Savitribai Phule Pune University

A
Mini Project Report
On
"Pocket Money Miner"

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T.E.Computer

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2018 - 2019

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TRINITY COLLEGE OF ENGINEERING & RESEARCH
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CERTIFICATE

This is to certify that **Amit Kharat , Pramila Shinde, Amit Kale , Saanica Ghate** have carried out Preliminary Mini Project Work on **"Pocket Money Miner"** under my guidance in partial fulfillment for **Skill Development Laboratory** in Third Year Computer Engineering of during the academic year 2018-2019.

They have satisfactorily completed Preliminary Mini Project Work as prescribed by the **Savitribai Phule Pune University** for the Third Year Computer Engineering.

Place : Pune

Date :

Mr.R.S.Suryawanshi
[Mini Project Guide]

Prof.P.Kulkarni
[Head ofDepartment]

ACKNOWLEDGEMENT

We have taken efforts in this project. However, it would not have been possible without the kind support and help of many individuals and organizations. We would like to extend my sincere thanks to all of them.

We are highly indebted to (**Department Of Computer Engineering**) for their guidance and constant supervision as well as for providing necessary information regarding the project & also for their support in completing the project.

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We would like to express our special gratitude and thanks to industry persons for giving us such attention and time.
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Best Regards,

Amit Kharat <43>
Pramila Shinde<42>
Saanica Ghate <63>
Amit Kale <51>

Abstract

It is necessary to be updated with latest technology, due to trending environment. In day to day Earning money is become difficult. According to our survey we found that it was really easy to Earning the money in free time by watching the Google ads. According to these project the student or people need money for much reason so we develop this mobile application as the purpose of Earning money in free time.

So by understanding the need of people we decide to develop and application which is going to help people to Earn Money and save it for daily needs.

Note: Any comments inside double brackets such as these are not part of this Report but are comments upon this Report example to help the reader understand the point being made.
Refer to the Report Template for details on the purpose and rules for each section of this document. This work is based upon the submissions of the spring 2018 CS 310.

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Chapter-1

Introduction

In that we are developed these android mobile application according to some survey.
In that simple implementation of the Earning money concept in free time by watching the Google ads for our daily need like many reasons. As according to the new trending technology
The next chapter, the Overall Description section, of this document gives an overview of the functionality of the product. It describes the informal requirements and is used to establish a context for the technical requirements specification in the next chapter.
The third chapter, Requirements Specification section, of this document is written primarily for the developers and describes in technical terms the details of the functionality of the product.
Both sections of the document describe the same application product in its entirety, but are intended for different audiences and thus use different language.

Chapter-2

Project Plan, Schedule and Team Structure

Milestones

Table 2.1: Project Management

TASK	Conducted By	Assisted By	Remark By Guide
1) Preparation of abstract and other related documents.	**<Amit Kharat Pramila Shinde>**	**<Amit Kharat >**	
2) Collection of research papers related to topic.	**<Saanica Ghate Pramila Shinde>**	**<Saanica Ghate >**	
3) On field survey for requirement gathering.	**<Saanica Ghate Amit Kale>**	**<Saanica Ghate Pramila Shinde>**	
4) Preparation of critique on collected research papers.	**<Pramila Shinde Amit Kale>**	**<Pramila Shinde Amit Kale>**	
5) Technical research on different technologies and protocols.	**<Saanica Ghate Amit Kharat >**	**<Saanica Ghate Amit Kharat >**	
6) Block diagram for the required system.	**<Amit Kharat Amit Kale>**	**<Pramila Shinde>**	
7) UML diagram development.	**< Pramila Shinde>**	**<Amit Kale>**	

Table 2.2 Tasks –Sheet

TASK	START DATE	DUE DATE	PRIORITY
1) Pre-project discussion regarding modules to be developed and concepts to be implemented in planned process.	**12/07/2017**	**14/07/2017**	**High**
2) Detailed discussion on scope of the project and feasibility issues regarding project.	**16/07/2018**	**23/07/2018**	**Medium**
3) Submission of abstract and finalization of topic.	**24/07/2018**	**27/07/2018**	**High**
4) On field survey in TCOER, Pune for requirement gathering and to learn the earlier implemented technologies.	**16/08/2018**	**27/08/2018**	**Medium**
5) Collection of some more research papers and study of different technologies that can be implemented.	**2/09/2018**	**12/09/2018**	**Medium**
6) Preparation of critique on different research papers that are being referred.	**14/09/2018**	**18/09/2018**	**Low**
7) Technical research on different protocols and working of different technologies.	**21/09/2018**	**1/10/2018**	**High**
8) Block diagram and UML diagrams for the system to be developed.	**03/10/2018**	**07/10/2018**	**High**

Team Structure

Team: Size: 04

Amit Kharat < RNO . 43 >
Pramila Shinde <RNO . 42 >
Amit Kale < RNO . 51>
Saanica Ghate < RNO. 63 >

Chapter-3
Software Requirements Specification

3.1 Introduction

Following section describes the detailed software requirements specification.

3.1.1 Purpose:

To reduce the stress for daily basic needs in the form of money like mobile recharge, transportation (bus pass), train pass etc. So it will help people like student, senior citizens, and housewives.

3.1.2 Project Scope:

This application process will be an Online Process for a local person. This process will be designed to maximize the interest in app handling as it help people to reduce their stress where app paying money on the basis of ads visibility on one click.

More specifically, this process is designed to allow person to manage in the app. The application will facilitate e-communication between Paytm and mobile number. Through this project developers can get feedback from app user for improvements and future requests.

3.1.3 Product Features:

- Portable
- Android compatible
- User friendly
- One click

3.1.4 Operating environment

- Desktop- any compatible operating system
- Mobile- Android O.S(Min. API 19 (Ice-cream))

3.1.5 Design and Implementation constraints

The scenario under consideration must comprise of the following infrastructure:

- Real time Database
- Android compatible mobile device

3.1.6 Assumptions and Dependencies

- User device is compatible with Android platform and Internet/Wi-Fi enabled.
- User must be familiar with the Android operating system.
- Database should be updated regularly.
- Updating of the Real time database by the client users through an intermediate desktop application.

3.2 System Features

- Reliable - There is only one-to-one association between the Server and the mobile user
- User friendly
- Time saving

3.3 External Interface Requirements

3.3.1 User Interfaces

- GUI
  - Desktop- Comprising of AWT and Swing
  - Mobile- Comprising of widgets

3.3.2 Hardware Interfaces

- Internet Connectivity
- Wi-Fi connectivity

3.3.3 Software Interfaces

- Java/Blue Casting
- Android-Studio

3.3.4 Communication Interfaces

- Via E-Mail
- MySQL server

3.4 Non-Functional Requirements

3.4.1 Performance Requirements

- Multiple devices querying at a time

3.4.2 Safety Requirements

- Parallel Database Updation keeping in mind the database recovery aspect in case of database failure/corruption.
- Thus also eliminating the threat due to natural disasters.

3.4.3 Security Requirements

- No communication between two mobile devices other than server. This reduces the risk transfer of any infectious file/data from one device to another.

3.4.4 Software Quality Attributes

- Usability- The overall learning process of the application is simple, input given by the user is according to their need, and the output is also as per their requirement given, hence the overall experience of the application is good and it is usable.
- Readability- The application is developed taking into consideration the structure of general handsets, the form of representation is clear, consistency is maintained in programming style; all these factors make the application readable.
- Portability- The concept of serialization is used in this project which converts objects into byte code. This byte code is compatible with almost all hardware used.
- Correctness- The student's needs are specified and to fulfill it is the basic motto of the project which is done successfully here.
- Reliability- The application successfully fulfills the students' requested data and exact information of his/her is given. Hence it is reliable.
- Integrity - The Student Staff directly deals with the server and no unauthorized person is allowed to deal with central information, hence integrity of the system is maintained.
- Efficiency- The overall time, storage, and transmission is done with best possible utilization of the available resources, so system is efficient enough.

3.5 Other Requirements (If Applicable)

3.5.1 Database Requirements

- MySQL
- PHP

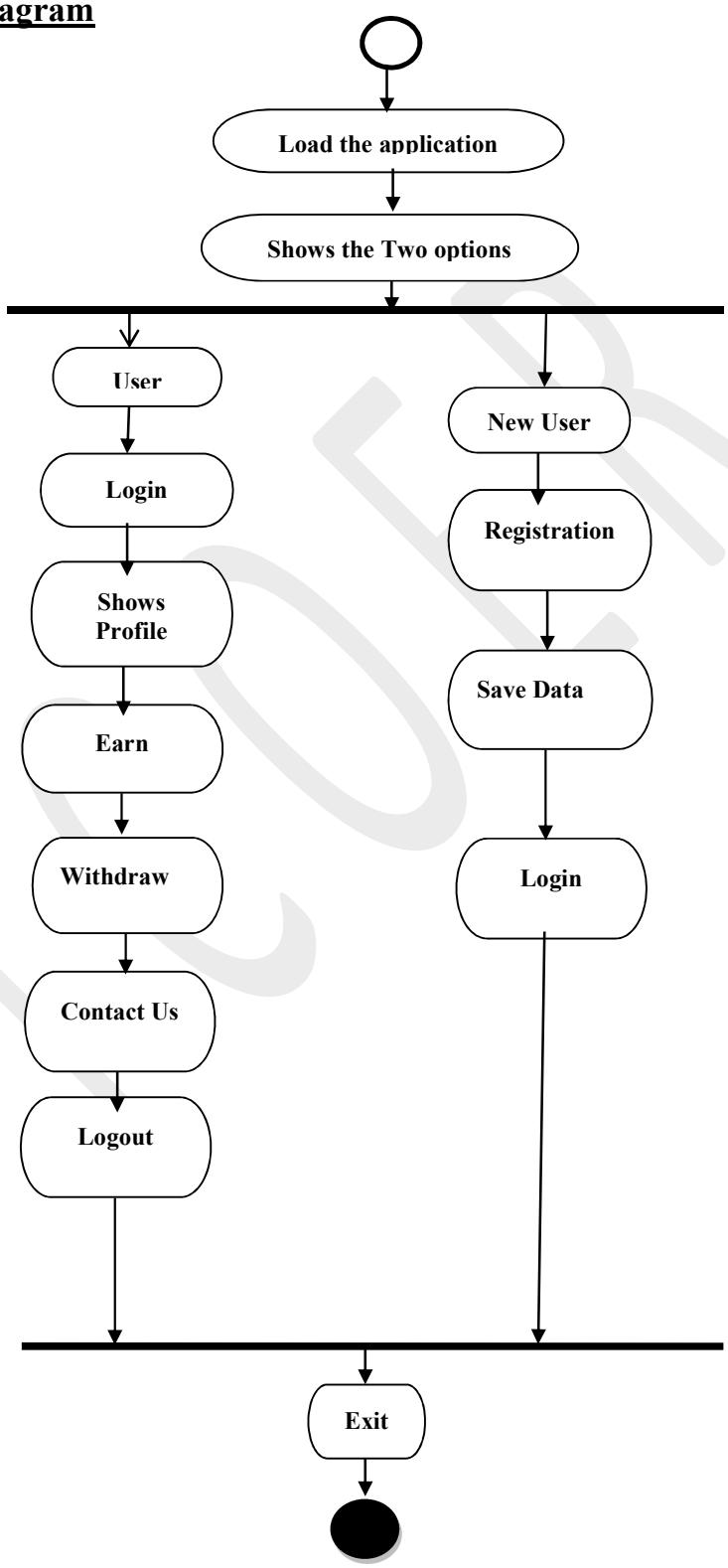
3.5.2 Legal Requirements

Not applicable (Open Source software's used

Chapter-4

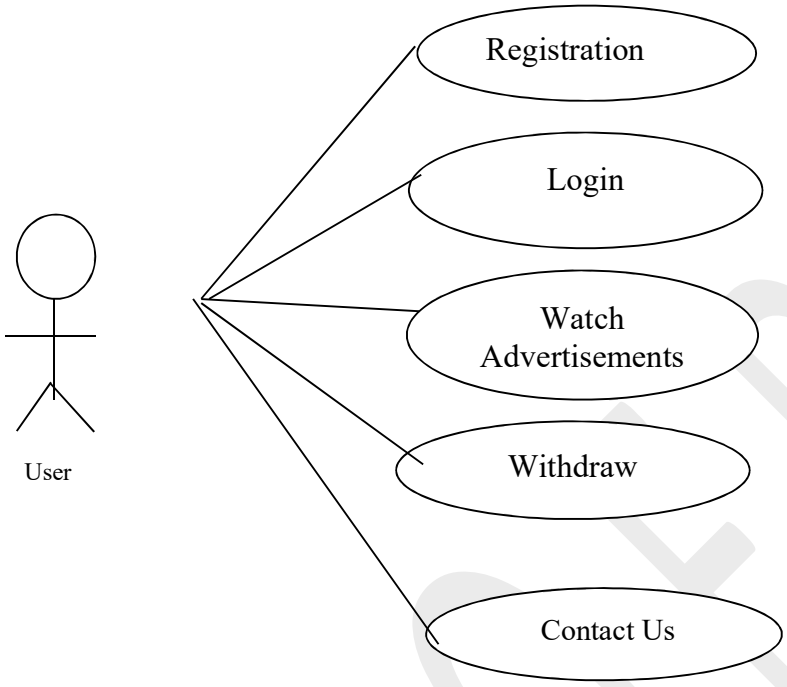
System Design Model

4.1. Activity diagram

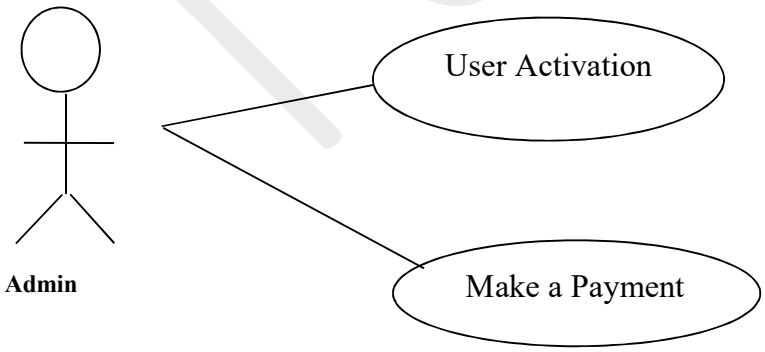


4.2 Use-Case diagram

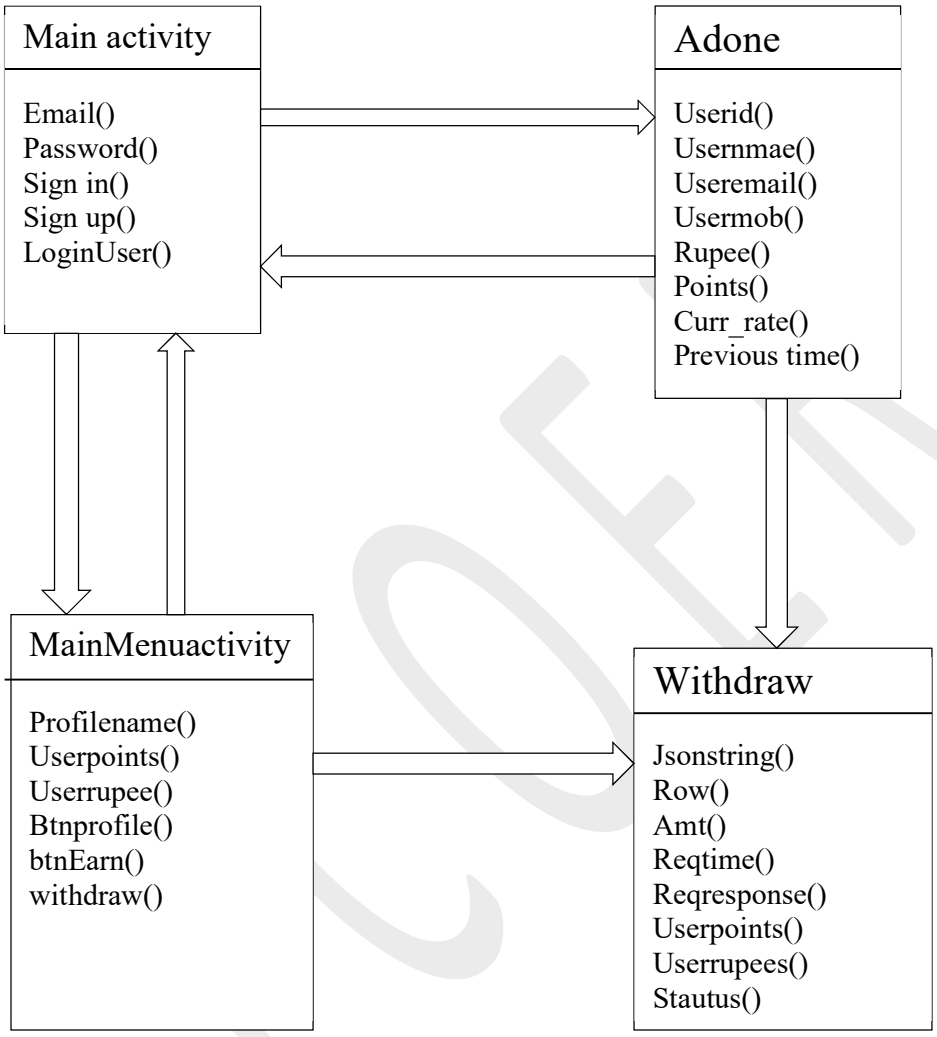
1. User Model:-



2. Admin Model:-

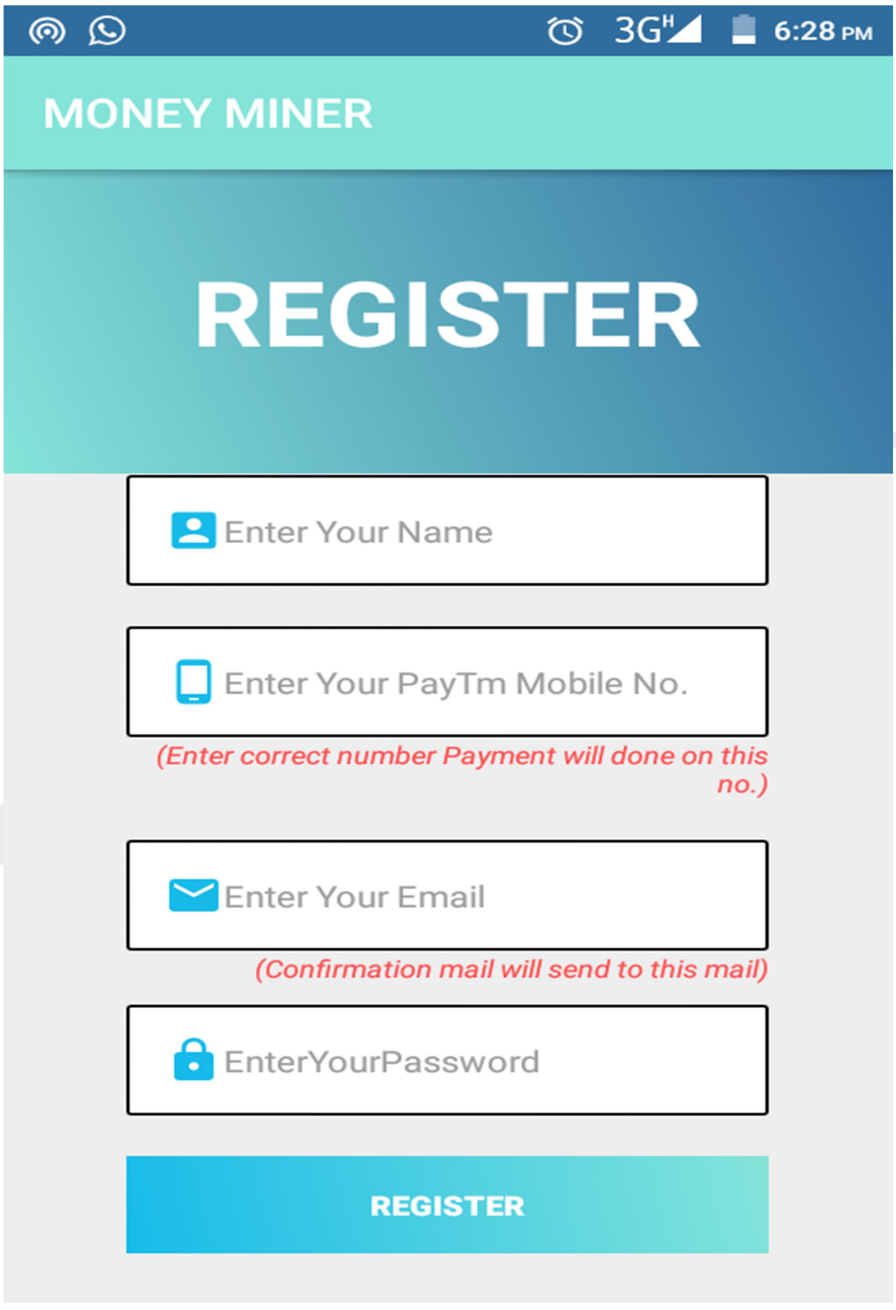


4.3 Class Diagram

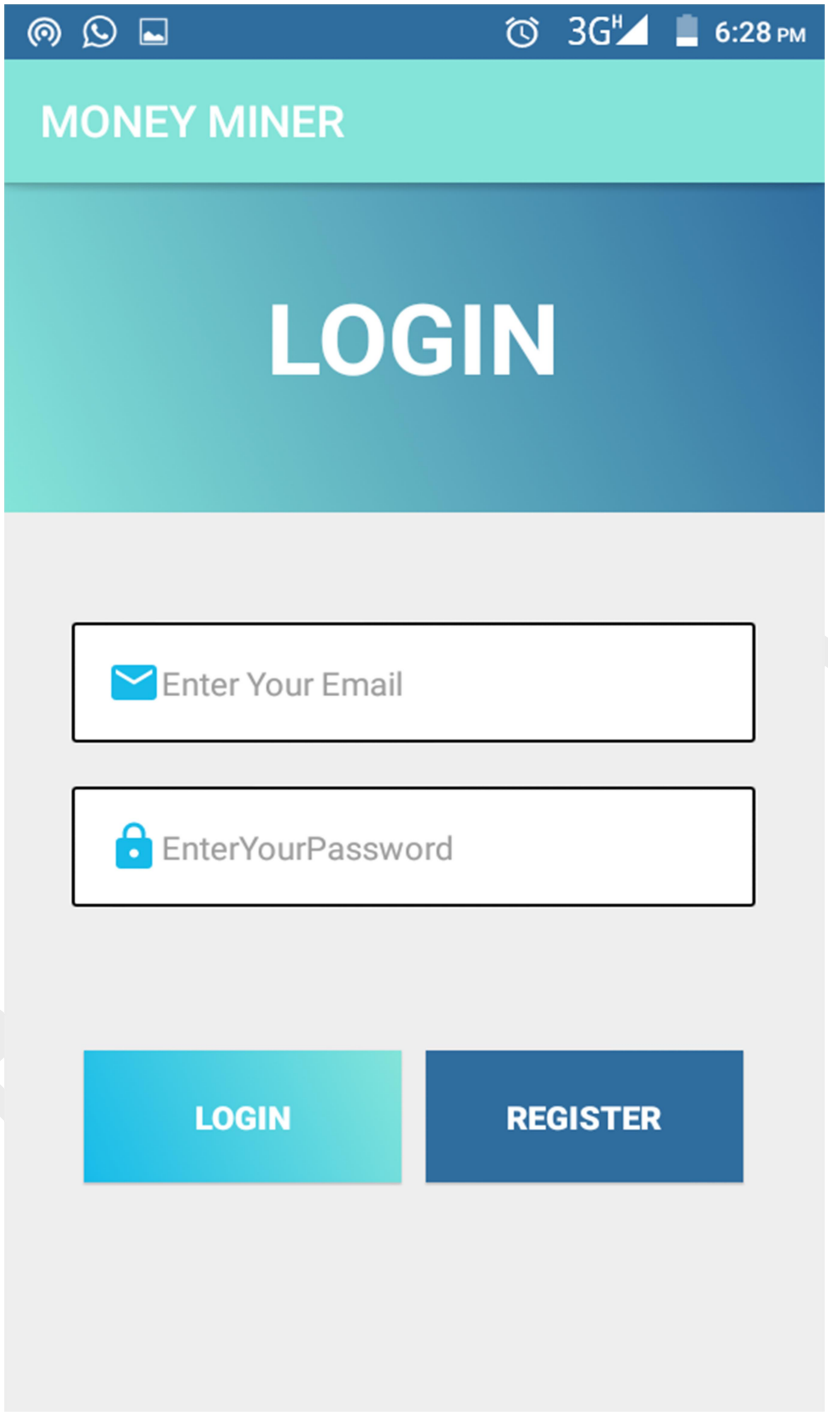


Chapter-5

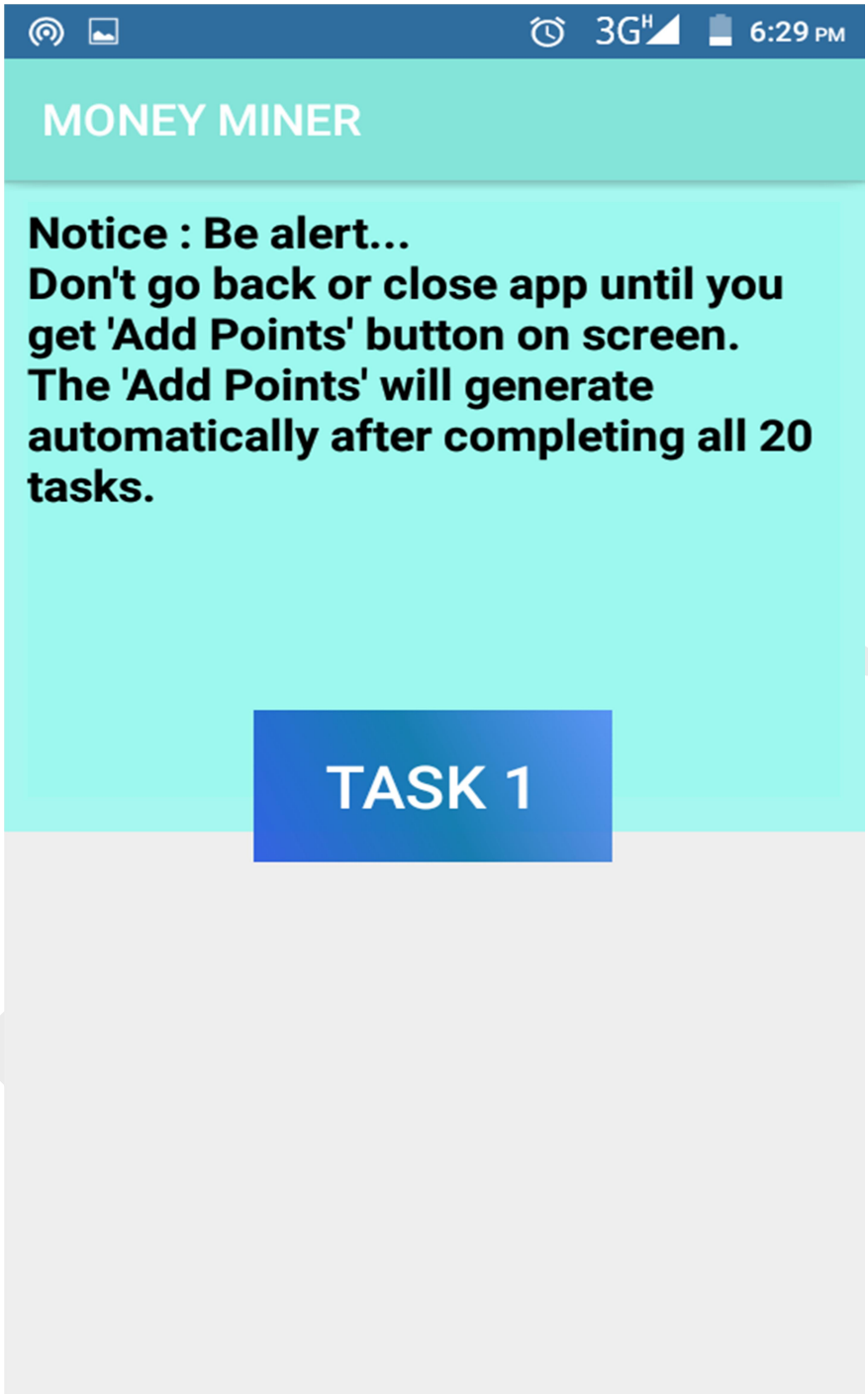
Screenshot



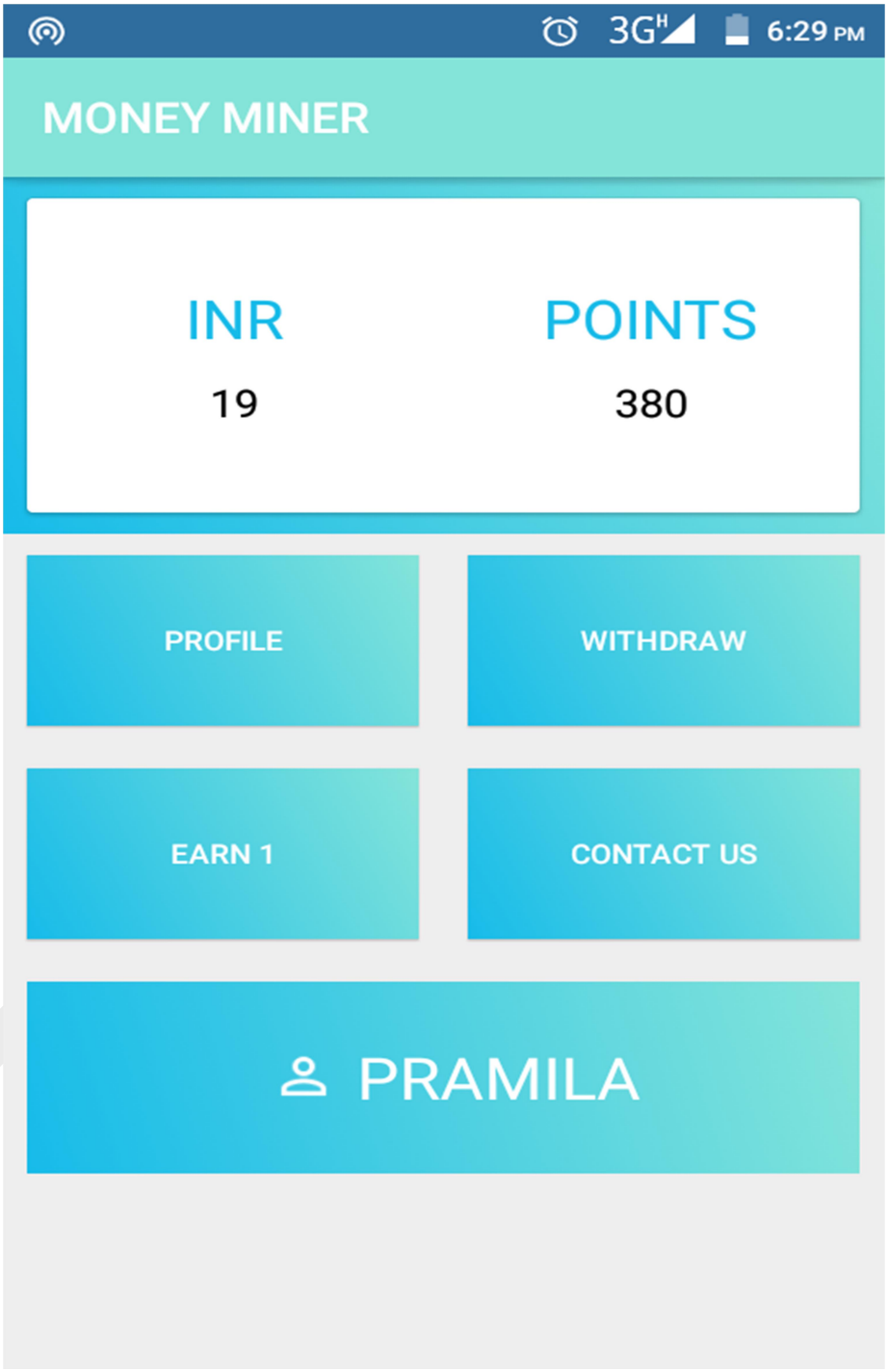
5.1. Registration



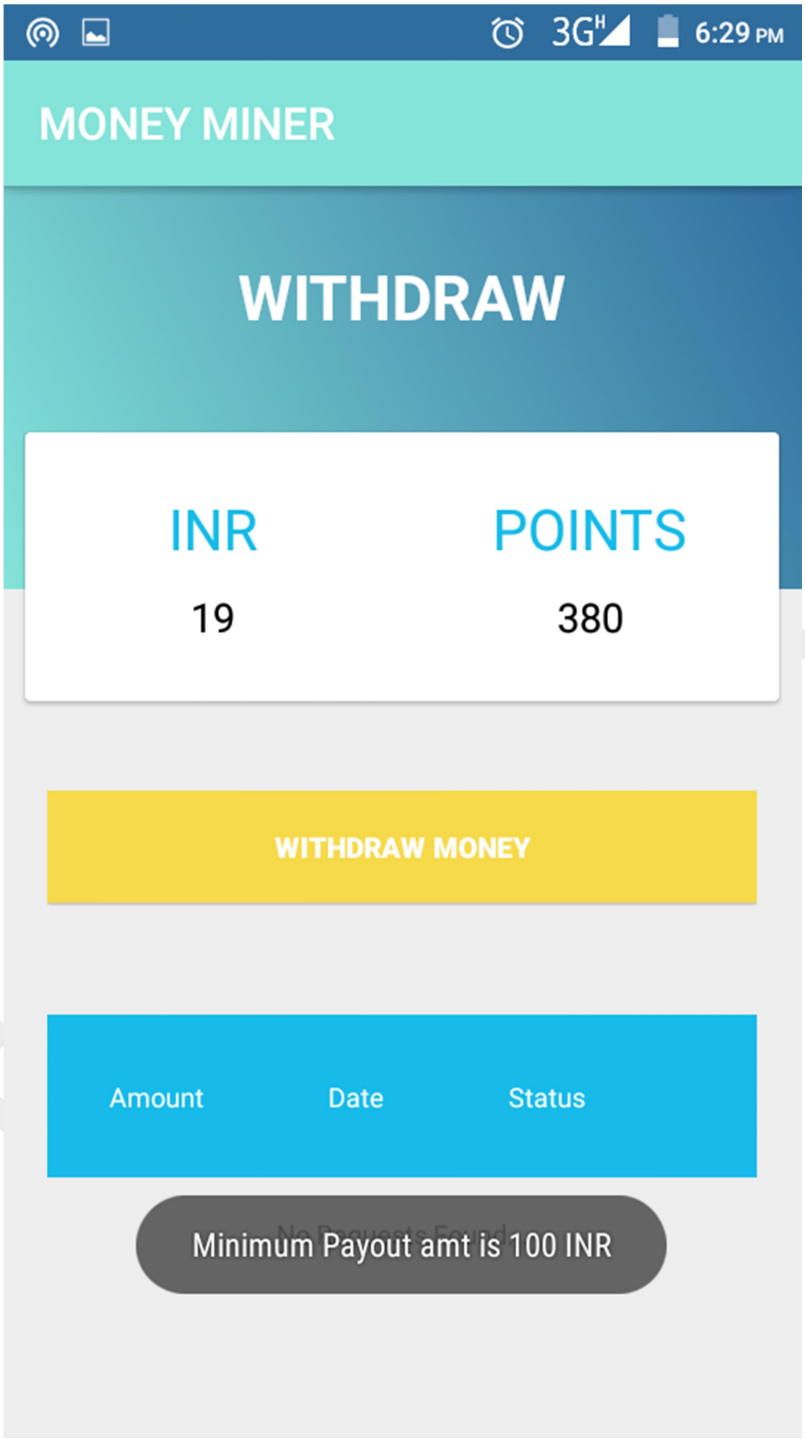
5.2. Login page



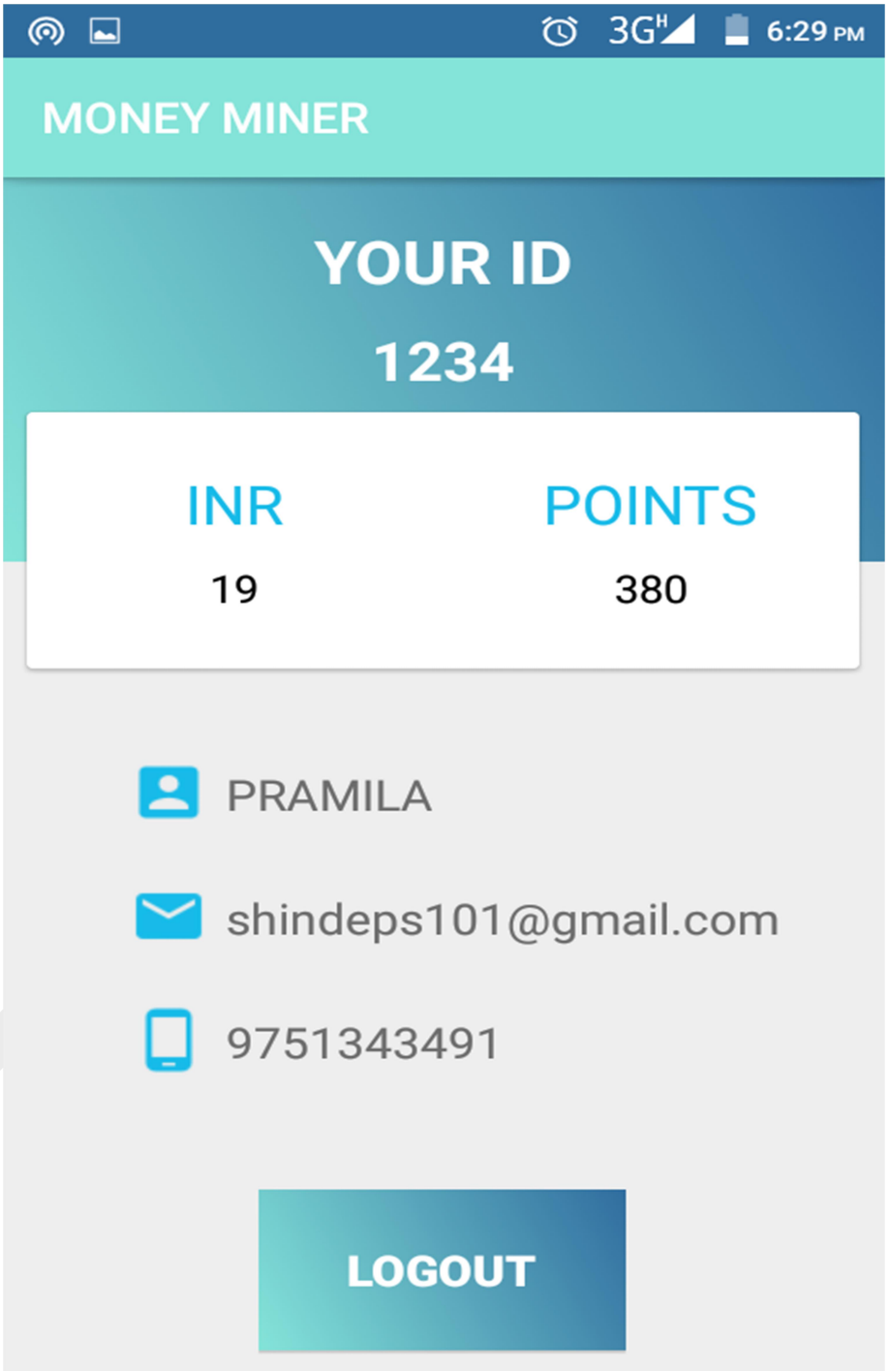
5.3Click on Task1 then see the ads



5.4Showing the Earn and points and another options



5.5Withdraw money option



5.6 Your profile and logout option

Chapter-06

6.1 Technology details to be used in the project

1. Language: Java J2SE and JDK

J2SE (Java 2 Standard Edition) Java would be the required as language for development of the project. JDK is the development kit used to compile java programs.

2. IDE:

a. Android Studio.

3. Handling database in java:

A) First step is to download android volley package.
B) Then , Use String Request classes and it's methods for making communication between android and php scripts.

Appendix A

Mathematical Models and Identified Functional Decomposition

A.1 Functional decomposition of the system

- User
- Mobile application (PocketMoneyMiner)
- server
- database

Technical Specification

Following section comprises of the technologies and concepts being used for the project development.

Appendix B

Testing / Reliability of Design

B.1 Test Plan for Design

Following are the Steps for Test Planning:

- Preparing a test plan
- Scope management: Deciding features to be/not tested
- Deciding test approach
- Identifying test deliverables
- Testing tasks: Size and effort estimation
- Activity breakdown and scheduling

❖ Preparing a test plan-

Planning is guided by policy, supports goal achievement, and is a vital part of all engineering activities. Test planning requires the planner to articulate the testing goals for a given project, to select tools and techniques needed to achieve the goals, and to estimate time and resources needed for testing tasks so that testing is effective, on time, within budget, and consistent with project goals.

❖ Scope management: Deciding features to be/not to be tested-

In this component of the test plan the tester gives another view of the entities to be tested by describing them in terms of the features they encompass. Features may be described as distinguishing characteristics of a software component or system**.** Example features relate to performance, reliability, portability, and functionality requirements for the software being tested. Features that will not be tested should be identified and reasons for their exclusion from test should be included. In this component of the test plan references to test design specifications for each feature and each combination of features are identified to establish the associations with actual test cases. The test design specifications, test procedures, and test case specifications appear in other sections of the test plan.

❖ Deciding test approach-

This section of the test plan provides broad coverage of the issues to be addressed when testing the target software. Testing activities are described. The level of descriptive detail should be sufficient so that the major testing tasks and task durations can be identified. More details will appear in the accompanying test design specifications. The planner should also include for each feature or combination of features, the approach that will be taken to ensure that each is adequately tested. Tools and techniques necessary for the tests should be included. Expectations for test completeness and how the degree of completeness will be determined should be described. For example, the planner should specify degree of coverage expected for white box tests. This can be expressed in terms of the percentage of statement coverage, branch coverage and so on expected. Techniques that will be used to trace requirements to test should be covered. Constraints on testing should also be included in this section, such as time and budget limitations. The planner should also describe how the testing process will be monitored to insure it is going according to plans. Criteria to be used for making decisions on when to stop testing must also be included. These should be well thought out

❖ Identifying responsibilities-

The member who will be responsible for test-related tasks should be identified.
This includes personnel who will be:

- Transmitting the software-under-test
- Developing test design specifications, and test cases
- Executing the tests and recording results
- Tracking and monitoring the test efforts
- Checking results
- Interacting with developers
- Managing and providing equipment
- Developing the test harnesses
- Interacting with the users/customers

❖ Identifying test deliverables-

Execution-based testing has a set of deliverables that includes the test plan along with its associated test design specifications, test procedures, and test cases. The latter describe the actual test inputs and expected outputs. Deliverables may also include other documents that result from testing such as test logs, test transmittal reports, test incident reports, and a test summary report. These documents are described in subsequent sections of this chapter. Preparing and storing these documents requires considerable resources. Each organization should decide which of these documents is required for a given project. Another test deliverable is the test harness. This is supplementary code that is written specifically to support the test efforts, for example, module drivers and stubs. Drivers and stubs are necessary for unit and integration test. Very often these amount to a substantial amount of code. They should be well designed and stored for reuse in testing subsequent releases of the software. Other support code, for example, testing tools that will be developed especially for this project, should also be described in this section of the test plan.

❖ Testing tasks: Size and effort estimation-

Here the test planner describes the software and hardware needs for the testing effort. For example, any special equipment or hardware needed such as emulators, telecommunication equipment, or other devices should be noted. The planner must also indicate any laboratory space containing the equipment that needs to be reserved. The planner also needs to specify any special software needs such as coverage tools, databases, and test data generators. Security requirements for the testing environment may also need to be described. The test planner should describe the staff and the skill levels needed to carry out test-related responsibilities such as those listed in the section above. Any special training required to perform a task should be noted.

❖ Activity breakdown and scheduling-

Task durations should be established and recorded with the aid of a task networking tool. Test milestones should be established, recorded, and scheduled. These milestones usually appear in the project plan as well as the test plan. They are necessary for tracking testing efforts to ensure that actual testing is carried out as planned. Schedules for use of staff, tools,

equipment, and laboratory space should also be specified. Every testing effort has risks associated with it. Testing software with a high degree of criticality, complexity, or a tight delivery deadline all impose risks that may have negative impacts on project goals. These risks should be: (i) identified, (ii) evaluated in terms of their probability of occurrence, (iii) prioritized, and (iv) contingency plans should be developed that can be activated if the risk occurs. Barry Bohem has a very useful method for risk management using these types of activities. A test planner can apply them to develop the "risk and contingencies" component of a test plan.

B.2 Details of Design Testing

- Always test that whether the design is traceable to analysis model-

  Analysis model describes information domain of the problem. Design model translates this information to the architecture. While testing, test whether designing is carried out with correspondence to problem domain.

- Test the architecture of the system to be built-
  Architecture is the skeleton of the system. While testing, test whether this architecture is correct, whether it combines all the important modules of project.

- While testing in design phase, data is as important as processing functions-
  Data design is an essential element of architecture. All type of data values are also checked before giving as input. In testing, all the processing functions are tested whether they are functioning as per the requirement.

- Test the internal and external interfaces to be designed-
  All the interfaces must be tested for their simplicity. Data flow among the interfaces is checked.

- Test whether the user interface is as per the user specifications-
  User interface is the important part of the software. Interface should be simple but attractive also. Testing should check whether all these features are implemented.

- Test each and every component design independently to check its functional independency-

  Every component should work properly so that software will work properly after integrating all the components. So every component is tested independently.

Appendix C

C.1 Project Management Approach (Roles & Responsibilities)

Table C.1: Roles and Responsibilities

Task	Conducted by	Assisted by	Guided by
1) Preparation of abstract and other related documents.	**<Amit Kharat Pramila Shinde> <43,42>**	**<Amit Kharat > <43>**	
2) Collection of research papers related to topic.	**<Saanica Ghate Pramila Shinde> <63,42>**	**<Saanica Ghate > < 63>**	
3) On field survey for requirement gathering.	**<Saanica Ghate Amit Kale> <63,51>**	**<Saanica Ghate Pramila Shinde> <2,14>**	
4) Preparation of critique on collected research papers.	**<Pramila Shinde Amit Kale> <14,45>**	**<Pramila Shinde Amit Kale> <14,45>**	
5) Technical research on different technologies and protocols.	**<Amit Kharat Pramila Shinde> <4,14>**	**<Saanica Ghate> <Amit Kharat > <2,4>**	

C.2 Status of project work done

Table C.2: Status

Work	Status
1. Requirement gathering	Done
2. On Field survey	Done
3. Literature Survey	Done
4. Technical Research	Done
5. Designing of Block diagram	Done
6. Designing of UML architecture	Done

Chapter-7
Conclusion and Future Scope

7.1Conclusion:-

In modern society, The Digitization of world is on its peak but to earn money using it it's very difficult.

The project aims at minimizing the work complexity and time of students, senior citizens, housewives where they can earn and save money. Some features and benefits offered by this application are:

- User-Friendly nature
- Requires less space storage
- Reduce work complexity
- Less Man Power
- Easy to Earn
- Knowledge sharing

These features are achieved by designing an optimized and efficient model of the proposed application thereby making use of existing resources.

We performed the detail design of user interface, the detail design of database and application program, the detail design of network practices and security technologies, and the detail design of customer service system.

7.2Future Scope:

After developing the application there are some changes which are going to happen with the new technology so we are going to update the application without making it complicated. We can implement some more features in next version like watching videos for more earing the money.

7.3References

- http:/ / java. sun. com/ products/ archive/ j2se/ 1. 2. 2_017/
- http:/ / community. java. net/ jdk/ opensource/
- Open source JDK 7 project (https:/ / jdk7. dev. java. net/)
- Open source JDK project (http:/ / openjdk. java. net/)
- IBM Java technology JDK (http:/ / www. ibm. com/ developerworks/ java/ jdk/)
- http:/ / www.android-studio.org
- Java Object Serialization (http:/ / beginner-java-tutorial. com/ object-serialization.html)
- Java Object Serialization documentation (http:/ / download. oracle. com/ javase/ 6/ docs/ technotes/ guides/serialization)