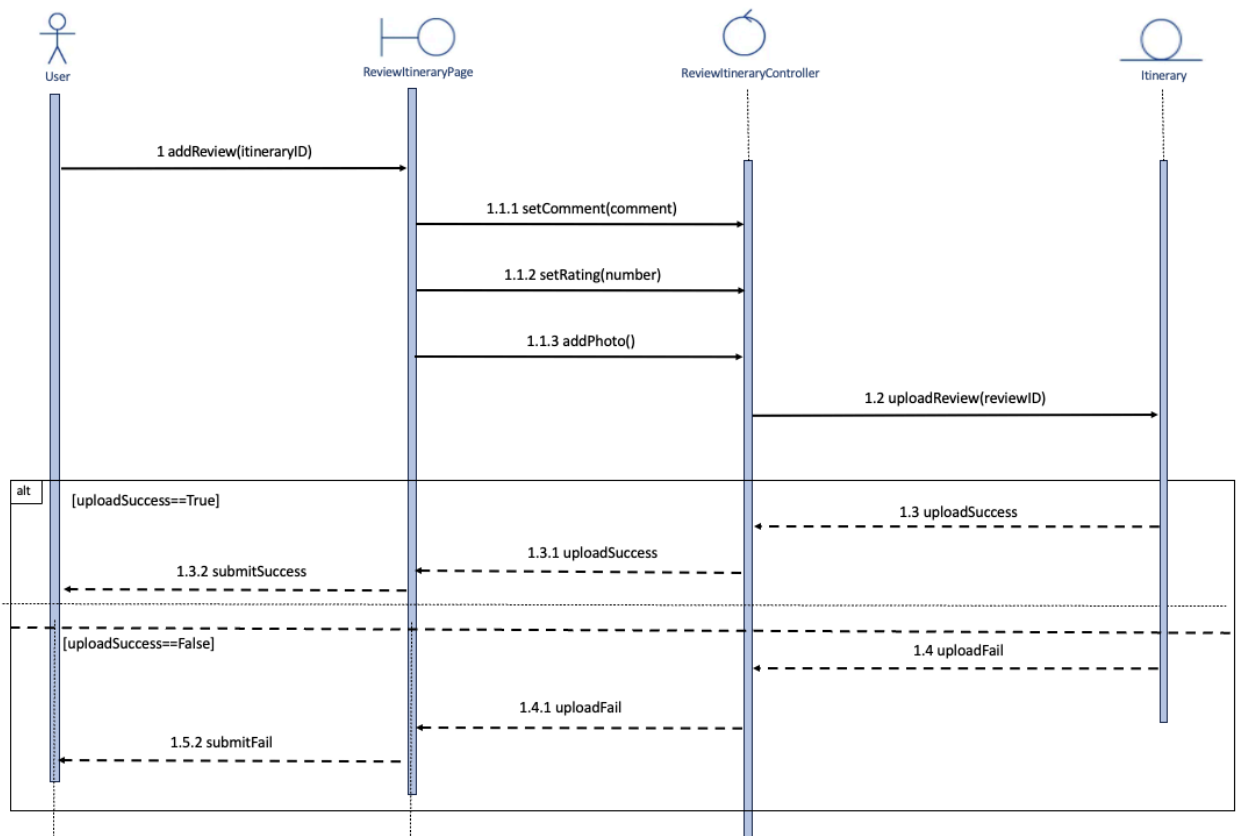
Login



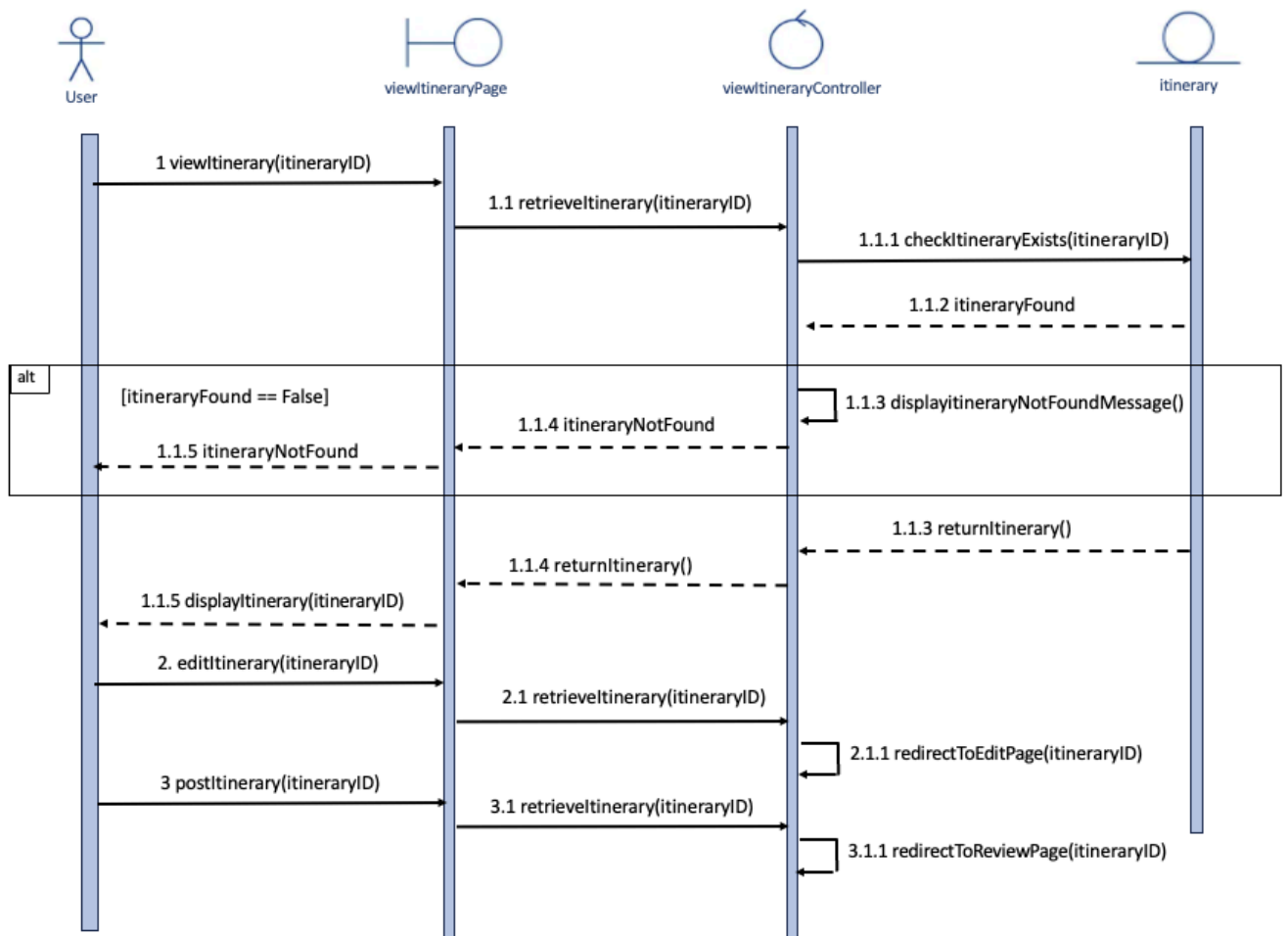
Sign up



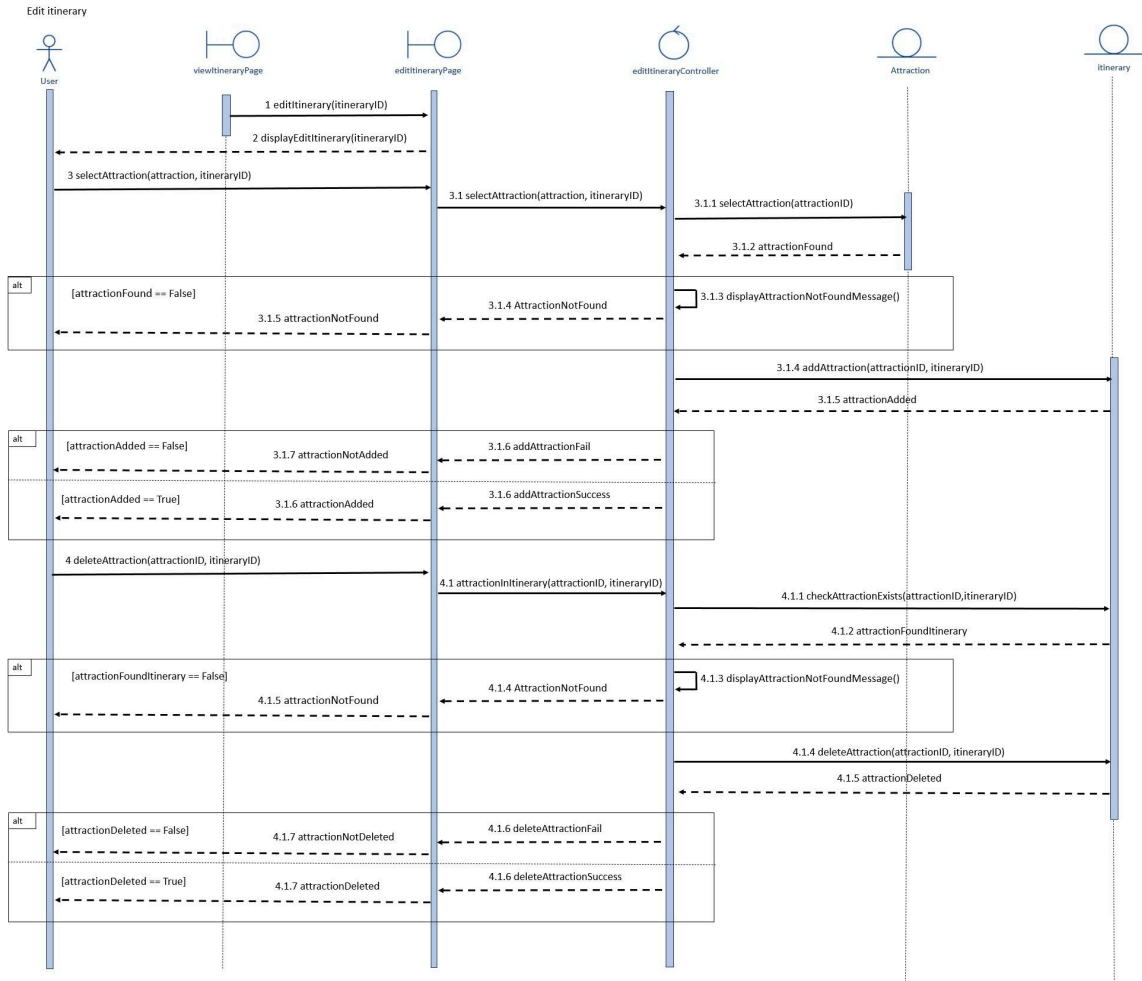
Review Itinerary



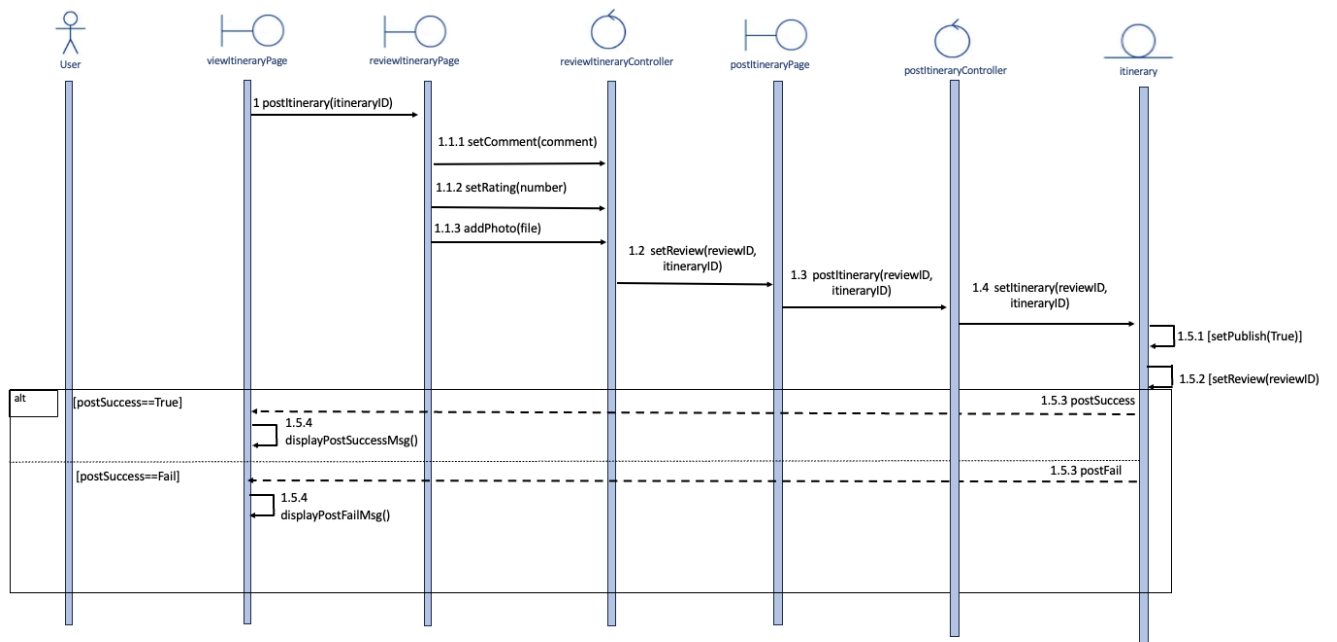
View Itinerary



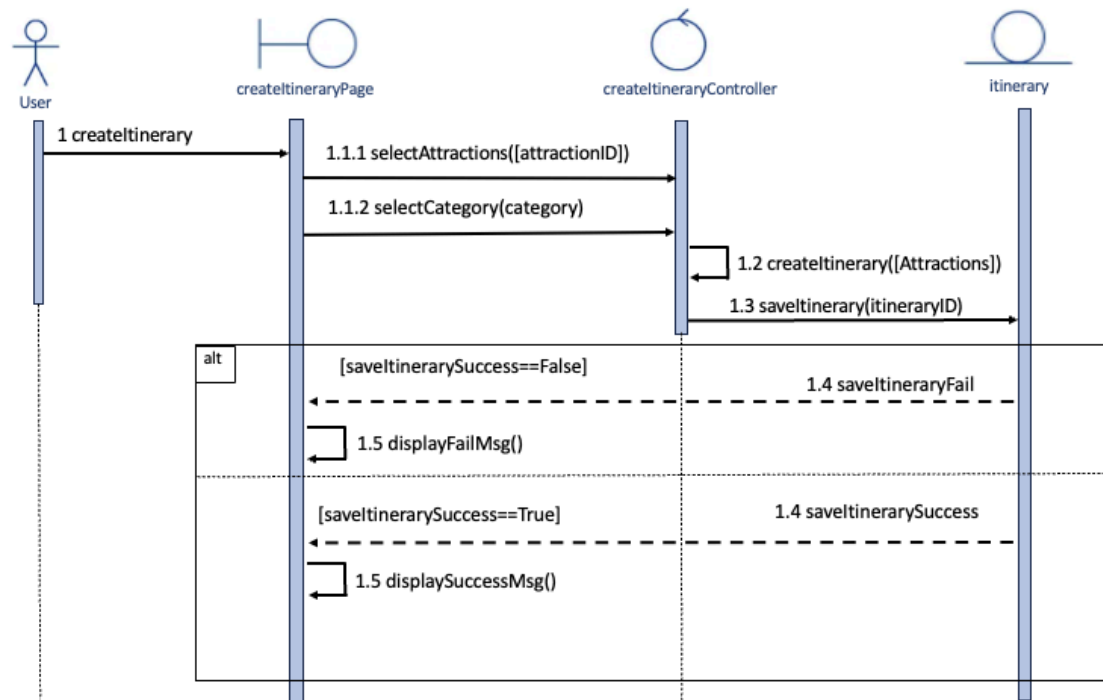
Edit Itinerary



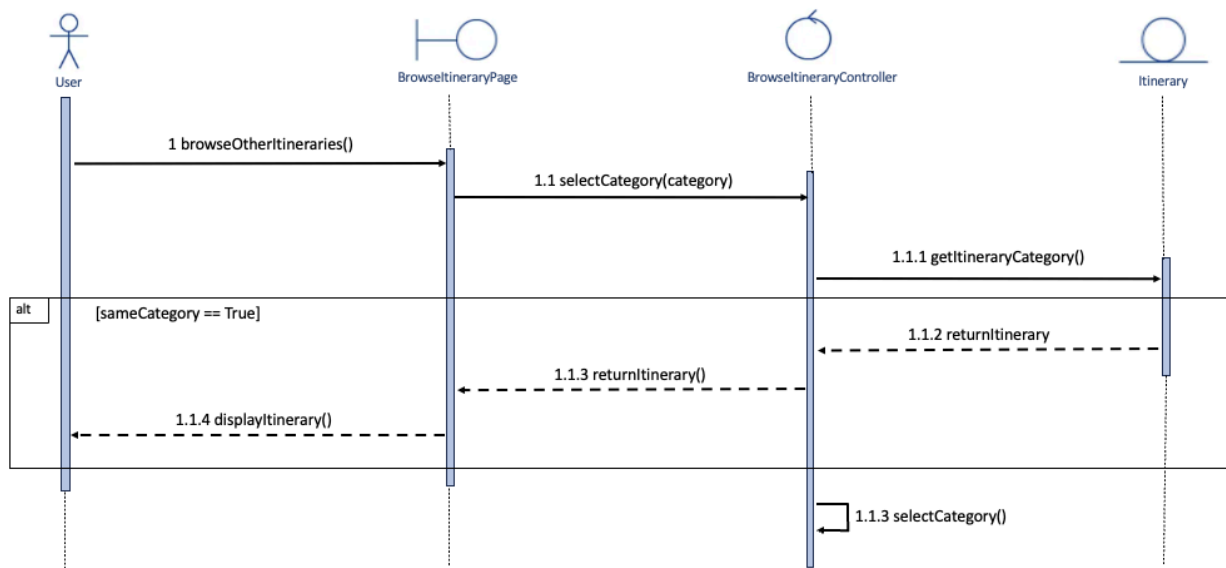
Post Itinerary



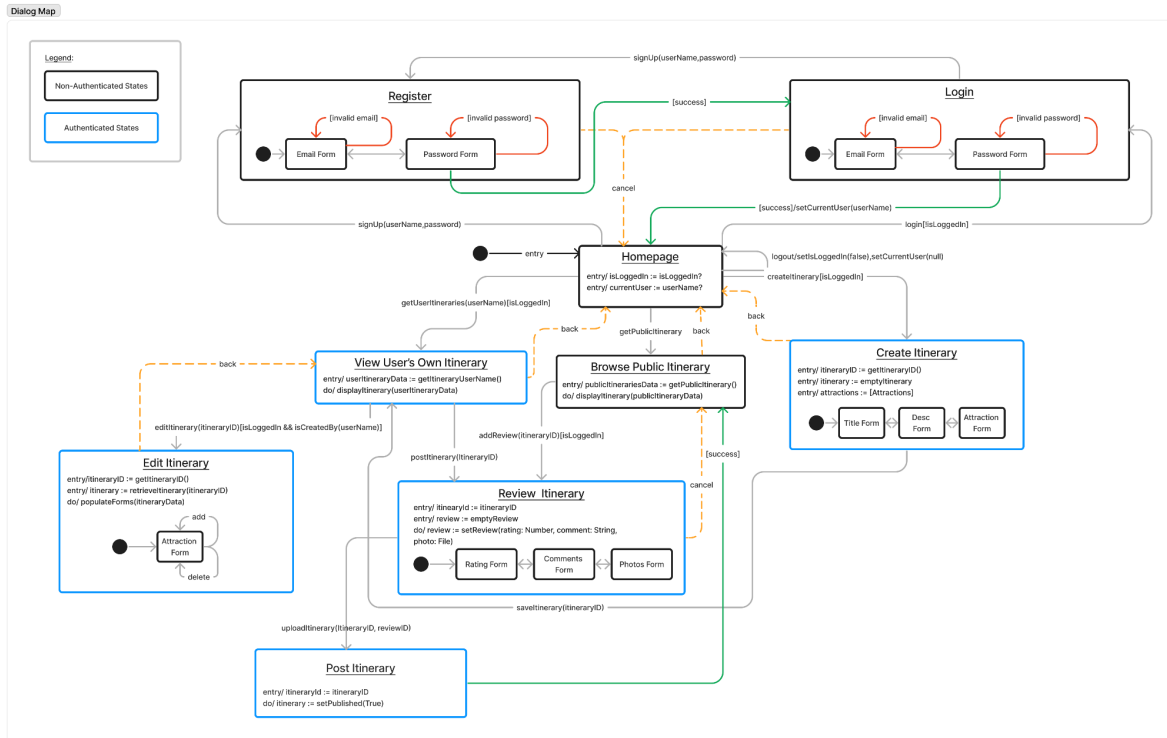
Create Itinerary



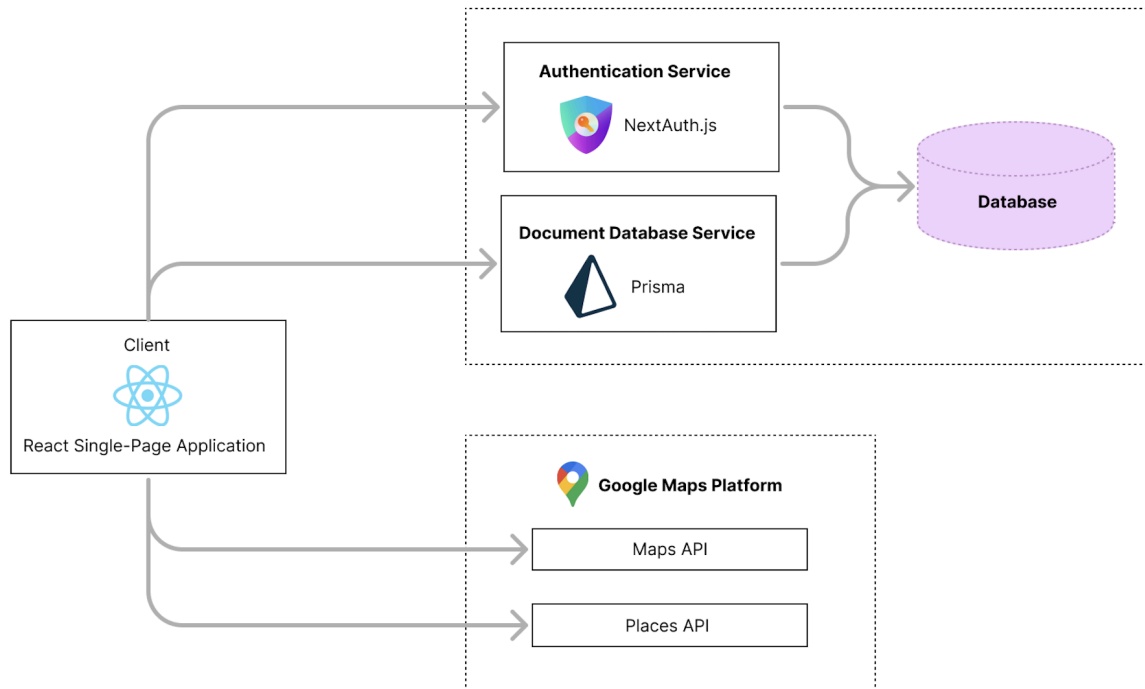
Browse Itinerary



Dialog Map

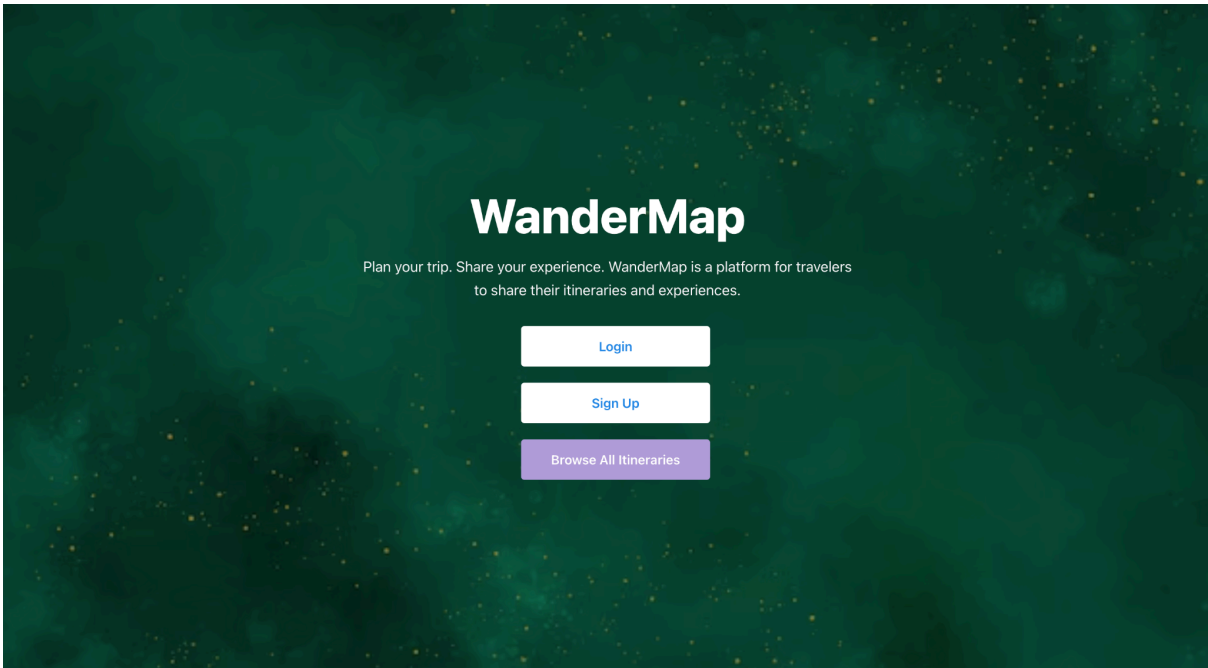


System architecture

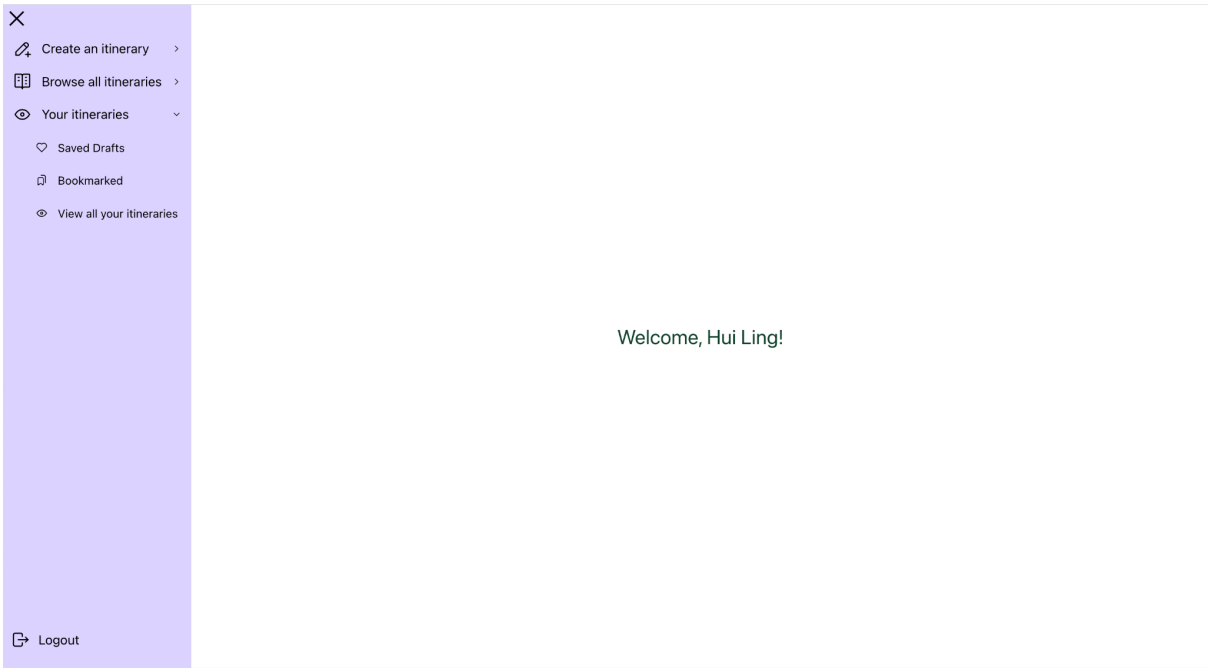


Application Skeleton

Login Page



Home Page



Create Itinerary Page

✕

Create an itinerary

>

Browse all itineraries

>

Your itineraries

▼

Saved Drafts

Bookmarked

View all your itineraries

Logout

Create Itinerary

Title *

Description *

☐Gardens BTB - \$20 - garden

☐Singapore Zoo - \$10 - moo

☐Merlion - \$0 - rawr

Choose files

No file chosen

Save as Draft

Submit Itinerary

Edit Itinerary Page

Edit Itinerary

Title *

Draft of fun trip

Description *

still planning

☐Gardens BTB - \$20 - garden

☒Singapore Zoo - \$10 - moo

☒Merlion - \$0 - rawr

Choose files

cat.jpeg

Save as Draft

Submit Itinerary

Browse All Itinerary Page

✕

🔗 Create an itinerary >

📅 Browse all itineraries >

👁 Your itineraries >

📌 Saved Drafts

🔖 Bookmarked

👁 View all your itineraries

Logout

Browse all itineraries


Choose your category

Select your category!

Sort by Upvotes

Sort by Recent

Sort by Cheapest



Fun trip around Singapore


great day :)

Show details

Review

🔖

📌



Explore Singapore

fun :D

Show details

Review

🔖

📌

Details Page

Back

Fun trip around Singapore

Description: great day :)
Budget required: 30



- Gardens BTB

Description: garden

Latitude: 1.281686286376606

Longitude: 103.8638599587655

View Route to next attraction
- Merlion

Description: rawr

Latitude: 1.288193276776551

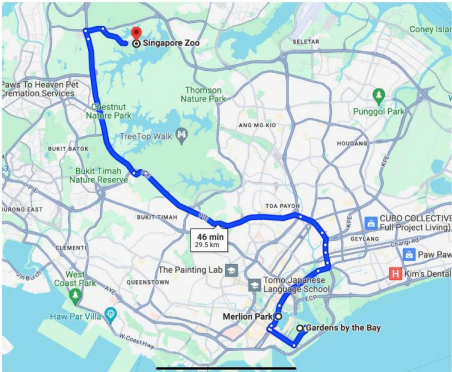
Longitude: 103.8542684375424

View Route to next attraction
- Singapore Zoo

Description: moo

Latitude: 1.404487931550608

Longitude: 103.7931624703224



yvette ang

Comment: hih

Rating: 4.5 stars



Review Page

← Back

Review the itinerary!

Comment

Write Comment Here

Rating:

★★★★★

Choose files

No file chosen

Submit Review!

Saved Drafted Page

×

🔗 Create an itinerary >

📅 Browse all itineraries >

👁 Your itineraries ▾

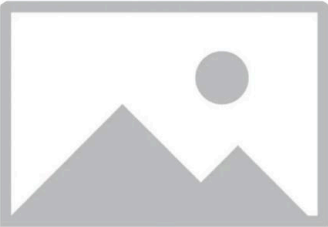
♡ Saved Drafts

🔖 Bookmarked

👁 View all your itineraries

🚪 Logout

Browse your drafts



Draft of fun trip

still planning

Delete

Edit

Bookmarked Page

✕

 Create an itinerary >

 Browse all itineraries >

 Your itineraries


 Saved Drafts

 Bookmarked

 View all your itineraries

 Logout

Browse your bookmarked itineraries





Explore Singapore

fun :D

Show details


Review








User Itinerary Page


✕


 Create an itinerary >


 Browse all itineraries >

 Your itineraries


 Saved Drafts

 Bookmarked

 View all your itineraries

 Logout

Browse your itineraries





Fun trip around Singapore


great day :)

Show details

Review







Draft of fun trip

still planning

Delete

Edit