

Chapter 5: TESTING

5.1 Test Plan

INTRODUCTION

The Test Plan is designed to prescribe the scope, approach, resources, and schedule of all testing activities of the project Client and Case Management App.

The plan identify the items to be tested, the features to be tested, the types of testing to be performed, the personnel responsible for testing, the resources and schedule required to complete testing, and the risks associated with the plan.

1. TEST STRATEGY

1.1 Scope of Testing

1.1.1 Feature need to be tested

These features are to be tested because they are included in the software requirement specs

- User Interfaces
- Hardware Interfaces
- Software Interfaces
- Database logical
- Communications Interfaces

1.2 Test Type

In the project Fashion Style, there're 3 types of testing should be conducted.

- **Integration** Testing (Individual software modules are combined and tested as a group)
- **System** Testing: Conducted on a complete, integrated system to evaluate the system compliance with its specified requirements
- **API testing:** Test all the APIs create for the software under tested

1.3 Test Logistics

1.3.1 Who will test?

The project should use **outsourcing** members as the tester to save the project cost

1.3.2 When will test occur?

The tester will start the test execution when all the following inputs are ready

- Software is available for testing
- Test Specification is created
- Test Environment is built

2. TEST OBJECTIVE

The test objectives are to verify the Functionality of Application Attendance Management System, the project should focus on testing the operation such as Login, entering PRN, Roll number, and details of student. to guarantee all these operation can work normally in real environment.

3. TEST CRITERIA

3.1 Suspension Criteria

If the team members report that there are 40% of test cases failed, suspend testing the development team fixes all the failed cases.

3.2 Exit Criteria

Specifies the criteria that denote a successful completion of a test phase

Runrate is mandatory to be 100% unless a clear reason is given.

Passrate is 80%, achieving the pass rate is mandatory.

4. RESOURCE PLANNING

No.	Member	Tasks
1.	Test Manager	Manage the whole project Define project directions Acquire appropriate resources
2.	Test	Identifying and describing appropriate test techniques/tools/automation architecture Verify and assess the Test Approach Execute the tests, Log results, Report the defects. Outsourced members
3.	Developer in Test	Implement the test cases, test program, test suite etc.
4.	Test Administrator	Builds up and ensures test environment and assets are managed and maintained Support Tester to use the test environment for test execution
5.	SQA members	Take in charge of quality assurance Check to confirm whether the testing process is meeting specified requirements

Table 5.1.1: planning of resources.

6. SCHEDULE & ESTIMATION

6.1 All project task and estimation

Task	Members	Estimate effort
Create the test Specification	Test Designer	170 man-hour
Perform Test Execution	Tester, Administrator	80 man-hour
Test Report	Tester	10 man-hour
Test Delivery		20 man-hour
Total		280 man-hour

Table 5.1.2: project tasks

6.2 Schedule to complete these tasks

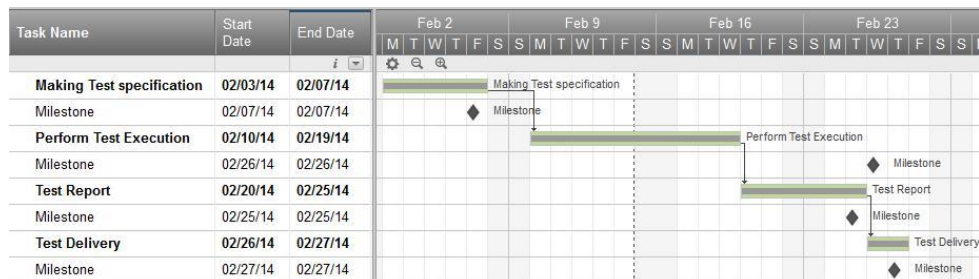


Table 5.1.3: project tasks

7. TEST DELIVERABLES

Test deliverables are provided as below

7.1 Before testing phase

- Test plans document.
- Test cases documents
- Test Design specifications.

7.2 During the testing

- Test Tool
- Simulators.
- Test Data
- Test Trace-ability Matrix
- Error logs and execution logs.

7.3 After the testing cycles is over

- Test Results/reports
- Defect Report
- Installation/ Test procedures guidelines
- Release notes

5.2 Test Cases

Test Case ID	Test Scenario	Test Steps	Test Data	Expected Results	Actual Results	Pass/Fail
TU01	Check Admin Login with valid Data	1.Go to App 2.Enter UserId 3.Enter Password 4.Click Submit	Username=admin Password= 12345678	Admin should Login into application	As Expected	Pass
TU02	Check Admin Login with invalid Data	1.Go to App 2.Enter UserId 3.Enter Password 4.Click Submit	Username = admin Password = glass99	Admin should not Login into application	As Expected	Pass
TU03	Check Admin can view all the orders	1.Go to app 2.Login 3.home 4.Order details	Client list	Admin should view all orders	As Expected	Pass

TU04	Check client	1.Case details 2.Enter details 3.Place order	Client list	User can place the order	As Expected	Pass
TU05	Contact us	1.Click Contact us 2.Select option to contact	Gmail	User can contact admin	As Expected	Pass

Table 5.2.1: test cases for login page

Sr.no.	Test Case Id	Test Case Scenario	Test Data	Expected Results	Actual Results	Pass/Fail
1	TC001	Check PRN with Valid PRN	PRN=1111100000	User should be able to see the details	As expected	Pass
2	TC002	Check PRN with a character in a PRN	PRN=111110aaa	User should not be able to see the details	As expected	Pass
3	TC003	Don't enter PRN and click Search	PRN=_____	User should not be able to see the details	As expected	Pass

Table 5.2.2: register test cases.