

MAHARASHTRA STATE BOARD OF TECHNICAL EDUCATION, MUMBAI

GOVERNMENT POLYTECHNIC KARAD

THIRD YEAR DIPLOMA COMPUTER ENGINEERING (I-SCHEME)

PART [B]

MICRO-PROJECT REPORT

"Test Cases , Test Plan And Defect Report On Blood Bank Management System"

UNDER THE SUBJECT

SOFTWARE TESTING (22518)

SUBMITTED BY

| Sr.no | Roll No | Enrollment No | Name of Team Member |
|-------|---------|---------------|-------------------------|
| 1. | 2251 | 2100100053 | Pratik Pramod Shejwal |
| 2. | 2254 | 2100100056 | Shravani Bharat Mahajan |
| 3. | 2260 | 2100100063 | Riya Sunil Kharade |

UNDER THE GUIDANCE

Mrs. S.V. Jadhav

(DEPARTMENT OF COMPUTER ENGINEERING) 2023-24



MAHARASHTRA STATE BOARD OF TECHNICAL EDUCATION

Certificate of Completion

Of Microproject Assessment at the end of semester

This is to certify that,

| Sr.no | Roll No | Roll No Enrollment No Name of | |
|-------|---------|-------------------------------|-------------------------|
| 1. | 2251 | 2100100053 | Pratik Pramod Shejwal |
| 2. | 2254 | 2100100056 | Shravani Bharat Mahajan |
| 3. | 2260 | 2100100063 | Riya Sunil Kharade |

Has successfully completed project for designing the test cases, test plan and defect report on Blood Bank management system of Software Testing (22518) in Fifth Semester of Diploma in Computer Engineering from Government Polytechnic Karad Institute with Institute code (0010).

Prof. S. V. Jadhav

Prof. S. B. Patil

Dr. R. K. Patil

Subject Teacher

Head of Department

Head of Institute

Seal of Institute

ACKNOWLEDGMENT

We take this opportunity to thank all those who have directly and indirectly inspired, directed and assisted us towards successfully completion of this project report.

We express our sincere thanks to Dr. R. K. Patil Principal of Government Polytechnic, Karad and the Head of Department Prof. Patil S.B, for having us allowed to submit this report as a part of our academic learning.

We express our sincere thanks to Prof. S. V. Jadhav Lecturer in Computer Engineering, Govt. Polytechnic, Karad for encouragement throughout the project report and guideline in designing and working out this project. We are also grateful to team of project.

Place: Government Polytechnic, Karad.

Date:

Your sincerely,

2251-Pratik Pramod Shejwal2254-Shravani Bharat Mahajan2260-Riya Sunil Kharade

MICROPROJECT REPORT

"Test Plan, Test Case and Defect Report On Blood Bank Management System"

O RATIONALE:

A blood bank management system makes it easier to handle blood donations and give the right blood to the right people. It also helps follow rules, keeps data safe, and prevents mistakes, ultimately making the process safer and more efficient.

Testing a blood management system with software checks that it works correctly and safely. It helps prevent mistakes in matching blood to patients and keeps their information accurate. It also makes sure the system follows the rules and keeps patient data safe from hackers. Testing makes things run smoothly, saves money, and keeps the system trustworthy for everyone who needs it.

In today's world it is very important to provide a defect free software to the client. So that's why testing become so much important. Testing helps developer to remove errors and fulfil the all-user requirements. We are going to design test cases for Blood Management System We will design different test Scenarios. While testing the software we will apply different testing types i.e., Blackbox, Unit, Integration etc.

O AIM AND BENEFITS:

- 1) To Analyze working of Blood Bank Management System.
- 2) To ensure if all features within software are working as expected.
- 3) Preparing test cases for validating Blood bank management application.
- 4) Validating whether system is satisfying customer requirements.
- 5) Prepare a test plan for given application.
- 6) Identifies and fixes issues during testing, which is more cost-effective than addressing them after implementation.

• COURSE OUTCOMES:

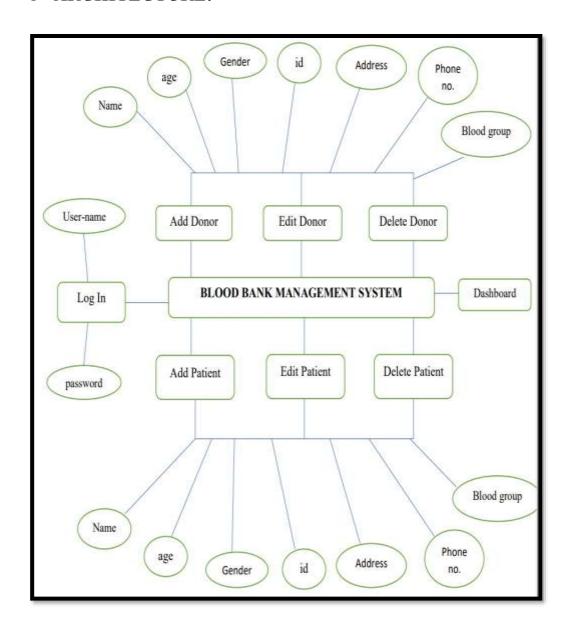
- CO A] Apply various software testing methods.
- CO B] Prepare test cases for different types and levels of testing.
- CO C] Prepare test plan for an application.
- CO D] Identify bugs to create defect report of given application.

O LITERATURE REVIEW:

The project name is Blood Bank Management System. We have collected information about our project by taking reference from books and various websites. Our project is GUI-based that's why first we have created interface of the project as per teacher's instructions. Then we developed application and then perform the testing on various module.

- 1) https://www.browserstack.com/guide/test-plan-vs-test-case
- 2) https://www.geeksforgeeks.org/defect-report-in-software-engineering/amp/

• ARCHITECTURE:



O ACTION PLAN:

| Sr. No | Details Of Activity | Planned Start Date | Planned Finish Date | Name of responsible team member |
|-----------|------------------------------------|-----------------------|------------------------|---------------------------------|
| 1 | Discussion & finalization of topic | 26/07/2023 | 02/08/2023 | All Members |
| 2 | Preparation of abstract | 04/08/2023 | 18/08/2023 | All Members |
| 3 | Literature Review | 20/08/2023 | 23/08/2023 | All Members |
| 4 | Collection of data | 26/08/2023 | 14/09/2023 | All Members |
| 5 | Discussion & online content | 18/09/2023 | 23/09/2023 | All Members |
| 6 | Editing & proof reading of content | 26/09/2023 | 07/10/2023 | All Members |
| 7 | Compilation of report | 09/10/2023 | 15/10/2023 | All Members |
| 8 | Preparation of project | 19/10/2023 | 25/10/2023 | All Members |

• RESOURCES REQUIRED:

| Sr.no | Name of Resources | Specification | Quantity |
|-------|--|---|----------|
| 1. | Computer system | Computer system Laptop i5 Processor 11 th Generation | |
| 2. | Ms Word Microsoft Word 2021 MSO 64 bit | | - |
| 3. | Internet | 4G, Wi-Fi | - |
| 4. | Book | Software Testing By-Yogesh Singh | 1 |
| 5. | Software | Visual Studio 2022 | 1 |

"Test Plan On Blood Bank Management System"

1. Test Plan Identifier: TP_1

2. Introduction:

The purpose of this document is to create an application test plan for Blood Bank Management System. The purpose of testing this project is to check the correct operation of its functionality, ease of use.

3. Test Items:

Working with Blood Bank Management System. Verify functionality of all forms in this project as follows:-

- 1. Login page (Verify Login process)
- 2. Functionality of options like add, edit, delete options
- 3. Donor and Patient page

4. Scope:

4.1 Features to be tested:-

- 1. User Interface
- 2. Data storing functionality (Database Logic)
- 3. Functionality of options like add, edit, delete options

4.2 Features not to be tested: -

- 1. Hardware Requirements
- 2. Privacy and Security

4.3 Quality Objective:

The test objectives are to verify the Functionality of Blood Management system, the project should focus on testing the all operation such as add, edit, delete etc. on Donor and Patient page of a system.

5. Test Methodology:

5.1 Item Pass/Fail Criteria: -

All test cases with high priority are closed with the result - pass. The test coverage is checked and sufficient, where the criterion of sufficiency is not less than 99% of the coverage of requirements by tests. The test report was compiled and approved by the team lead and customer.

5.2 Suspension Criteria and Resumption Requirements: -

- If defect frequency is more than threshold then testing will be suspended.
- When identify defects are fixed product is recess by development team and submitted for retesting then testing will resume.
- If the team members report that there are 40% of test cases failed, suspend testing until the development team fixes all the failed cases.

5.3 Project task and estimation and schedule:-

| Task | Members | Estimate Effort |
|----------------------------|----------------------------|-----------------|
| Create test specifications | Test Designer | 3 man/hour |
| Perform Test execution | Tester, test administrator | 2 man/hour |
| Test Report | Tester | 4 man/hour |

6. Test Deliverables:

- 1. Test cases and Test data
- 2. Test plan
- 3. Test documentation
- 4. Test summary report
- 5. Test scenario

7. Test Tasks:

- 1. Writing a test plan
- 2. Writing test cases
- 3. Development of criteria for the success of testing
- 4. Conducting the testing and evaluation of the results
- 5. Creating test reports

8. Environmental Needs:

- 1.Computer System
- 2. Windows OS
- 3. Microsoft word

9. Staffing and Training Needs:

To perform the tasks, you need to have the following knowledge and skills:

- 1. Knowledge and practical application of the Visual Studio 2022.
- 2. Knowledge and ability to apply in practice the basic techniques of test design.
- 3. Knowledge of various types of testing including functional and non-functional.

10. Schedule:

The deadline for completion of all works and delivery of the project is 08/11/2023 by 5.00pm

11. Risks and Contingencies Possible risks during testing:

- 1. Insufficient human resources for testing the application in deadlines.
- 2. Changing the requirements for the product

12. Approvals:

- 1. Team Lead
- 2. Test engineer 1
- 3. Test engineer 2
- 4. Test engineer 3

"Test Case On Blood Bank Management System"

• Test Case-

A test case is a systematic document that define a specific scenario to evaluate the functionality of a software application. It includes detailed instructions for executing the test, the expected outcomes, and any necessary preconditions. These documents are essential for ensuring the reliability and robustness of software by systematically verifying its various features and functions. Effective test cases help improve the overall software quality and enhance the user experience.

A test case is a defined format for software testing required to check if a particular application/software is working or not.

· Parameters for Test Cases-

- 1. **Test ID**: A unique identifier for the test case, which helps in tracking and managing tests efficiently.
- 2. **Test Description**: A brief description of the test case's purpose and what functionality it aims to test.
- 3. **Precondition**: It is a set of conditions that must be met before a test case can be executed, ensuring accurate and reliable testing.
- 4. **Test Data**: The data or input values required for the test, such as user inputs, configurations, or any specific conditions.
- 5. **Test Steps**: A sequence of steps or actions to be followed during the test execution, providing a clear procedure for testers to follow.
- 6. **Expected Result**: The output which should be expected at the end of the test.
- 7. **Actual Result**: The actual outcome observed during test execution.
- 8. **Status**: A marker that indicates the current state of the test case, typically including pass, fail, or in progress, to track its execution progress and results.

Login Module

| Project Name | Blood Bank Management System |
|----------------------|------------------------------|
| Module Name | Login Module |
| Created By | Pratik, Riya, Shravani |
| Created Date | 18/09/2023 |
| Executed By | Pratik, Riya, Shravani |
| Executed Date | 20/09/2023 |

| Test Case ID | Test Scenario | Precondition | Test Data | Steps to be executed | Expected Result | Actual Result | Pass/Fai l |
|--------------------|---|---|-----------------------------------|--|---|--|---------------|
| TC_1 | Validate functionality of Login Page. | Login page should open | Username = psr Password = psr2023 | 1.Enter valid username 2.Enter invalid password. 3.Click on login button | 'Login Invalid' message should be display. | 'Wrong Username and Password' message is displayed. | Pass |
| TC_2 | Verify that the interface should loaded | Interface should loaded successfully | Execute the application | Click on start button. | Interface should be loaded successfully and progress bar display | Interface loaded successfully. | Pass |
| TC_3 | Validate functionality of Login Page | Login page should open | Username = psr Password= Psr2023 | 1.Enter invalid username 2.Enter valid password. 3.Click on login button | 'Error Login Invalid' message should be display. | 'Wrong Username and Password' message is displayed. | Pass |
| TC_4 | Validate functionality of Login Page | Login page should open | Username = psr Password Psr2023 | 1.Enter invalid username 2.Enter invalid password. 3.Click on login button | 'Error Login Invalid' message should be display. | 'Wrong Username and Password' message is displayed. | Pass |
| TC_5 | Validate functionality of Login Page | Login page should open | Username = psr Password =psr2023 | 1.Enter valid username 2.Enter valid password. 3.Click on login button | 'Login Successful' message should be display and home page should open. | 'Login Successful' message is displayed and home page is opened. | Pass |

| | Login page should open | _ | textboxes empty | required' message should be display. | and | Pass |
|--------------|---------------------------|---|--------------------|--|-----------------------------------|------|
| | Login page should open | | login button | User should be directed to next page | | pass |
| T ~ 0 | Login page should open | | | Text Field | Text Field has been Cleared | Pass |

• Donor Module

| Project Name | Blood Bank Management System |
|----------------------|------------------------------|
| Module Name | Donor Module |
| Created By | Pratik, Riya, Shravani |
| Created Date | 21/09/2023 |
| Executed By | Pratik, Riya, Shravani |
| Executed Date | 23/09/2023 |

| TC_9 | Verify the home form interface | Login Successful | _ | I | 'Home form' should be loaded Successfu lly | Home form loaded Successful ly | Pass |
|-------|---|--------------------------|---|----------------------------|---|--|------|
| TC_10 | Validate functionality of Donor Option | Home page should open | - | 1.Click on Donor Option | User should be directed to Donor page | User has been directed to Donor page | Pass |

| TC_11 | Validate functionality of Add Button | Donor page should open | Enter Valid Details: 1.DName: Shreya 2.DAge:20 3.DGender:Female 4.DPhone: +919921270122 5.BloodGroup:O+ Address:karad | 1.Click On Add Button | Donor Save Successfu Ily | ' Donor Saved' Message Display | Pass |
|-------|---|---------------------------|--|------------------------------|--|---|------|
| TC_12 | Validate functionality Of Data Grid View | Donor page should open | 1)Select the appropriate 1 Details Row in Donor List Eg:Donarname: Shreya | 1. Click on Add button | Donor should be Added from Data Grid | Donor Added From Data Grid | Pass |
| TC_13 | Validate functionality of Delete Button | Donor page should open | 1)Select the appropriate 1 Details Row in Donor List Eg:Donarname: Shreya | 1.Click On Delete Button | Donor Deleted Successful ly | ' Donor Deleted' Message Display | Pass |
| TC_14 | Validate functionality Of Data Grid View | Donor page should open | 1)Select the appropriate 1 Details Row in Donor List Eg:Donarname: Shreya | 1. Click on Delete button | Donor should be Deleted from Data Grid | Donor Deleted From Data Grid | Pass |

| TC_15 | Validate functionality Table in database | Donor page should open | 1)Select the appropriate 1 Details Row in Donor List Eg:Donarname: Shreya | 1.Click On Delete Button | Donor Should be Delete Successfu Ily & Delete record in database table | Donor Saved Successful ly and Donor details add in database table | Pass |
|-------|--|----------------------------|---|--|--|--|------|
| TC_16 | Validate functionality of Edit Button | Donor page should open | 1)Select the appropriate Details Row in Donor List Eg: Donar name: Shreya | 1.ClickOn Edit Button | 'Donor Updated Successfu Ily message display | ' Donor Updated Successfu Ily' Message Display | Pass |
| TC_17 | Verify the functionality of the add button in Donar dashboard (by enterning existing user) | Donar exits in the system. | 1)Enter details of exits in the Donar 2) Click on add button | 1)DName :Shreya 2)Dage: :20 3)Dgen: Female 4)Dphone :+919921 270122 5)DGrou p: AB+ 6)DAdd:k arad | Data saved successfull y Added in donor already exits. | It should not give an error message of Donor already exits. | fail |
| TC_19 | Validate Phone Number TextField | Donor page should open | 1.Enter Other valid Field 2. Enter valid Phone +9199212 70122 | 1.Click on Add button | Donor should be save | Donor Save Message Display | Pass |

| TC_20 | Validate Phone Number Text Field | Donor page should open | 1.Enter Other valid Field 2. Enter valid Phone +9199212 72345 | 1.Click on Add button | Error message should display 'Number' Is invalid. | Error message display 'Number' Is invalid | Pass |
|-------|--|---------------------------|--|-----------------------------|--|---|------|
| TC_21 | Validate Username Text Field | Donor page should open | 1.Enter Other Fields (Valid) 2. Then Enter valid Username :Riya | 1.Click on Add button | Donor should be saved | Donor Save Message Display | Pass |
| TC_22 | Validate Username Text Field | Donor page should open | 1.Enter Other Fields (Valid) 2. Enter valid Username: Riya87671 | 1.Click on Add button | Error message should display 'username' Is invalid. | Error message display 'username' Is invalid | Pass |
| TC_23 | Validate Age Text Field | Donor page should open | 1.Enter Other Fields (Valid) 2. Enter valid Age: 19 | 1.Click on Add button | Donor should be saved | Donor Save Message Display | Pass |
| TC_24 | Validate Age TextField | Donor page should open | 1.Enter Other Field 2. Enter valid Age: 11 | 1.Click on Add button | Error message should display 'Age >= 18' Is invalid. | Error message display 'Age Is invalid | Pass |
| TC_25 | Validate Age TextField | Donor page should open | 1.Enter Other Field 2. Enter valid Age: 70 | 1.Click on Add button | Error message should display 'Age < =65' Is invalid. | Error message display 'Age' Is invalid | Pass |

• Patient Module

| Project Name | Blood Bank Management System | | |
|----------------------|------------------------------|--|--|
| Module Name | Patient Module | | |
| Created By | Pratik, Riya, Shravani | | |
| Created Date | 23/09/2023 | | |
| Executed By | Pratik, Riya, Shravani | | |
| Executed Date | 25/09/2023 | | |

| Test Case ID | Test Scenario | Precondi tion | Test Data | Steps to be executed | Expected Result | Actual Result | Pass/ Fail |
|--------------------|---|--------------------------------|---|---------------------------------|---|---|---------------|
| TC_26 | Validate functionality of Patient Option | Home page should open | - | 1.Click on Patient Option | User should be directed to Patient page | User has been directed to Patient page | Pass |
| TC_27 | Validate functionality of Add Button | Patient page should open | Enter Valid Details: 1.PName:Shreya 2.PAge:20 3.PGender:Female 4.PPhone: +919921270122 5.PBlood Group:AB+ Address:karad | 1.Click On Add Button | Patient Save Successfu Ily | ' Patient Save' Message Display | Pass |
| TC_28 | Validate functionality of Add Button | Patient page should open | 1. All Field are empty | 1.Click On Add Button | Error message should be display | Error message display 'Please Fill the details and check name and phone number' | |

| TC_29 | Validate functionality database | Patient page should open | Enter Valid Details: 1.PName: Shreya 2.PAge:20 3. PGender: Female 4.PPhone: +919921270122 5. Blood Group: AB+ 6. Address: Karad | 1.Click On Add Button | Patient Should be Save Successfu lly in database Table. | Patient Save Successfully in database Table. | Pass |
|-------|--|--|---|--------------------------------|---|--|------|
| TC_30 | Validate functionality of Delete Button | Patient page should open | 1)Select the appropriate 1 Details Row in Donor List Eg:Donar name:Shreya | 1.Click on Delete button | Patient should be Deleted. | 'Patient Successfully Deleted' Message Display | Pass |
| TC_31 | Validate functionality of Edit Button | Patient page should open | 1 Details Row in Donor List Eg:Donar name:Shreya | 1.Click on Edit button | Patient should be Update Successf ully. | 'Patient Successfully Updated' Message Display | Pass |
| TC_32 | | Patient page should open | 1.Enter Other valid Details Field 2. Enter valid Phone +919921270122 | 1.Click on Add button | Patient should be save | Patient Save Message Display | Pass |
| TC_33 | Validate Phone No TextField | Patient page should open | 1.Enter valid details Other Field 2. Enter invalid Phone Number Format 9921270120 | 1.Click on Add button | Error display" Should be Enter valid phone No' | Error message Display"Enter valid phone No" | Pass |
| TC_34 | Verify Mobile Number by Entering Special Symbol | Patient Details Form Loaded Successfully | 1) Enter Invalid Phone Number-123#\$\$ | 1.Click on Add button | Phone Number Should not be Accepted | Mobile Number not Accepted | Pass |

| | Validate Age | Donor | 1.Enter Other | 1.Click on Add | Error | Error message | Pass |
|-------|--------------|-------------|----------------|----------------|--------------|----------------|------|
| | TextField | page should | Field | button | message | display 'age ' | |
| | | open | 2. Enter valid | | | Is invalid | |
| TC 41 | | | Age: -5 | | display | | |
| 10_41 | | | | | 'Age > 0 ' | | |
| | | | | | Is invalid. | | |
| | | | | | | | |
| | | | | | | | |
| | Validate Age | | 1.Enter Other | 1.Click on Add | Patient | Patient Save | Pass |
| | TextField | page should | Field | button | should be | Message | |
| | | open | 2. Enter valid | | save | Display | |
| TC 42 | | | Age: | | | | |
| 16_12 | | | 50 | | | | |
| | | | | | | | |
| | | | | | | | |
| | | | | | | | |

• Donate Module

| Project Name | Blood Bank Management System | | |
|----------------------|------------------------------|--|--|
| Module Name | Donate Module | | |
| Created By | Pratik, Riya, Shravani | | |
| Created Date | 25/09/2023 | | |
| Executed By | Pratik, Riya, Shravani | | |
| Executed Date | 29/09/2023 | | |

| | Validate | Home page | - | 1.Click on | User | User has | Pass |
|-------|-------------------------|-------------|----------|---------------|-------------|------------------|------|
| TC 43 | functionality of Donate | should open | | Donate Option | directed to | been directed to | |
| | Option | | | | Donate | Donate | |
| | | | | | page | page | |
| | Verify that | Donate page | 1.DName | 1.Observe the | DonorList | Donor List | Pass |
| | the Donor | should be | 2.DBGrou | donor List | Should be | Display | |
| TC 44 | List Display | open | p | | Display | Successfu- | |
| 10_44 | | | | | Successfu | lly | |
| | | | | | -11y | | |
| | | | | | | | |

| TC_45 | Validate functionality of Closing Window | page should open | - | 1)Click on Closing Button | Closing the Window Successfu lly | Window Closed Successful ly | Pass |
|-------|---|----------------------------------|---------------------------------------|---|--|--|------|
| TC_46 | Validate functionality of Donate Page | Donate Page Should be Open | Name: Shreya Blood Group: A+ | 1.Enter valid username 2.Enter valid Blood group. 3.Click on Donate button | Donated Message Should Displayed And blood count should update | 'Select donor' msg displayed and blood count is not updated | Fail |

"Defect Report On Blood Bank Management System"

• Description:

A defect report is a formal document that identifies and describes issues, errors found during the software testing process, including details about their impact, reproduction steps, and severity, to facilitate their resolution. It plays a important role in the quality assurance process by providing a clear record of problems.

• Attributes of defect Report:

- 1. **Defect ID:** A unique identifier for the defect.
- 2. **Defect Name:** A short, descriptive title or name for the defect.
- 3. **Project Name:** The name of the project or software product where the defect was identified.
- 4. **Module:** The specific module or component of the software where the defect was found.
- 5. Defect Type: This categorizes the defect based on its nature. Common defect types include "Bug," "Enhancement," "New Feature," "Documentation," etc.
- 6. **Severity:** The level of impact the defect has on the software. It usually follows a scale such as "Critical," "Major," "Minor," or "Cosmetic." Critical defects have the highest impact.
- 7. **Priority:** This indicates the urgency with which the defect should be addressed. Priorities are typically ranked as "High," "Medium," "Low," or similar terms.
- 8. **Summary:** A concise, one-line description of the defect, often a shorter version of the Defect Name. It's useful for quick reference.
- 9. **Description:** A detailed explanation of the defect, including what it is, how it impacts the software, and any relevant information for developers to understand and fix it.
- 10. **Steps to Reproduce:** A set of clear, step-by-step instructions on how to reproduce the defect. This is crucial for developers to verify the issue and resolve it.
- 11. **Expected Result**: What should happen if the software were working correctly. This helps in understanding the desired behavior.
- 12. **Actual Result**: What is happening when the defect occurs. This helps in understanding the current, incorrect behavior.
- 13. **Reported By**: The name or username of the person who identified and reported the defect. This helps in tracking who found the issue and may be useful for follow-up questions or clarifications.
- 14. **Reported On**: The date and time when the defect was reported. This is essential for creating a timeline of when the defect was discovered.
- 15. **Assigned To**: The name or username of the developer or team responsible for fixing the defect.
- 16. **Assigned On**: The date and time when the defect was assigned to a developer or team.
- 17. **Status**: The current state of the defect. Common statuses include "New," "In Progress," "Under Review," "Resolved," "Closed," etc.
- 18. **Fixed On**: The date and time when the defect was fixed by the developer
- 19. **Status**: The current state of the defect. Common statuses include "New," "In Progress," "Under Review," "Resolved," "Closed," etc.
- 20. Closed On: The date and time when the defect was officially closed

• Adding duplicate Patient and Donor Details

| Defect ID | D1 |
|-------------------|---|
| Defect Name | Duplicate data can be entered in database. |
| Project Name | Blood Bank Management System |
| Module | Patient and Donor Module |
| Defect Type | Functional Defect |
| Severity | High |
| Priority | High |
| Summary | Adding duplicate Patient and Donor Details results in redundant data being stored in the database, potentially leading to data inconsistency and operational inefficiencies. |
| Description | When duplicate Patient and Donor Details are input into the system, the application fails to recognize the duplicates and adds redundant data to the database. This results in the database containing multiple entries with the same information. making it more challenging to manage patient and donor records efficiently |
| Step to reproduce | 1)Enter valid name and password 2)Click on login button 3)directed to Donor and Patient page |
| Expected Result | Ensure that the database only accepts unique Patient and Donor Details and prevents duplicate entries. |
| Actual Result | When duplicate Patient and Donor Details are added, the data is duplicated in the database |
| Reported by | Shravani , Riya |
| Reported on | 15-10-2023 |
| Assigned to | Pratik |
| Assigned on | 18-10-2023 |
| Status | Open |
| Fixed on | - |
| Closed on | - |

• Adding duplicate Patient and Donor Details

| Defect ID | D2 |
|-------------------|--|
| Defect Name | Donate Functionality not working |
| Project Name | Blood Bank Management System |
| Module | Donate Module |
| Defect Type | Functional Defect |
| Severity | High |
| Priority | High |
| Summary | Blood Stock is not updating, and Donate function is not working. |
| Description | The blood stock not updating issue may be caused by a failure in the donation process. When entering a patient's name and blood group, the system prompts to "select donor" even when a donor is already chosen. Additionally, the "donate" function is not functioning as expected, preventing blood donation records from being updated in the system. |
| Step to reproduce | 1)Select Donor 2)Enter Patient name and bloodgroup 3)Click on donate button. |
| Expected Result | Blood Stock Should Update, and Blood Should donated to Patient. |
| Actual Result | Bloodstock is not updated and blood is not donated to patient. |
| Reported by | Shravani , Riya |
| Reported on | 15-10-2023 |
| Assigned to | Pratik |
| Assigned on | 18-10-2023 |
| Status | Open |
| Fixed on | - |
| Closed on | - |

Different Types of testing we have considered in project :

1)Black-box Testing:

Black box testing is a software testing method where the internal structure, design, or implementation of the system being tested is not known to the tester. It focuses on evaluating the system's functionality and behavior based on its inputs and expected outputs.

2)Integration Testing:

Integration testing is a software testing method where individual components or modules of a system are tested together to ensure they work seamlessly when integrated. It aims to uncover interface and interaction issues between these components.

3) System Testing:

System testing is a software testing phase where the entire integrated system is tested to ensure it meets the specified requirements and functions as expected in a real-world environment. It evaluates the system's performance, functionality, and reliability as a whole.

4)GUI Testing:

GUI (Graphical User Interface) testing is a software testing technique that focuses on verifying the visual elements and interactions of a user interface to ensure it works as planned.

5) Positive Testing:

It is a type of testing which is performed on a software application by providing the valid data sets as an input.

6) Negative Testing:

It is a type of testing which is performed on a software application by providing the invalid data sets as an input.

O SKILLS DEVELOPED

After Implementing this micro-project we have learnt:

- 1. Developing the Test Cases for Blood Bank Management System.
- 2. Importance of Software Testing for developing a defect free software.
- 3. Study and apply different testing type while performing actual testing
- 4. Efficient communication skills.
- 5. Working as a team.
- 6.Developing leadership qualities.

O APPLICATION OF MICROPROJECT

- 1. This project can be used as example to develop different test scenarios while testing any other software.
- 2. This project can be used to identify which testing types can be considered to test any other software.
- 3.In a microproject for a Blood Bank Management System application, create and execute test cases to ensure the accuracy of donor registration, blood collection and also develop a test plan, and defects Report.