

SOFTWARE TEST PLAN

Project Title: AI Powered Tourism App
Prepared By: Daniyal Ali, Ali Ahmed, Ahmed Ali
Start Date: 10-June-2025
End Date: 01-July-2025

#	Description	Test Engineer	Start Date	End Date
1	Login API Test	Daniyal Ali	10-06-25	01-07-25
2	Signup API Test	Daniyal Ali	11-06-25	01-07-25
3	Chatbot Intent & Response Accuracy Test	Ali Ahmed	12-06-25	01-07-25
4	Place Suggestion Logic Test	Ahmed Ali	13-06-25	01-07-25
5	Chatbot Fallback & No Match Handling	Ali Ahmed	14-06-25	01-07-25
6	Search Feature Functionality Test	Daniyal Ali	15-06-25	01-07-25
7	Mobile App Navigation and UI Responsiveness	Ali Ahmed	17-06-25	01-07-25
8	Display of Suggested Itinerary in Mobile View	Daniyal Ali	18-06-25	01-07-25
9	Fetch and Display of User Trip History	Ahmed Ali	20-06-25	01-07-25

TEST CASE DOCUMENT

Project Name: AI Powered Tourism App
Iteration No: 1
Module Name: Login API
Date: 10-june-2025
Test Case ID: TC-001
Test Engineer: Daniyal Ali
Test Case Description: This test case verifies the login API functionality using valid, invalid, and empty credentials. It ensures the system allows authenticated access and handles errors correctly.

S. No	Steps	Input Data	Expected Result	Actual Result	Pass/Fail
1	Enter valid credentials	user@test.com / 12345	Login successful	Login successful	Pass
2	Enter invalid credentials	user@test.com / wrong	Invalid credentials error	Invalid credentials error	Pass
3	Leave fields empty	-	Validation error message	Validation error message	Pass

Module Name: Chatbot

Date: 12-April-2025

Test Case ID: TC-002

Test Engineer: Ali Ahmed

Test Case Description: This test case checks if the **chatbot** correctly understands user queries and responds with relevant travel information. It should handle valid, unclear, and empty inputs by giving accurate or fallback replies. The test passes if responses match expected behavior.

S. No	Steps	Input Data	Expected Result	Actual Result	Pass/Fail
1	Enter city and interest	Lahore, Historical	Suggested historical places in Lahore	Suggested historical places in Lahore	Pass
2	Enter city only	Karachi	Generic suggestions for Karachi	Generic suggestions for Karachi	Pass
3	Enter interest only	Mountains	Top mountain destinations shown	Top mountain destinations shown	Pass
4	Enter invalid city or gibberish	Xyzabc	No suggestions / error message	No suggestions / error message	Pass
5	Leave input empty	(Blank)	Prompt user to enter valid input	Prompt user to enter valid input	

Module Name: User based Recommendation system

Date: 15-june-2025

Test Case ID: TC-005

Test Engineer: Daniyal Ali

Test Case Description: This test case verifies that the **recommendation system** suggests relevant tourist places based on the user's previous travel history. It checks if the system provides accurate and personalized suggestions that match the user's interests.

S. No	Steps	Input Data	Expected Result	Actual Result	Pass/Fail
1	User with clear history visits	History: "Lahore, Islamabad"	Recommendations based on similar users (e.g., "Murree")	Recommendations based on similar users (e.g., "Murree")	Pass
2	User with diverse location history	History: "Moen jo Daro, Faisal Mosque, Khyber pass"	Mixed-type suggestions (beach, mountains, cities)	Mixed-type suggestions (beach, mountains, cities)	Pass
3	New user with no history	No previous history	Default or popular places suggested	Default or popular places suggested	Pass

4	Invalid history data	History: "\$\$%%??"	Error handled or default	Error handled or default	Pass
	(corrupt/empty string)		recommendations shown	recommendations shown	
5	User with similar interest cluster	History: "Hunza, Skardu"	Recommendations within same cluster (northern areas)	Recommendations within same cluster (northern areas)	Pass

Module Name: Recommendation System API (K-Means Clustering)

Date: 18-june-2025

Test Case ID: TC-008

Test Engineer: Daniyal Ali

Test Case Description: This test case verifies the **Recommendation System API** that uses **K-Means clustering** to suggest places based on user history. It checks if the API returns personalized results for valid users, default suggestions for new users, and appropriate errors for invalid or missing input. The test passes if the API responds correctly in all scenarios.

S. No	Steps	Input Data	Expected Result	Actual Result	Pass/Fail
1	Send valid user ID with clear travel history	{ "user_id": 101 }	Returns personalized place recommendations	Returns personalized place recommendations	Pass
2	Send user ID with no history	{ "user_id": 202 }	Returns default or trending places	Returns default or trending places	Pass
3	Send invalid user ID	{ "user_id": "xyz" }	Returns error or empty response with status message	Returns error or empty response with status message	Pass
4	Send user with clustered interest history	{ "user_id": 303 }	Returns places from same cluster (e.g., mountain areas)	Returns places from same cluster (e.g., mountain areas)	Pass
5	API hit without user ID (missing param)	{ }	Returns error: "user_id required"	Returns error: "user_id required"	Pass