



**FACULTY OF ENGINEERING  
DEPARTMENT OF COMPUTER ENGINEERING  
FINAL YEAR PROJECT REPORT  
FOR  
IMMEDIATE BLOOD GROUP IDENTIFIER SYSTEM**

**BY**

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*Final Year Project Report Submitted In Partial Fulfillment Of The Requirements For The  
Award Of A Bachelor Of Computer Engineering At Busitema University*



## **DECLARATION**

I **MAKUMBI SHAFIC** declare that this final year project report is original and has not been published or submitted before to any university or higher institution of learning.

Sign .....

Date .....

## **APPROVAL**

The final year project report under the title "***Immediate Blood Group Identifier System***" has been done under my guidance and is now ready for examination.

Signature .....

Date .....

**Mr. MATOVU DAVIS**

**Department Of Computer Engineering.**

## **DEDICATION**

I dedicate this project report to The Almighty God, sick people, doctors, Lecturers and my beloved parents and relatives.

## **ACKNOWLEDGEMENT**

I thank the people I worked with most especially my supervisor; Mr. Matovu, My lecturers; Mr. Arinaitwe Joshua, Professor Ssemwogere Twaibu, Mr. Alunyu Andrew, Madam Asingwire Barbara Twaibu, Dr Owomugisha Godliver and Mr. Lusiba Badru.

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Lastly, I thank students of Busitema University for their assistance during my research, implementation and testing periods.

May the Almighty God bless and reward you all for your tireless efforts.

## **ABSTRACT**

The ***Immediate Blood Group Identifier System Report*** is a final year project report of the system which is capable of identifying patients' blood group, health problems, current medications, linking to the blood banks, and as well alerts the relatives in case of emergencies like car accidents, miscarriages, cancer therapy, and so many others.

It contains six chapters that is to say; Introduction chapter, literature review chapter, methodology chapter, system design and Implementation chapter, system test and evaluation chapter and conclusion and recommendation chapter.

## TABLE OF CONTENTS

<b>DECLARATION .....</b>	<b>i</b>
<b>APPROVAL .....</b>	<b>ii</b>
<b>DEDICATION .....</b>	<b>iii</b>
<b>ACKNOWLEDGEMENT .....</b>	<b>iv</b>
<b>ABSTRACT .....</b>	<b>v</b>
<b>ABBREVIATIONS.....</b>	<b>x</b>
<b>CHAPTER ONE: INTRODUCTION.....</b>	<b>1</b>
1.0 Introduction .....	1
1.1 Background of the study .....	1
1.2 Statement of the problem .....	2
1.3 Objectives.....	2
1.3.1 General Objective.....	2
1.3.2 Specific objective .....	2
1.4 Justification .....	3
1.5 Significance.....	3
1.6 Project Scope.....	3
1.6.1 Technical scope .....	3
1.6.2 Time scope .....	3
1.7 Limitations .....	3
<b>CHAPTER TWO: LITERATURE REVIEW .....</b>	<b>4</b>
2.1 Introduction .....	4
2.2.0 Key terms .....	4
2.3 Review of Related Literature .....	7
2.3.1 Life Saving Application .....	7
2.3.2 Blood Donation Management System.....	7
2.3.3 Blood Bank Management System Project.....	7

2.3.4 The Optimization of Blood Donor Information and Management System.....	8
2.3.5 Volunteer Blood Donors .....	8
2.3.6 Life Saving Application .....	8
2.3.7 Online Blood Bank Management System using Android .....	9
2.3.8 Gap between the existing Systems and the Developed System .....	9
<b>CHAPTER THREE: METHODOLOGY .....</b>	<b>10</b>
3.0 Introduction .....	10
3.1 Data Collection.....	10
3.2 Data Analysis .....	10
3.3.0 System Design Research.....	11
3.3.1 Functional Requirements.....	11
3.3.2 User Requirements .....	11
3.3.3 Tools.....	11
<b>CHAPTER FOUR: SYSTEM DESIGN AND IMPLEMENTATION .....</b>	<b>13</b>
4.1 Introduction .....	13
4.2 System Design.....	13
4.2.1 Block diagram of the system .....	13
4.2.0 Process Design .....	14
4.2.1 Sequence Diagram.....	14
4.2.2 Use case Diagram.....	14
4.2.3 State Diagram .....	16
4.3.0 Database Design .....	16
4.3.1 Entity Relational Database .....	17
4.3.2 Object Class Diagram.....	17
4.4.0 Interface Design .....	17
1. Login Panel.....	18
2 Panel Connection.....	18

3 Panel Manage .....	19
4. Panel Review.....	19
4.5 Hardware design.....	20
<b>CHAPTER FIVE: SYSTEM TESTING AND EVALUATION.....</b>	<b>21</b>
5.0 Introduction .....	21
5.1 System Testing .....	21
5.1.1 Unit Testing .....	21
5.1.2 Integration Testing .....	21
5.1.3 System Verification.....	22
5.1.4 System Validation .....	23
5.1.5 Tested and Debugged codes .....	23
5.1.6 System Evaluation .....	26
5.1.6.1 Performance Evaluation .....	26
5.1.6.2 Cost Evaluation.....	26
<b>CHAPTER SIX: CHALLENGES, CONCLUSION AND RECOMMENDATION .....</b>	<b>27</b>
6.0 Introduction .....	27
6.1 Achievements .....	27
6.2 Challenges .....	27
6.3 Conclusions .....	27
6.4 Recommendations .....	27
<b>REFERENCES .....</b>	<b>28</b>
<b>APPENDICES.....</b>	<b>29</b>

## LIST OF FIGURES

<b>Figure 1: Blood group identification process .....</b>	<b>2</b>
<b>Figure 2: Liquid Crystal Display .....</b>	<b>6</b>
<b>Figure 3: Global System of Mobile Communication .....</b>	<b>6</b>
<b>Figure 4: The table of problems.....</b>	<b>11</b>
<b>Figure 5: Table Of Results .....</b>	<b>11</b>
<b>Figure 6: System Block Diagram.....</b>	<b>13</b>
<b>Figure 7: Sequence Diagram.....</b>	<b>14</b>
<b>Figure 8: Use Case Diagram .....</b>	<b>15</b>
<b>Figure 9: State Diagram .....</b>	<b>16</b>
<b>Figure 10: Entity Relation Model.....</b>	<b>17</b>
<b>Figure 11: Panel Login .....</b>	<b>18</b>
<b>Figure 12: Connection Panel.....</b>	<b>18</b>
<b>Figure 13: Panel Manage Data .....</b>	<b>19</b>
<b>Figure 14: Show data panel.....</b>	<b>19</b>
<b>Figure 15: Physical and schematic design.....</b>	<b>20</b>
<b>Figure 16: Tested modules .....</b>	<b>21</b>
<b>Figure 17: Hardware connection .....</b>	<b>22</b>
<b>Figure 18 : An Alert received by the guardian.....</b>	<b>22</b>
<b>Figure 19: Showing laboratory experiment during the research .....</b>	<b>29</b>
<b>Figure 20: Users during system testing .....</b>	<b>29</b>
<b>Figure 21: The panel of results from the system .....</b>	<b>30</b>
<b>Figure 22: A system linking to Nakasero Blood Bank “www.ubts.go.ug” .....</b>	<b>30</b>

## **ABBREVIATIONS**

- RBC** Red blood cell
- BPM** Blood pulse management system
- LCD** Liquid Crystal Display
- LED** Light Emitting Diode
- NTS** Negative Torque Sensing
- RPM** Revolutions Per Minute
- VSM** Virtual Simulation Module
- IDE** Integrated Development Environment
- MIS** Management Information System
- NRM** National Resistance Movement
- UBTS** Uganda Blood Transfusion Services
- WHO** World Health Organization.
- RAM** Random Access Memory
- XAMPP** Cross-Platform Apache MySQL PHP Perl
- FAA** Federal Aviation Administration