# Chapter 4: Testing

## 4.1 Login Admin and User

Table 4.1: Login Admin and User Test Case

Login Admin and User Test Case

Test Engineer: Asma

Test Case ID: TC-1

Date: March 15th, 2024

Purpose: Login into the system.

Pre-Req: Already have an account

Test Data:  
• Username or Email & Password

Steps – Following steps will take place in test:

* Case 1:  
  • Users enter their username or email and password in required fields.  
  • Users click on login button.  
  • System verifies and redirects to respective dashboard.
* Case 2:  
  • Users enter invalid email or password.  
  • Users click on login button.  
  • System shows messages: 'Please enter valid information', 'Email is not registered', 'Password is incorrect'.

Status: Pass ✅

## 4.2 Signup User, Mentor and Admin

Table 4.2: Signup User, Mentor and Admin Test Case

Signup User, Mentor and Admin Test Case

Test Engineer: Asma

Test Case ID: TC-2

Date: March 15th, 2024

Purpose: Register a new account based on role.

Pre-Req: Email is not already registered

Test Data:  
• Name, Email, Password, Confirm Password, Role

Steps – Following steps will take place in test:

* Case 1:  
  • User fills signup form with valid data.  
  • Selects role (User/Mentor/Admin).  
  • Clicks on signup button.  
  • System validates and creates account, redirects to login page.
* Case 2:  
  • User provides invalid, incomplete or duplicate data.  
  • System shows appropriate error messages for empty fields, mismatched passwords or existing email.

Status: Pass ✅

## 4.3 Role-Based Login Redirection

Table 4.3: Role-Based Login Redirection Test Case

Role-Based Login Redirection Test Case

Test Engineer: Asma

Test Case ID: TC-3

Date: March 15th, 2024

Purpose: Ensure redirection based on assigned role after login.

Pre-Req: Valid login credentials and assigned role

Test Data:  
• Email, Password, Role

Steps – Following steps will take place in test:

* Case 1:  
  • User logs in with role 'User'.  
  • System redirects to User Dashboard.
* Case 2:  
  • Mentor logs in with role 'Mentor'.  
  • System redirects to Mentor Dashboard.
* Case 3:  
  • Admin logs in with role 'Admin'.  
  • System redirects to Admin Dashboard.
* Case 4:  
  • User logs in with no or invalid role.  
  • System shows 'Unauthorized role' or access denied.

Status: Pass ✅

## 4.4 Add Student

Table 4.4: Add Student Test Case

Add Student Test Case

Test Engineer: Asma

Test Case ID: TC-4

Date: March 16th, 2024

Purpose: To verify that the Admin can add a new student to the system.

Pre-Req: Admin must be logged in

Test Data:  
• Name, Email, Department, Password

Steps – Following steps will take place in test:

* Case 1:  
  • Admin navigates to Add Student section.  
  • Enters valid data.  
  • Clicks on Add button.  
  • System saves and confirms.
* Case 2:  
  • Admin enters incomplete or invalid data.  
  • System shows validation error messages.

Status: Pass ✅

## 4.5 View Student Profiles

Table 4.5: View Student Profiles Test Case

View Student Profiles Test Case

Test Engineer: Asma

Test Case ID: TC-5

Date: March 16th, 2024

Purpose: To verify that Admin can view student profiles.

Pre-Req: Admin is logged in and students are available

Test Data:  
• None (data is fetched from database)

Steps – Following steps will take place in test:

* Case 1:  
  • Admin navigates to View Students.  
  • System displays student profiles.
* Case 2:  
  • No students exist in the database.  
  • System shows: 'No student records found'.

Status: Pass ✅

## 4.6 Update Student Information

Table 4.6: Update Student Information Test Case

Update Student Information Test Case

Test Engineer: Asma

Test Case ID: TC-6

Date: March 16th, 2024

Purpose: To verify Admin can update student details.

Pre-Req: Student must exist in the system

Test Data:  
• Updated Name, Department, Email

Steps – Following steps will take place in test:

* Case 1:  
  • Admin opens student profile.  
  • Modifies data.  
  • Clicks Update.  
  • System saves and confirms.
* Case 2:  
  • Admin provides invalid or empty input.  
  • System shows appropriate validation messages.

Status: Pass ✅