# 1. Login Functionality

# Test Case 1.1: Successful Login (Happy Path)

Preconditions: User is signed up.

### Steps:

- 1. Navigate to the login page.
- 2. Enter a valid email in the email field.
- 3. Enter a valid password in the password field.
- 4. Click the "Submit" button.

**Expected Result:** User is successfully logged in and redirected to the dashboard.

## **Test Case 1.2: Login with Invalid Email Format (Negative)**

Preconditions: None.

## Steps:

1. Navigate to the login page.

- 2. Enter an invalid email (e.g., "invalidEmail") in the email field.
- 3. Enter a valid password in the password field.
- 4. Click the "Submit" button.

**Expected Result:** An error message "Invalid email format" is displayed.

#### **Test Case 1.3: Login with Incorrect Password (Negative)**

Preconditions: None

## Steps:

- 1. Navigate to the login page.
- 2. Enter a valid email in the email field.
- 3. Enter an incorrect password in the password field.
- 4. Click the "Submit" button.

**Expected Result:** An error message "Incorrect password" is displayed.

## **Test Case 1.4: Login with Unregistered Email (Negative)**

**Preconditions:** Email is not registered.

- 1. Navigate to the login page.
- 2. Enter an unregistered email in the email field.
- 3. Enter a valid password in the password field.

4. Click the "Submit" button.

**Expected Result:** An error message "Email not found" is displayed.

#### **Test Case 1.5: Login with Empty Fields (Negative)**

Preconditions: None.

#### Steps:

- 1. Navigate to the login page.
- 2. Leave both the email and password fields empty.
- 3. Click the "Submit" button.

**Expected Result:** An error message "Email and Password are required" is displayed.

# 2. Sign Up Functionality

Test Case 2.1: Successful Sign Up (Happy Path)

**Preconditions:** User is not registered.

## Steps:

- 1. Navigate to the login page.
- 2. Click the "Sign up" button.
- 3. Fill in the required fields on the sign-up page.
- 4. Click the "Submit" button.

**Expected Result:** User is successfully registered and redirected to the login page.

### **Test Case 2.2: Sign Up with Existing Email (Negative)**

**Preconditions:** Email is already registered.

# Steps:

- 1. Navigate to the login page.
- 2. Click the "Sign up" button.
- 3. Fill in the required fields with an email that is already registered.
- 4. Click the "Submit" button.

**Expected Result:** An error message "Email is already registered" is displayed.

### **Test Case 2.3: Sign Up with Invalid Email Format (Negative)**

Preconditions: None.

#### Steps:

1. Navigate to the login page.

- 2. Click the "Sign up" button.
- 3. Fill in the required fields with an invalid email format.
- 4. Click the "Submit" button.

**Expected Result:** An error message "Invalid email format" is displayed.

## Test Case 2.4: Sign Up with Weak Password (Negative)

Preconditions: None.

## Steps:

- 1. Navigate to the login page.
- 2. Click the "Sign up" button.
- 3. Fill in the required fields with a weak password.
- 4. Click the "Submit" button.

**Expected Result:** An error message "Password is too weak" is displayed.

## **Test Case 2.5: Sign Up with Empty Fields (Negative)**

Preconditions: None.

#### Steps:

- 1. Navigate to the login page.
- 2. Click the "Sign up" button.
- 3. Leave some required fields empty.
- 4. Click the "Submit" button.

**Expected Result:** An error message "All fields are required" is displayed.

# 3. Contacts Functionality

## Test Case 3.1: Successful Logout (Happy Path)

**Preconditions:** User is logged in.

#### Steps:

- 1. Navigate to the "Contact List" page.
- 2. Click the "Logout" button.

**Expected Result:** User is logged out and redirected to the login page.

## **Test Case 3.2: Navigate to Add Contact Page (Happy Path)**

Preconditions: User is logged in.

- 1. Navigate to the "Contact List" page.
- 2. Click the "Add a New Contact" button.

**Expected Result:** User is redirected to the "Add Contact" page.

**Test Case 3.3: View Contact Details (Happy Path)** 

**Preconditions:** At least one contact is present in the contact list.

#### Steps:

- 1. Navigate to the "Contact List" page.
- 2. Click on any contact in the contact list.

**Expected Result:** User is redirected to the "Contact Details" page of the selected contact.

**Test Case 3.4: Contact List Display (Happy Path)** 

**Preconditions:** At least one contact is present in the contact list.

### Steps:

1. Navigate to the "Contact List" page.

**Expected Result:** All contacts are displayed correctly in the contact list with their details.

**Test Case 3.5: Empty Contact List (Negative)** 

**Preconditions:** No contacts are present in the contact list.

#### Steps:

1. Navigate to the "Contact List" page.

**Expected Result:** No contacts are displayed

**Test Case 3.6: Add Contact with Valid Data (Happy Path)** 

**Preconditions:** User is logged in and on the Add Contact page.

- 1. Enter "John" in the First Name field.
- 2. Enter "Doe" in the Last Name field.
- 3. Enter "1990-01-01" in the Date of Birth field.
- 4. Enter "john.doe@example.com" in the Email field.
- 5. Enter "8005551234" in the Phone field.
- 6. Enter "123 Main St" in the Street Address 1 field.
- 7. Enter "Apt 4B" in the Street Address 2 field.
- 8. Enter "Springfield" in the City field.
- 9. Enter "IL" in the State or Province field.

- 10. Enter "62701" in the Postal Code field.
- 11. Enter "USA" in the Country field.
- 12. Click the "Submit" button.

**Expected Result:** The contact is successfully added, the user is redirected to the Contact List page, and contacts are displayed correctly in the contact list

### **Test Case 3.7: Add Contact with Missing Required Fields (Negative)**

**Preconditions:** User is logged in and on the Add Contact page.

## Steps:

- 1. Leave the First Name and Last Name fields empty.
- 2. Enter valid data in the remaining fields.
- 3. Click the "Submit" button.

**Expected Result:** An error message "First Name and Last Name are required" is displayed. The contact is not added.

## **Test Case 3.8: Add Contact with Invalid Email (Negative)**

**Preconditions:** User is logged in and on the Add Contact page.

### Steps:

- 1. Enter "John" in the First Name field.
- 2. Enter "Doe" in the Last Name field.
- 3. Enter "invalid-email" in the Email field.
- 4. Enter valid data in the remaining fields.
- 5. Click the "Submit" button.

**Expected Result:** An error message "Invalid email format" is displayed. The contact is not added.

### **Test Case 3.9: Cancel Adding Contact (Navigation)**

**Preconditions:** User is logged in and on the Add Contact page.

## Steps:

1. Click the "Cancel" button.

**Expected Result:** The user is redirected to the Contact List page. No new contact is added.

#### 4. View Contact Details

#### **Test Case 4.1: View Contact Details (Happy Path)**

**Preconditions:** User is logged in and on the Contact Details page.

#### Steps:

- 1. Navigate to the Contact Details page.
- 2. Verify that the contact details are displayed correctly.

**Expected Result:** The contact details (First Name, Last Name, Email, etc.) are displayed accurately as per the data available.

## **Test Case 4.2: Edit Contact Button Functionality (Happy Path)**

**Preconditions:** User is logged in and on the Contact Details page.

#### Steps:

1. Click the "Edit Contact" button.

**Expected Result:** The user is redirected to the Edit Contact page.

## **Test Case 4.3: Delete Contact Button Functionality (Happy Path)**

**Preconditions:** User is logged in and on the Contact Details page.

### Steps:

- 1. Click the "Delete Contact" button.
- 2. Confirm the deletion if prompted.

**Expected Result:** The contact is deleted, and the user is redirected to the Contact List page.

#### **Test Case 4.4: Return to Contact List Button Functionality (Happy Path)**

**Preconditions:** User is logged in and on the Contact Details page.

## Steps:

1. Click the "Return to Contact List" button.

**Expected Result:** The user is redirected to the Contact List page.

## **Test Case 4.5: Logout Button Functionality (Happy Path)**

**Preconditions:** User is logged in and on the Contact Details page.

#### Steps:

1. Click the "Logout" button.

**Expected Result:** The user is logged out and redirected to the login page.

### **Test Case 4.6: Correct Information Display (Happy Path)**

**Preconditions:** User is logged in and on the Contact Details page.

## Steps:

- 1. Navigate to the Contact Details page.
- 2. Verify the data in each field (First Name, Last Name, Email, Phone, etc.).

**Expected Result:** Each field displays the correct information as per the contact details stored in the system.

## **Test Case 4.7: Access Non-Existent Contact Details (Negative)**

**Preconditions:** User is logged in.

#### Steps:

1. Manually enter the URL for a non-existent contact.

**Expected Result:** An error message is displayed, and the user is redirected to the Contact List page.

#### **Test Case 4.9: Update Contact Details (Happy Path)**

**Preconditions:** User is logged in and on the Edit Contact page.

## Steps:

- 1. Navigate to the Edit Contact page.
- 2. Update the details in the form fields.
- 3. Click the "Submit" button.

**Expected Result:** The updated contact details are saved, and the user is redirected to the Contact Details page with the updated information displayed.

### **Test Case 4.10: Form Validation for Mandatory Fields (Negative)**

**Preconditions:** User is logged in and on the Edit Contact page.

### Steps:

- 1. Clear the First Name, Last Name, and Email fields.
- 2. Click the "Submit" button.

**Expected Result:** Error messages are displayed for each mandatory field that is empty.

### **Test Case 4.11: Invalid Email Format (Negative)**

**Preconditions:** User is logged in and on the Edit Contact page.

- 1. Enter an invalid email address in the Email field (e.g., "invalid-email").
- 2. Click the "Submit" button.

**Expected Result:** An error message is displayed indicating that the email address is invalid.