Porate Chai Android Mobile Application

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This Report Presented in Partial Fulfillment of the Requirements for the Degree of Bachelor of Science in Computer Science and Engineering.

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APPROVAL

This Project title **"Porate Chai Android Mobile Application"**, submitted by Tamhid Ahamed and Ibrahim Khalil to the Department of Computer Science and Engineering, Daffodil International University, has been accepted as satisfactory for the partial fulfillment of the requirements for the degree of B.Sc. in Computer Science and Engineering and approved as to its style and contents. The presentation has been held on 24th October, 2018.

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DECLARATION

We hereby declare that, this project has been done by us under the supervision of **Md Tanvir Siddiquee Senior Lecturer, Department of CSE** Daffodil International University. We also declare that neither this project nor any part of this project has been submitted elsewhere for award of any degree or diploma.

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We would like to thank our entire course mate in Daffodil International University, who took part in this discuss while completing the course work.

Finally, we must acknowledge with due respect the constant support and patients of our parents.

ABSTRACT

This project is on "**Porate Chai**". This is an android based application which needs an android device to run and this application is a community platform there have features are Tutor. All the features are found by the people daily through newspaper, website and also in the wall to wall by physically. This application is more user friendly and so that user can easily find out the features what they need by their smart phone. In the development of this application the most essential elements were computer, an android device and an android application development tool. The development of this application is described in the project report. Using this application user will also get lot of facilities. After development session of this application we have tested it by different user and found it to be a well build application which works perfectly.

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CHAPTER 1

Introduction

1.1 Introduction

Activities in our daily life are decided by the use of Internet. Internet changes our daily life. We expend lots of time on the Web. Veritable use of the Internet rehash our lives easy and simple. The Internet gives us effective information, data, and knowledge for the personal, social and economic development and it's up to us to utilize our time on the web in an originative manner. The Internet is a great revolution in information technology [5].

For the great revolution of internet, we design and build an application that provide us quality tutor on public demand. This application that can help a user to find Tutor easily without physical going. Its create user friendly features that helps user to getting valid information.

1.2 Background

As I have stated before, keeping in mind the goodwill of our people we have decided to build an application that will provide proper tutor and student information. Following the idea we build an useful application which contains Tutor and Student.
Using the Tutor portion, Teacher can post his qualification and Student or Parents see the Teachers qualification.

1.3 Motivation

The main motivation of Porate Chai application is to manage effectively and do maximum work at minimum time [8]. This application will handle tutor advertisements procedure. It will store and display tutor information. It creates user friendly features that helps user to find out only Valid Tutors and Students.

1.4 Problem Statement

Lack of proper use of internet may lead toward poor facilities, a bunch of trouble losses of valuable time. In case of the people of our country, because of not having proper knowledge about the use of internet, they are going door to door to view the Tutors physically.

1.5 Project Objective

- Providing a trouble free tutor's information.
- Providing a trouble free student's information.
- By providing information, getting a user to find out Tutor.
- Saving the valuable time of people.

1.6 Project Scope

- Providing information regarding Tutor.
- Designing a database for storing related data.
- Get location/address of the tutor using the Google Map.
- Establishing a CALL plan via GSM module.

CHAPTER 2

Background

2.1 Introduction

We work on the area of Tutors. An emergency people has to need tutor and people need to find it by their physical instance. We have decided to do some work on this area to solve the problem and tried to make it less time consuming.

We came to know that, there are many types of male tutor and female tutor and also have students so by using this application user will be able to find out them by category wise. We can add compliment at a teacher post.
Even we can see individually teacher and student list at the front page of the app.

2.2 Related works

There has been a couple of works in the past regarding tutor search. All the application we got are almost similar with each other not much differ among its but our project has some unique functions which will provide some new experience to user and hopefully make the application more user friendly and most importantly reliable. Here, we will try to show some which we have found in the play store. We will describe them with properly and elaborately so that we can understand you the main differ between ours "**Porate Chai Android Mobile Application**" and others android based applications on filed. For example, there are some applications named: Tutor Finder, BD Tutors.com, BD Home Tutor, Tuition Finder.

2.2.1 Tutor Finder

"Tutor Finder" application only contain the tutor or student information. Tutor Finder is an app where user can find tutors/students. This application is absolutely free and no need to create an account. Just install and start searching [1].

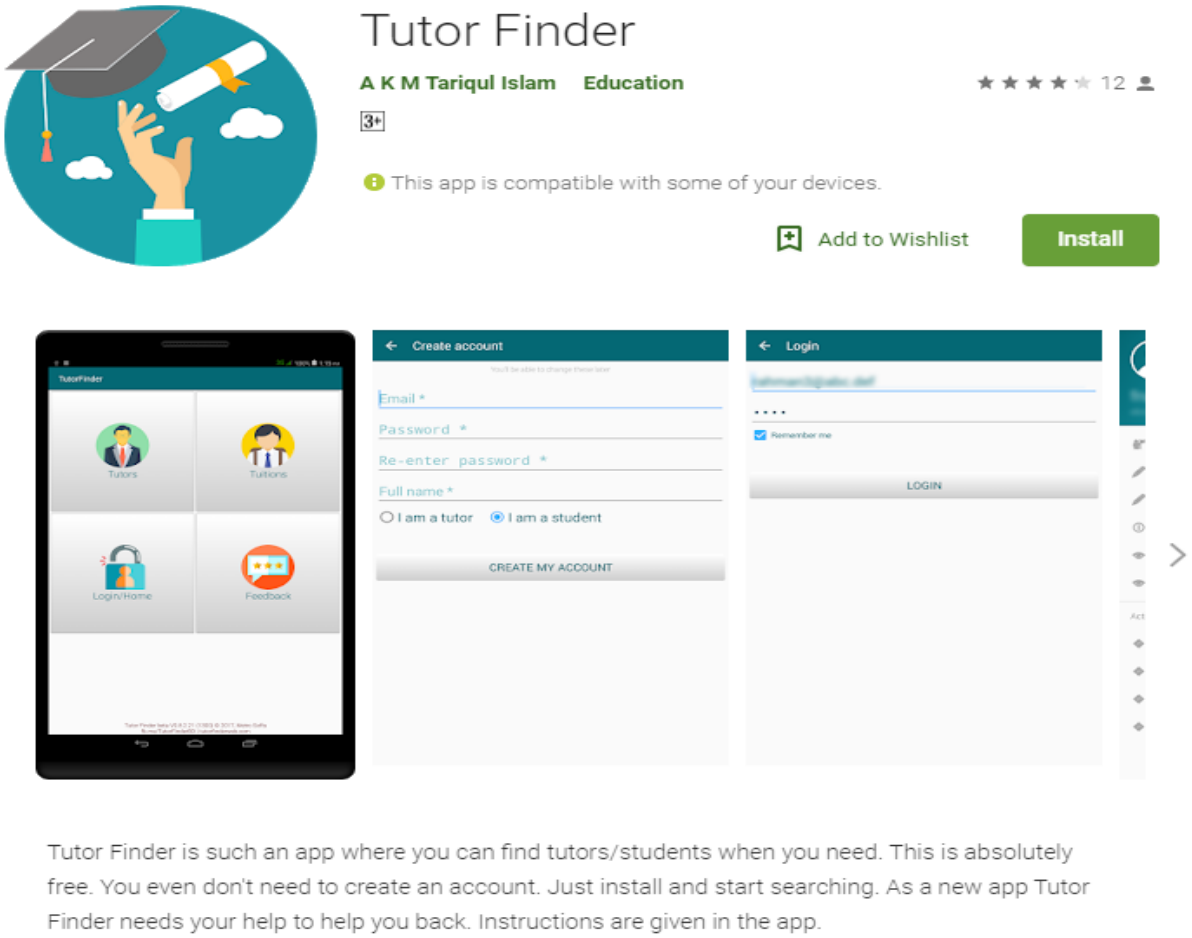

Figure 2.1: Tutor Finder

2.2.2 BD Tutors.com

"BD tutors.com" contains search bar, register button and different categories of finding tutors. In the home page of the application it has tutor's name, fee, place and number. This application is free to open account.

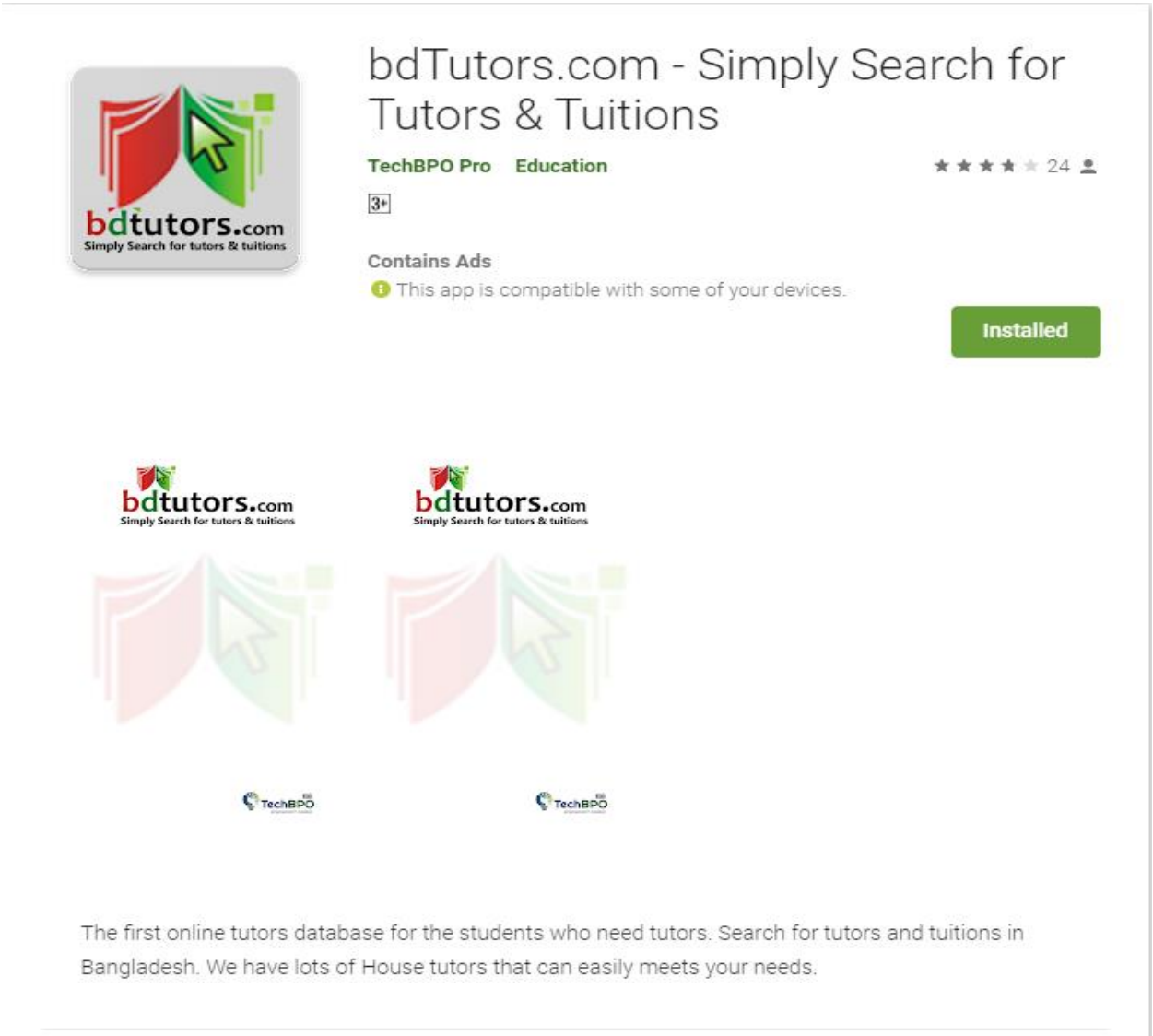

Figure 2.2: BD Tutors.com

2.2.3 BD Home Tutor

"BD Home Tutor" contains call option and share option top of the applicaton. It has various option such as find tuition, find tutor and post tuition and in the end a help button of how to use it. This application is free.

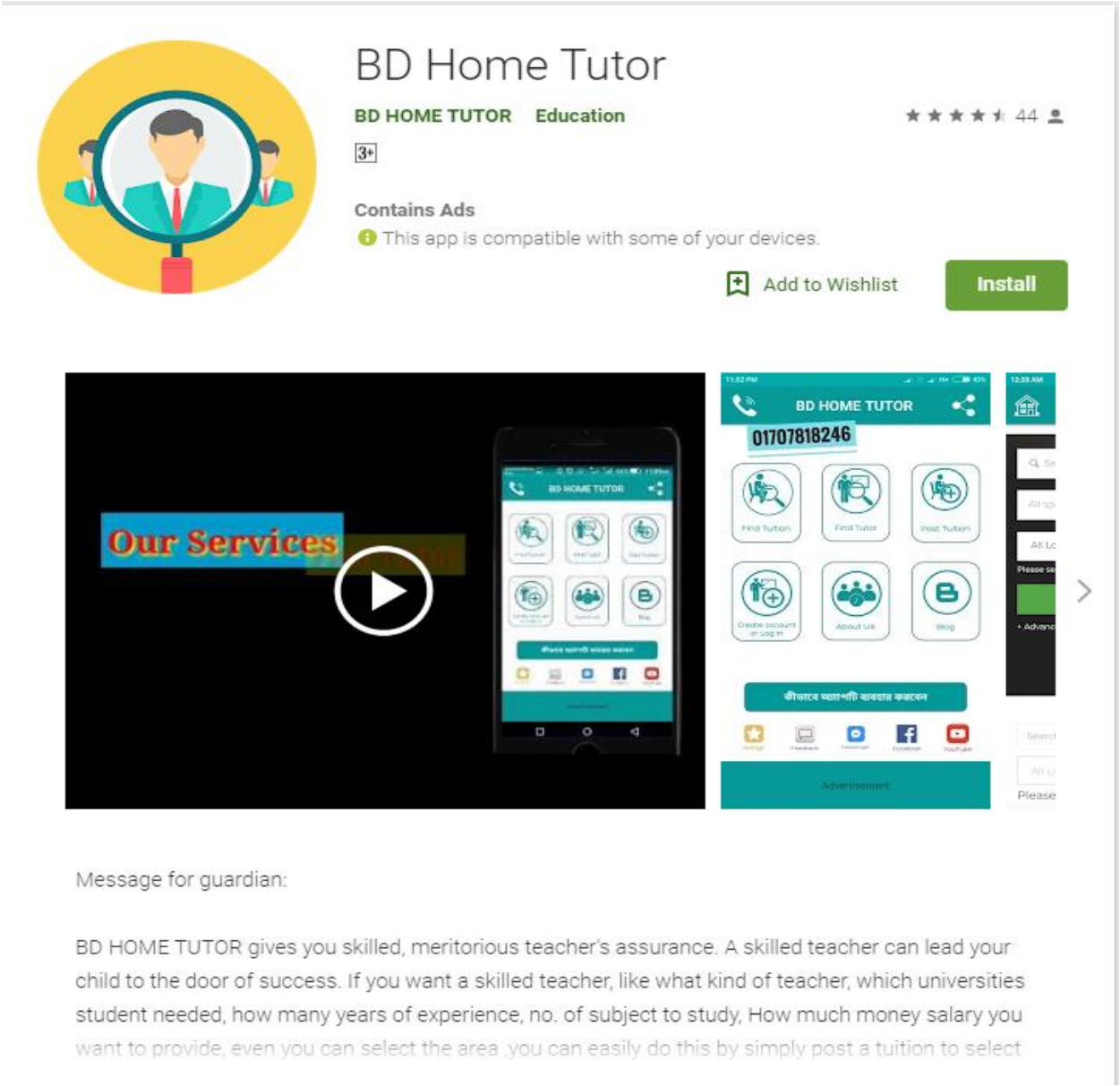

Figure 2.3: BD Home Tutor

2.2.4 Tuition Finder

"Tuition Finder" contains a sign in and sign up button in the home page. User can find tutor so easily without any problem. This application is user friendly and free of cost. Just install and start searching.

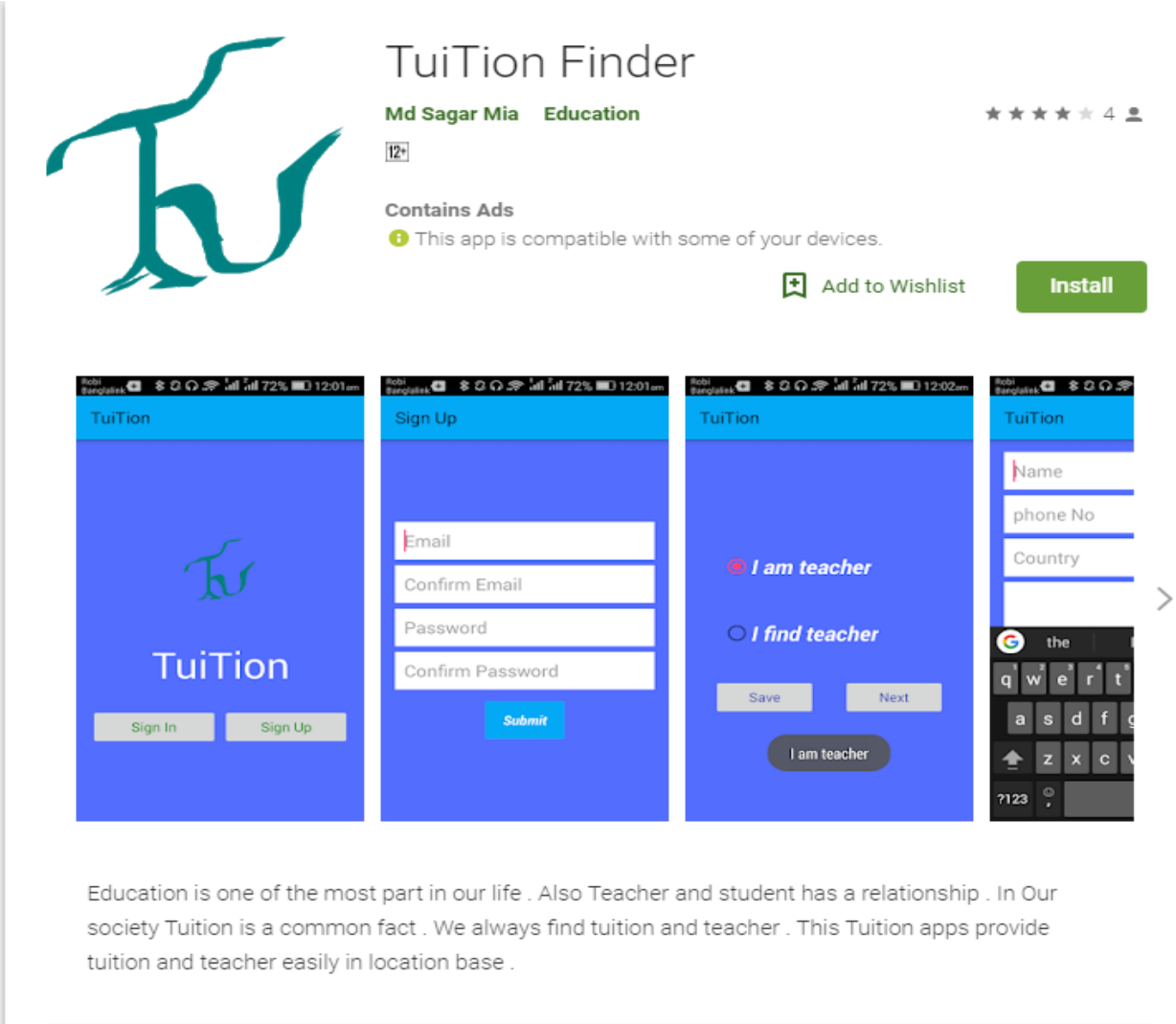

Figure 2.4: Tuition Finder

2.3 Comparative Studies

There are some existing application which have some limitations. Most of the applications have some problem. Different applications contain different features but there is no app which contain all features in one application. Such as find tutor through Google map, user can add compliment on teacher's post and too much secure.

But In this application we provide all those feature our application allows the Google map to track the tutor's place. It also allows phone calling and email sending system to contact with the tutor. It also allows find nearby tutor from current location using Google map.

2.4 Challenges

Interactive Application: One important thing in a software project is its Interactions. Mobile devices offer many high-quality features with high quality sensors. So, creating interactions is time consuming and can be very complex in design phase

Keeping the Application simple and Clear: If the app is very complex and user can not recognize how it works, then the user will be frustrated and will give a negative review about the application. So the functions of the app should be very clear.

Mobile Content Management: The importance of mobile application content is growing day by day because increasing number of smart phone. So, including rich content such as images, animations is important. On the other hand, in our app such functions like as attendance, result are important.

Dealing with the different screen devices: Users may have many different screen devices. So our challenge is to handle the design of the application as it may vary for different devices.

Maintaining the connection with the user: Mobile application market is dynamic because of high number of innovations. So connection with the users is very important.

Performance: One of the important challenge is to design well performing and bug free application which needs minimum charge of battery.

CHAPTER 3

Requirement Specification

3.1 Introduction

In the chapter the discussion matter is all about what kind of plan use for this application. It has use case diagram to show the relationship between user and the different cases. It gives enormous explanation of each case in this application. It has BPM diagram. It has also discussed about non-functional requirement and data flow diagram.

3.2 Use Case Diagram

A use case diagram at its simplest is a representation of a user's interaction with the system that shows the relationship between the user and the different use cases in which the user is involved [4].

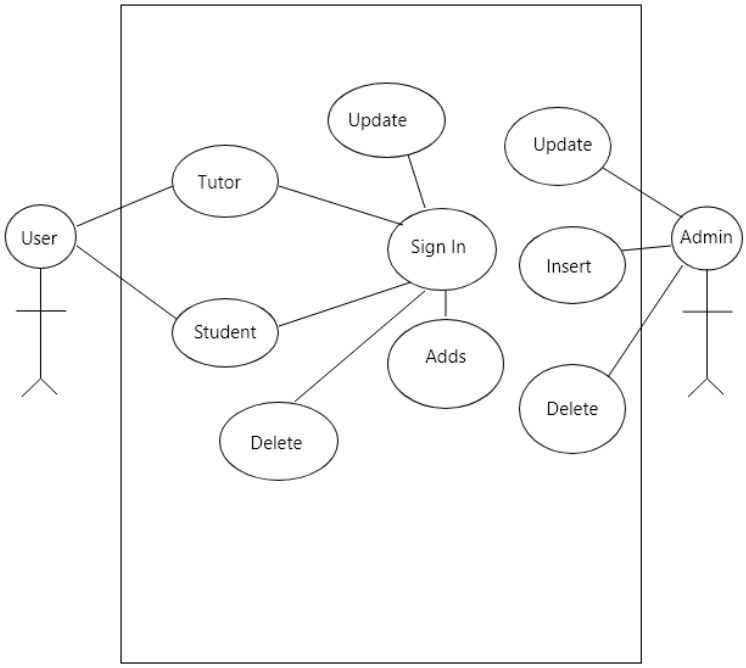

Figure 3.1: Use Case Diagram of Porate Chai

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3.2.1 Tutor

Use case: Tutor

Actor: user

Pre-condition:

- Android OS based handset.
- Turn on Location.
- Internet Connection.

Scenario:

- User can see the information of Male Tutor, Female Tutor.
- User can find nearest Tutor via Google map.

Alternative Scenario: If user does not turn on location/GPS, turn on. Check the Internet connection, if user not connected.

Post-condition: Application will be running without an error.

3.2.2 Network Connectivity

Use case: Connectivity

Actor: user

Pre-condition:

- Android OS based handset.

Scenario:

- User can see the network connectivity.
- User can connect the network Wi-Fi or mobile data.

Post-condition: Application will be running without an error.

3.2.3 Create Account

Use case: Sign In

Actor: user

Pre-condition:

- Android OS based handset.
- Internet Connection.

Scenario:

- User can create account by Email or Phone number for post ad.
- User can insert, update and delete their ad.

Alternative Scenario: If user does not turn on location/GPS, turn on. Check the Internet connection, if user not connected.

Post-condition: Application will be running without an error.

3.2.4 Contact **Us**

Use case: Contact **Us**

Actor: User

Pre-condition:

- None

Scenario:

- User can know about application.

Alternative Scenario: None.

Post-condition: None.

3.3 Business Process Modeling (BPM)

Business process modeling (BPM) is the activity of representing processes of an enterprise, so that the current process may be analyzed, improved, and automated. The term 'business model' is thus used for a broad range of informal and formal descriptions to represent core aspects of including purpose, operational processes and policies [10].

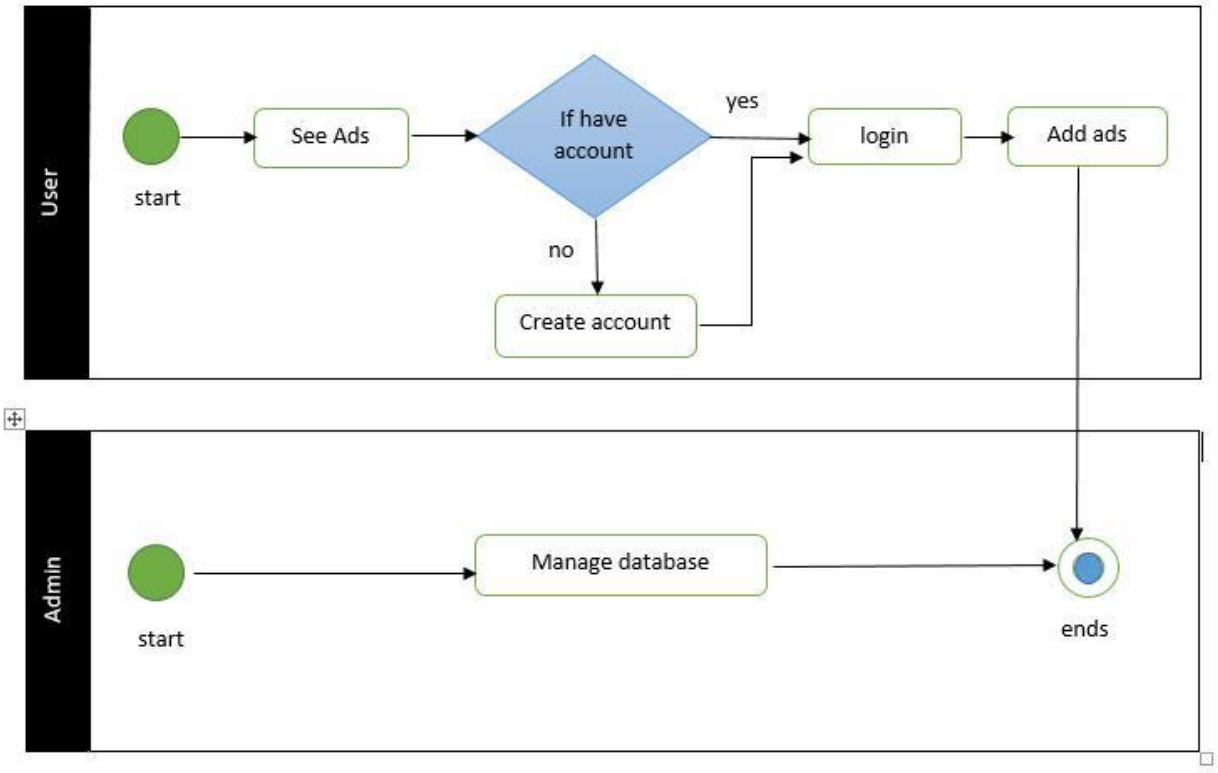

Figure 3.2: Business Process Modeling (BPM)

3.4 Data Flow Diagram

A DFD shows what kind of information will be input to and output from the system, how the data will advance through the system, and where the data will be stored. It does not show information about process timing or whether processes will operate in sequence or in parallel, unlike a traditional structured flowchart which focuses on control flow, or a UML activity workflow diagram, which presents both control and data flows as a unified model.

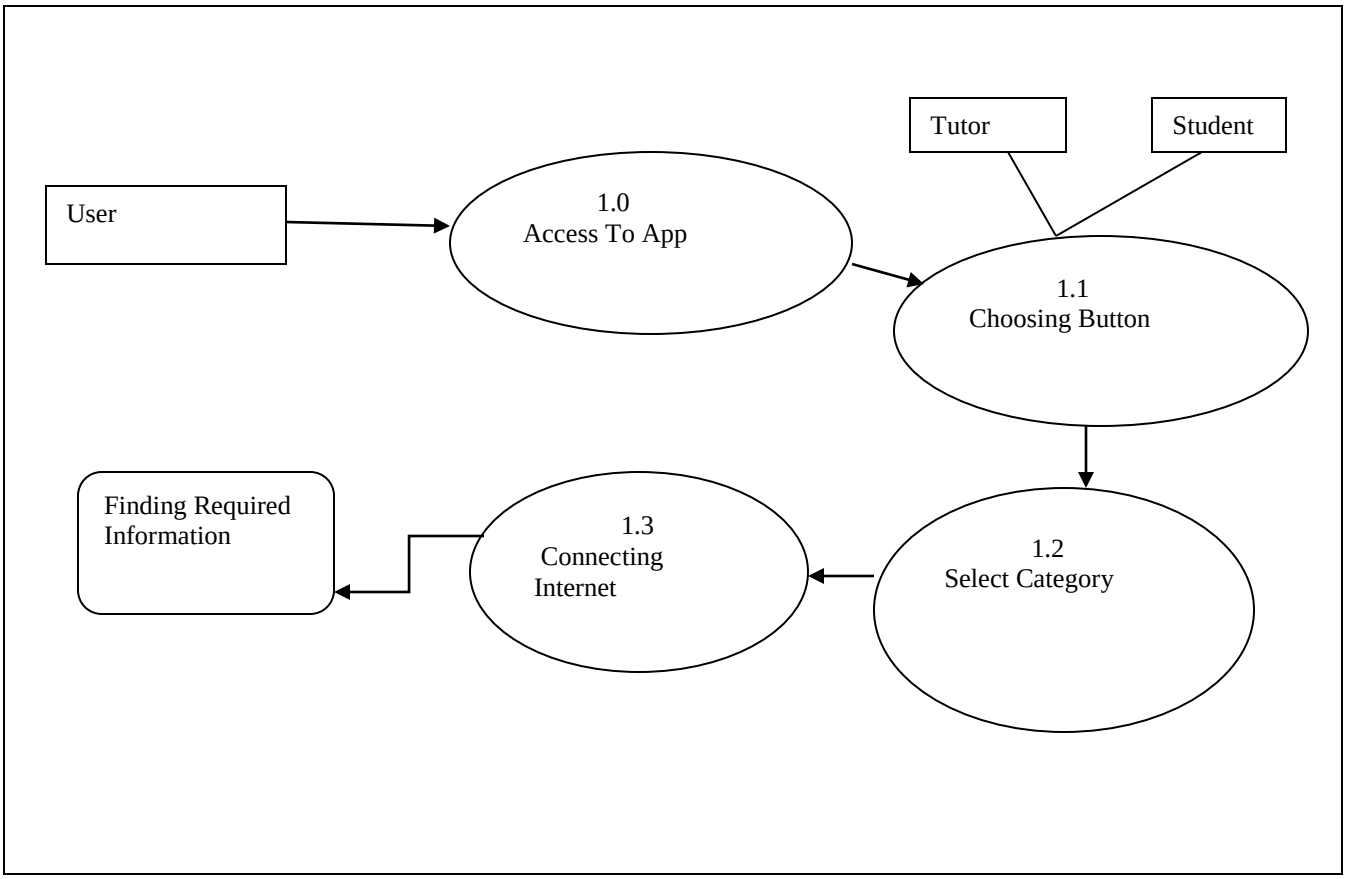

Figure 3.3: Data Flow Diagram of the System

3.5 Non-functional Requirement

- Help text will be provided in English.
- The process of using the application will always be available.
- There is no user limit for browsing the application.
- This application can be used only on android OS.
- During browsing through the application system responses should be no more than 1 second.
- Only register user can modify the information of the application.

3.6 Usability requirement

- An android OS based handset (Android version 4.2 - 7.0) with internet connection and GPS support.
- The interface of the application is suitable even for the color-blind people.
- Anyone who knows English can use this application.

CHAPTER 4

Design Specification

4.1 Introduction

In this chapter main topic is design of the application. What type of architecture has been used in this application has discussed. Data base also has been showed with proper details. Type of database with name and picture has been added. We can see E R diagram. E-R diagram is a diagram used to conduct data modeling activity. Each and every portion of application individually has been discussed with picture. Finally design requirement has been discussed with details.

4.2 System Architecture

System architecture shows the structure and behavior of a system, how the system works and how it interacts with users [7]. The following figure 4.1 shows System Architecture.

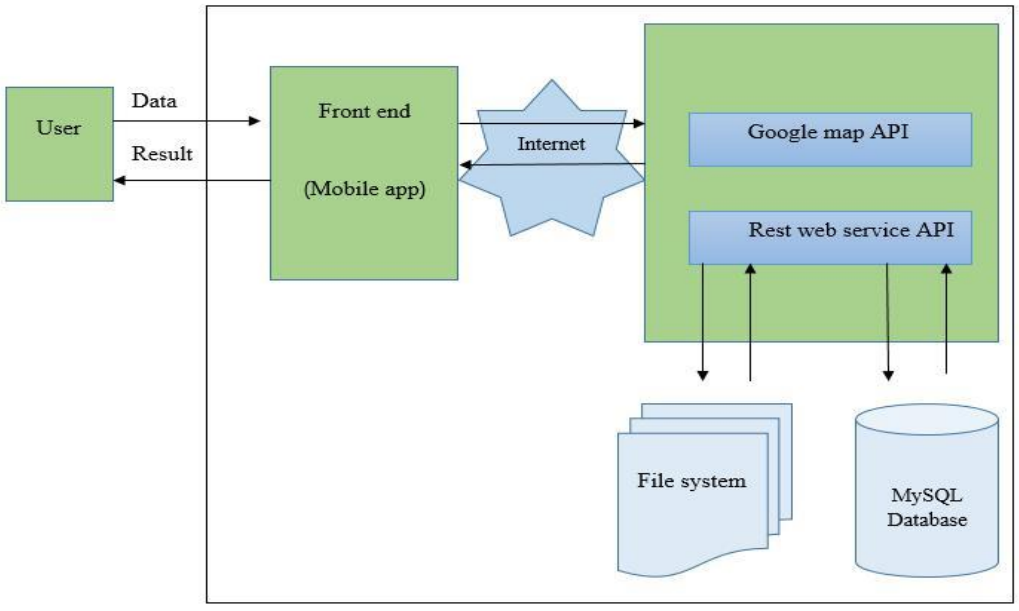

Figure 4.1: System Architecture

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4.3 Database Design

Database design is the process of producing a detailed data model of database.
Figure below dictates the Database Design of our developed application. This database acts as host of data from which the application can fetch data whenever it needs. The first, second and third part of designated database design is shown in fig. 4.2, 4.3 and 4.4

4.2.1: Database Table

This project have lots of table such a like table, comment table, followers table, location table, Student table, AllUserAccess table.

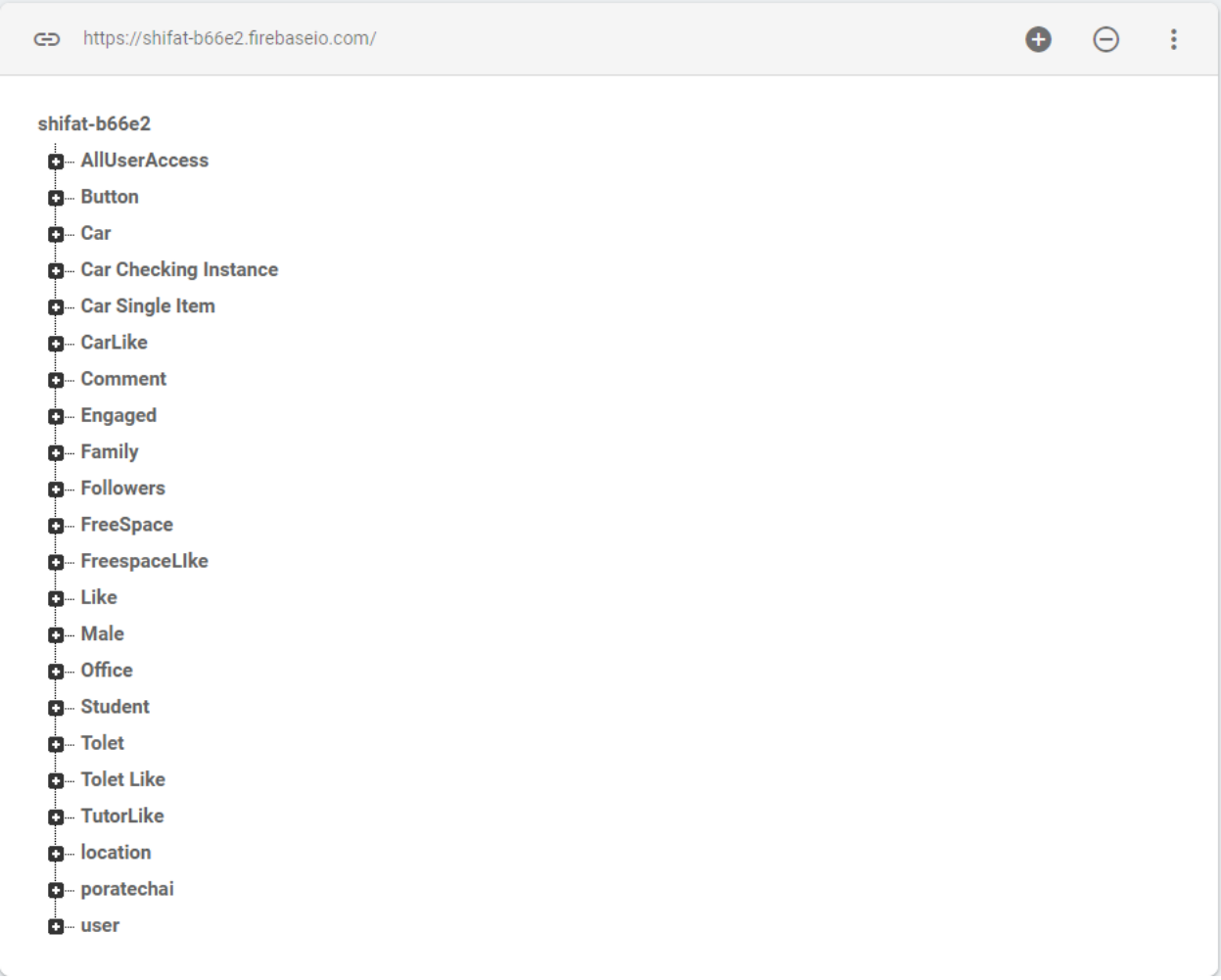


Figure 4.2: Database Design for Android App (Part1)

4.3.1: Storage Database

This is a storage table of database. When Tutor and Student register then their image save into the database table.

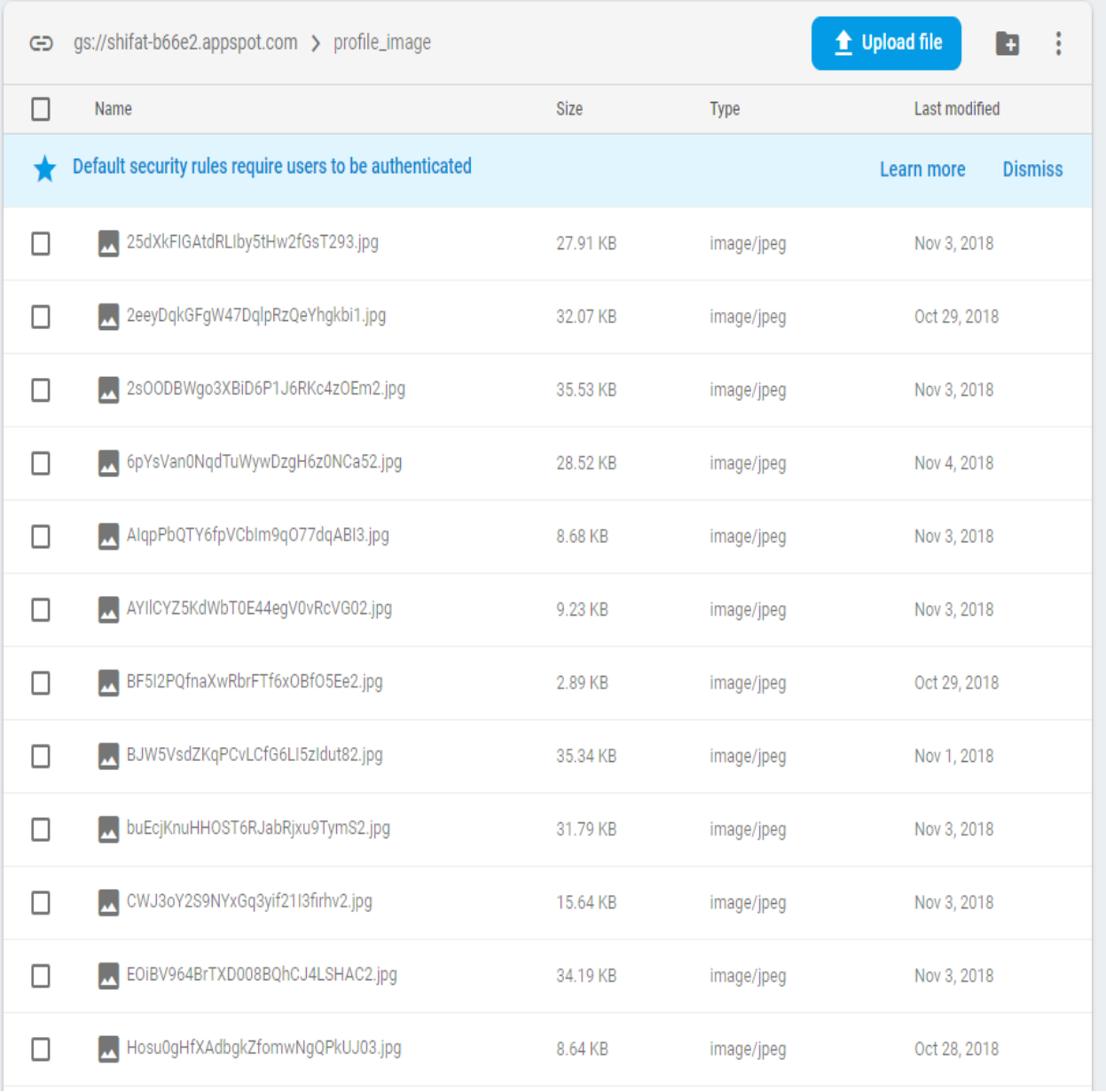


Figure 4.3: Database Design for Android App (Part2)

4.3.2: User Account Database

Here all registered user are stored. When one register then the users email and password save in this table. The password save here encrypted format.

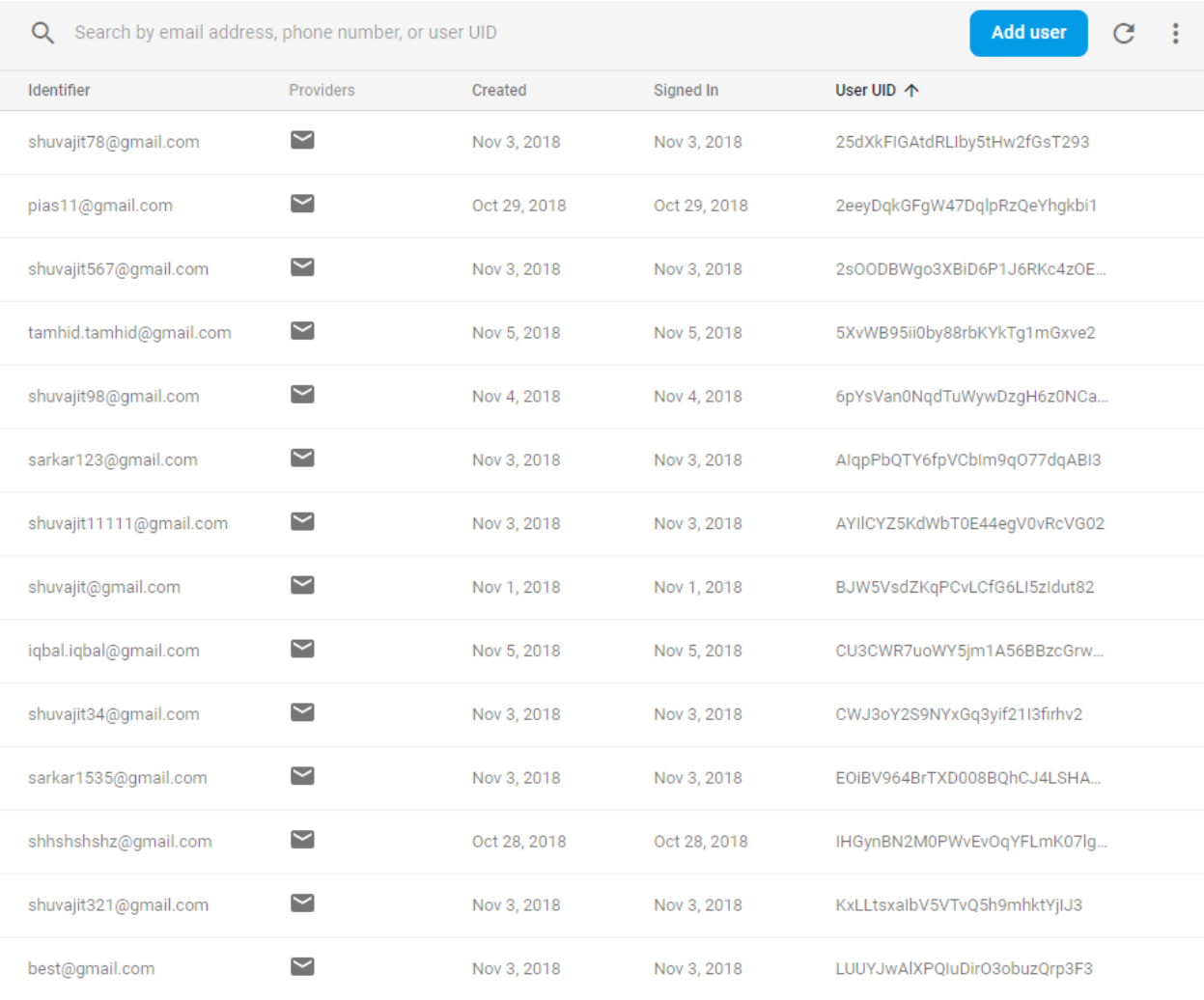


Figure 4.4: Database Design for Android App (Part3)

4.4 E-R Diagram

E-R diagram is a diagram used to conduct data modeling activity [6]. It describes the relationship between data and used E-R diagram to perform data modeling, and explain the diagram to stakeholders.

Person, place, object, event or concept about which data is to be maintained by the entity. Relationship Associated with the instances of one or more entity types. Attributes is named property or characteristic of an entity.

Following figure shows the total E-R (Entity-Relationship) diagram.

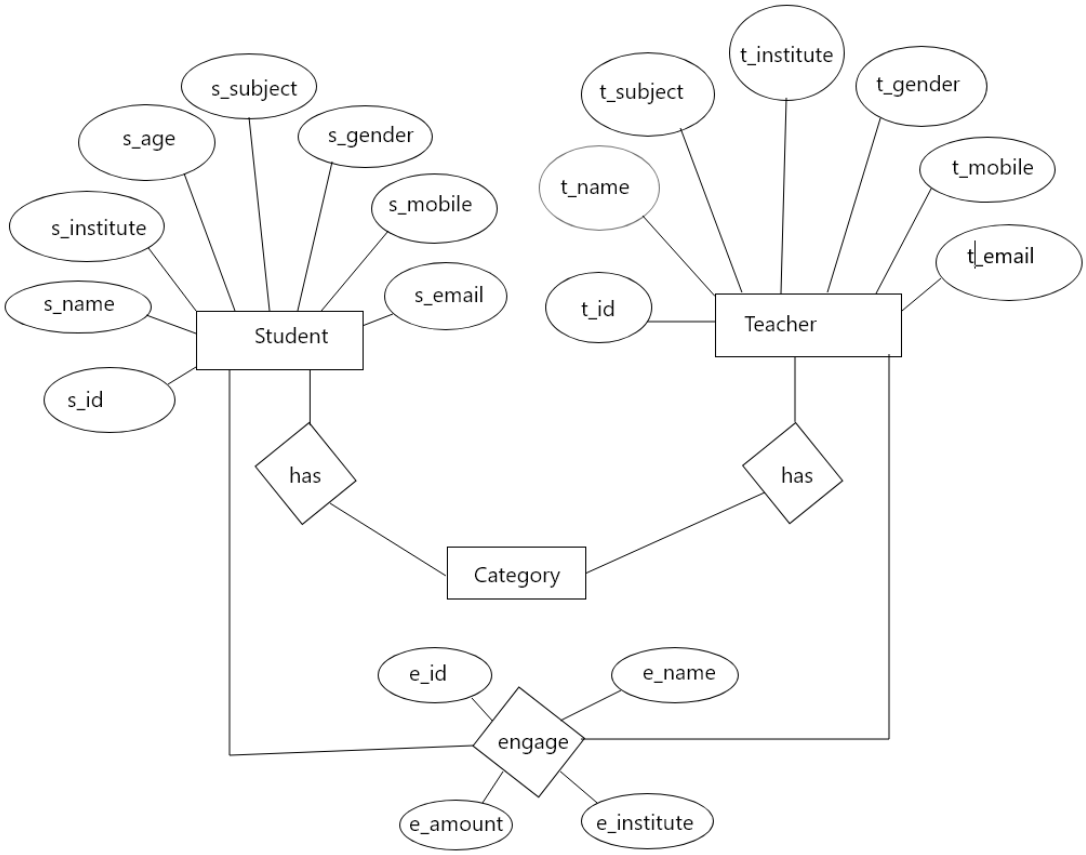


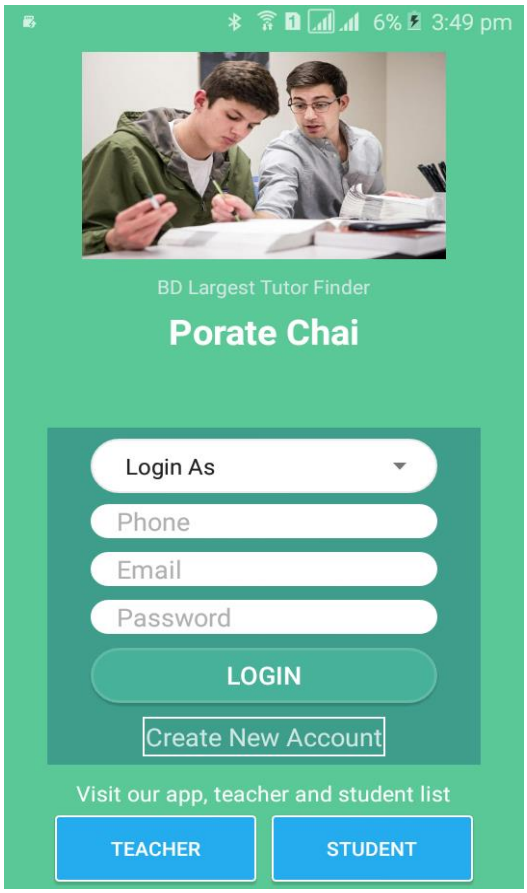
Figure 4.5: E-R Diagram of Porate chai

4.5 UI Design

User Interface (UI) that allows user to interact with the mobile devices or other electronic devices. UI design usually refers to the design of Graphical User Interface (GUI), but can also refer to others, such as natural and voice user interfaces.

4.5.1 Home Screen

Home screen shows item Tutor's and Student's login and create an account, User network connectivity. User can login to go forward and if have no account in this case user can create a new account for go forward. User can also see the teacher and student list without create account.



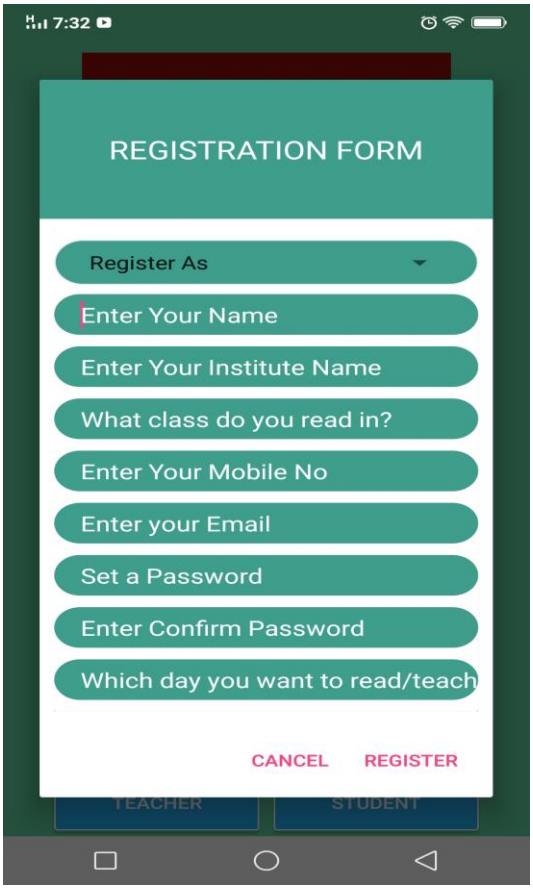


Figure 4.5.1: Login Screen and Registration form

4.5.2: Profile Image Upload and List of Tutors

Update your profile image, here user can upload their profile image and the other page there has a recycler list view there all teacher list is shown with their image, name, subject name, institute name, current location address and gender male or female tutor. Also there have advanced search bar like youtube.

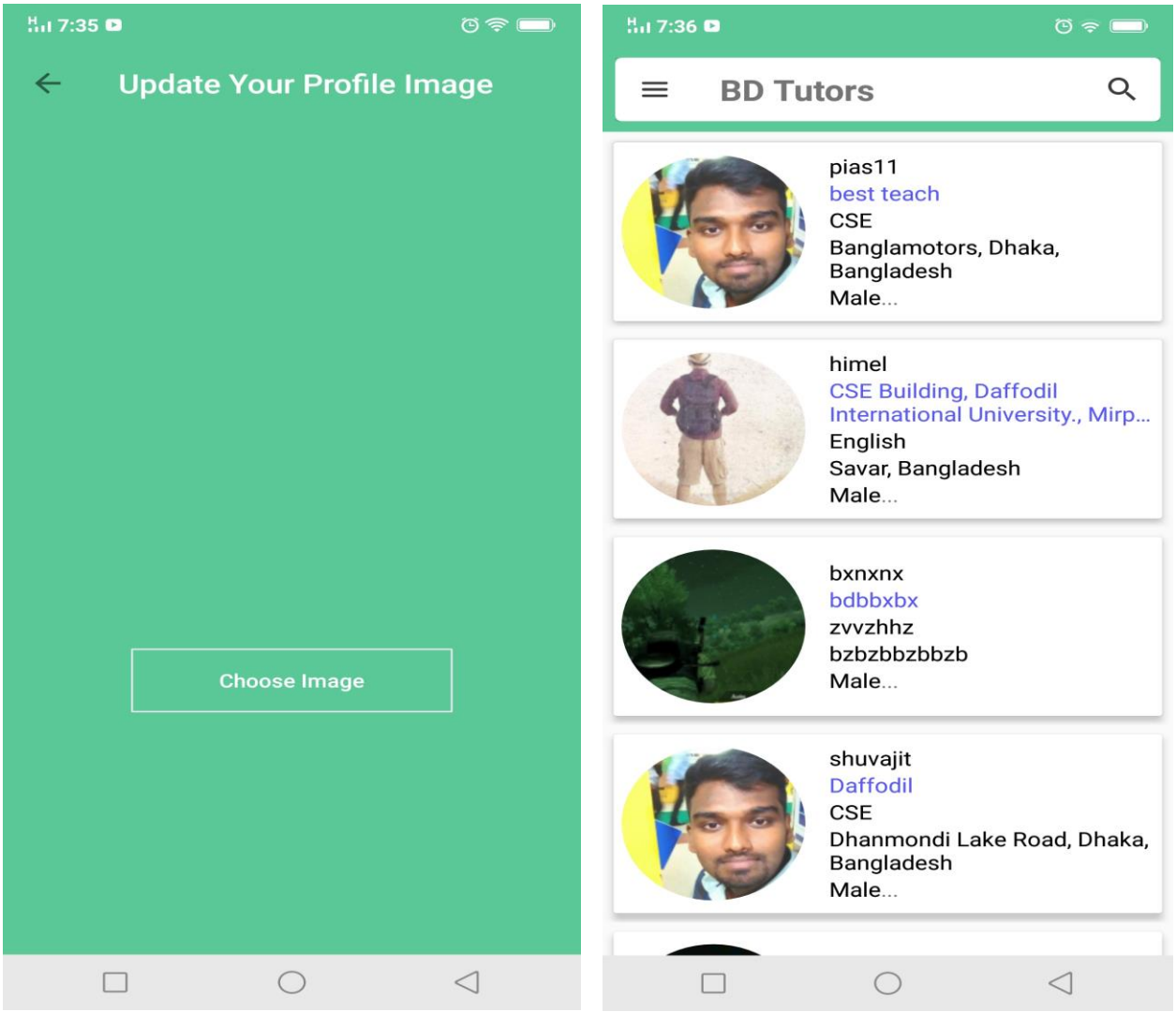


Figure 4.5.2: Profile Image Upload and List of Tutors

4.5.3: Navigation Drawer and Advanced Search Bar

Left side page is showing the navigation drawer there have add option and also have account management option with individual search option like search only male tutor, search only female tutor, search by Google Map and also have logout option. The Right side image have advanced search bar like youtube and the material search bar have auto suggestion this will help user to easy search.

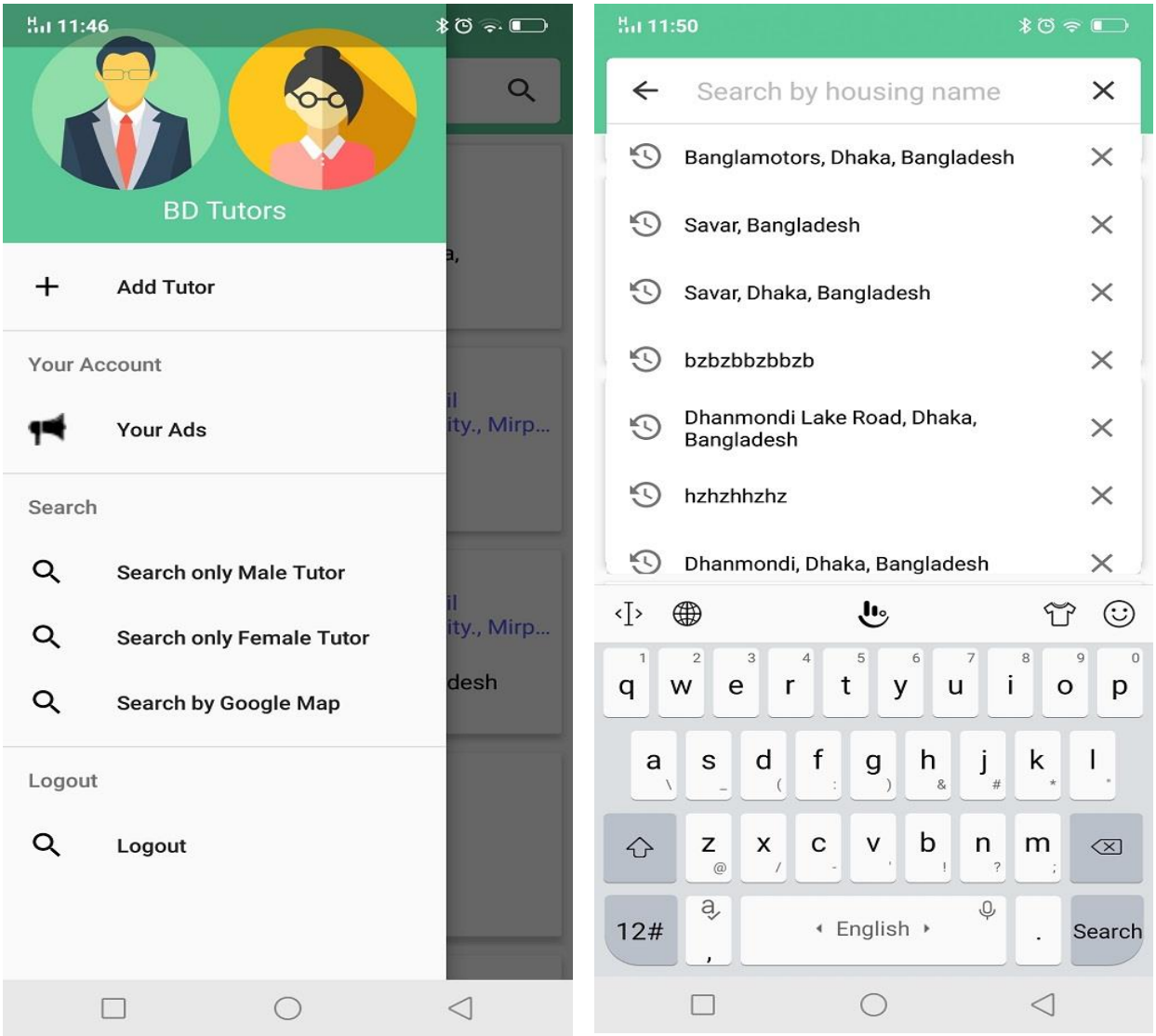


Figure 4.5.3: Navigation Drawer and Advanced Search Bar

4.5.4: BD Teacher List and Student List

In the home page there have two button one for teacher list and another for student list. In teacher list there visitor can easily see the all teacher list and other side have the student list and by this list visitor can see the student almost detail information like name, institute name, subject name, current address and gender and here we not allow user to see the contact information for privacy issue.

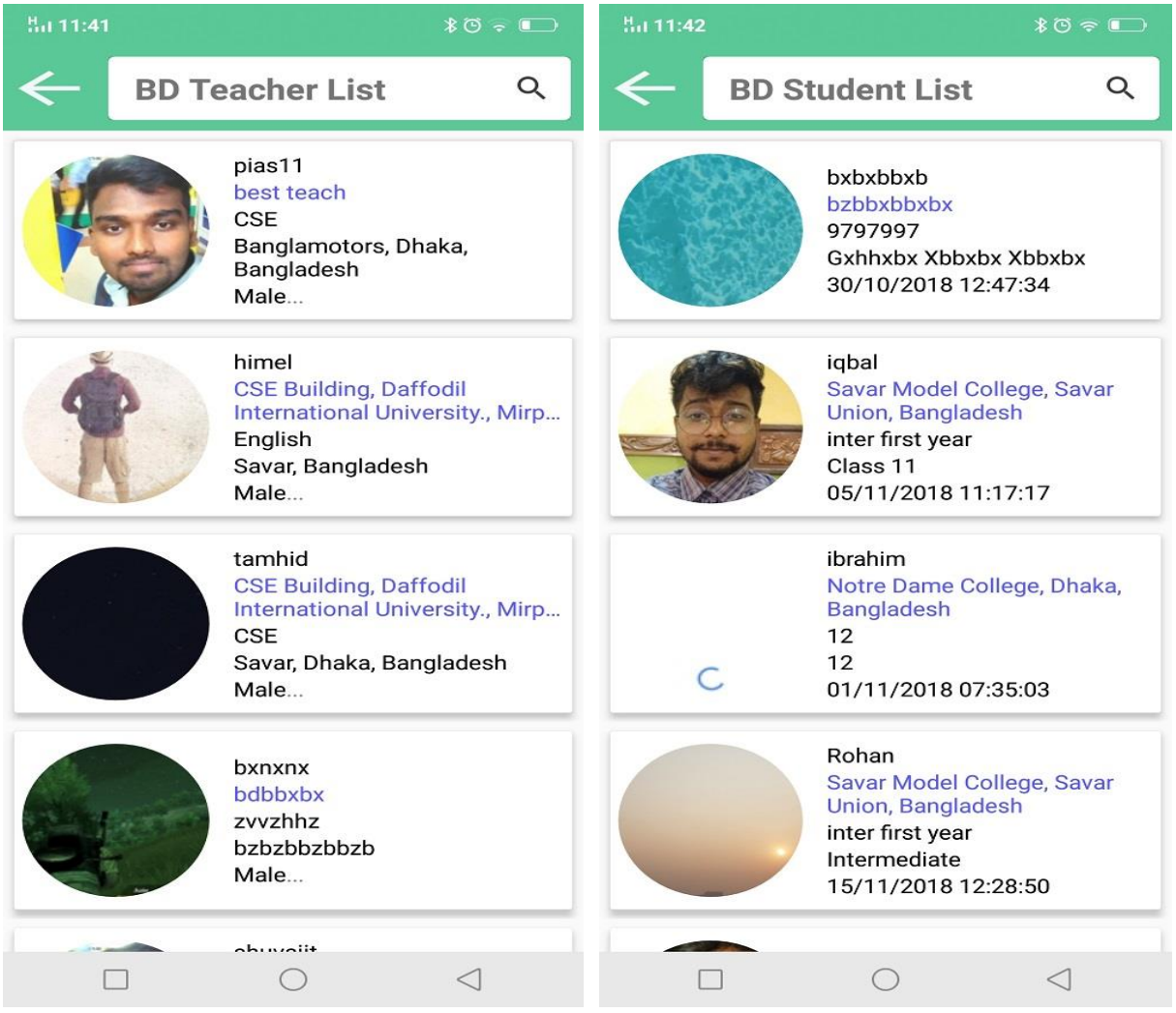


Figure 4.5.4: BD Teacher List and Student List

4.5.5: Tutor Detail Information and Comments

In the left page there have a picture with the name. A like button also is displayed in the page. After that a likes, a followers and an engaged counter has been created. A spendable tutor biography and engaged students layout will show the tutor's information and how many students has been engaged in that particular profile. A student can give email, phone and add comment to the tutor but for this user must need to engaged with the tutor. In the comment session of right page an user can add comment very easily. User can give like to a comment and it will show when the comment has been added by the user.

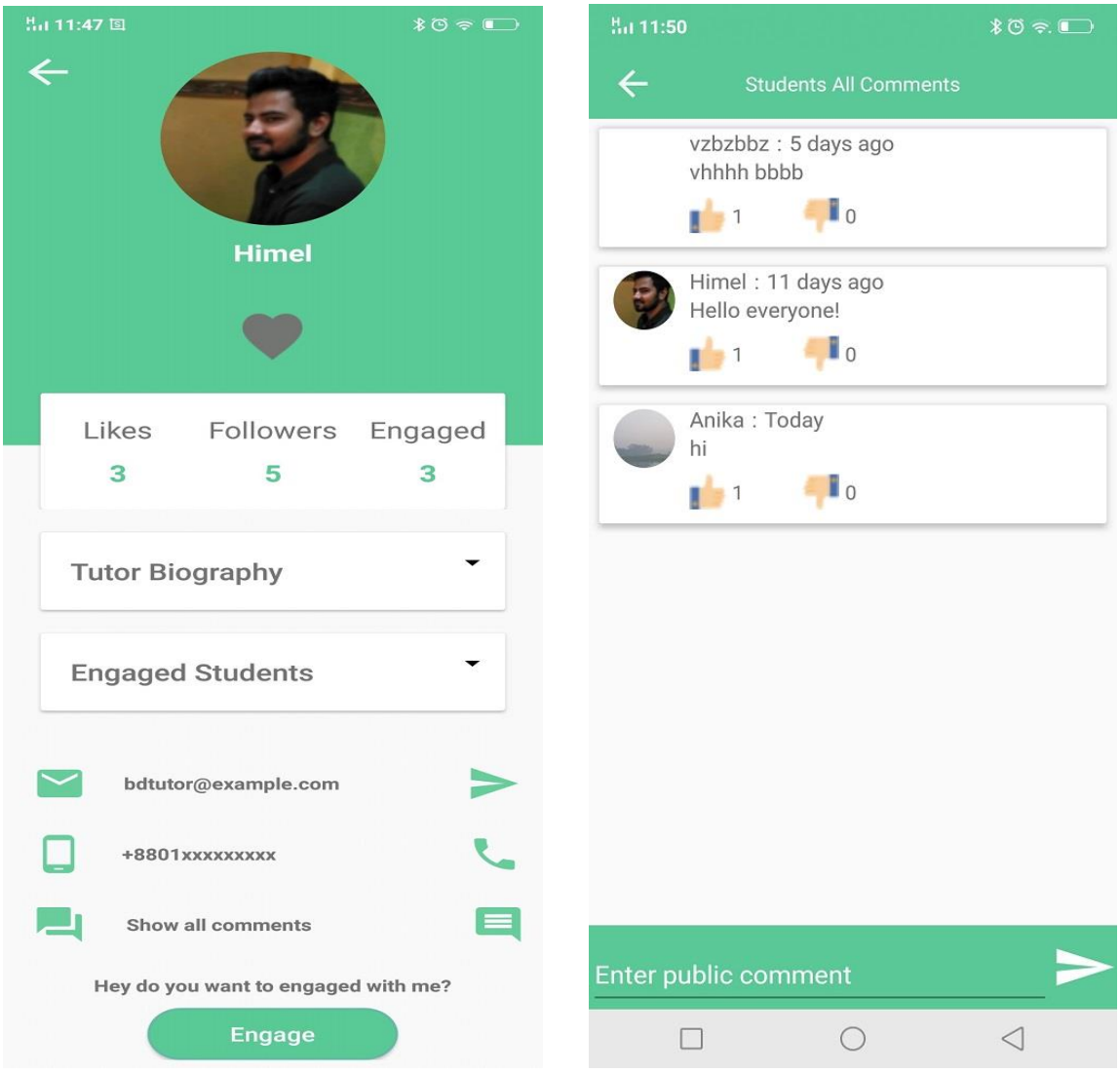


Figure 4.5.5: Tutor Detail Information and Comments

4.5.6: Tutor manage account and delete, update and logout.

In the tutor manage account at first a picture is shown then the name and location are shown. Tutor can see his likes, engaged and followers number. A spendable biography and engaged students show tutor's biography and engaged students. Upper side in the setting button tutor can use this button to update his account, to delete account and to logout from the profile**.**

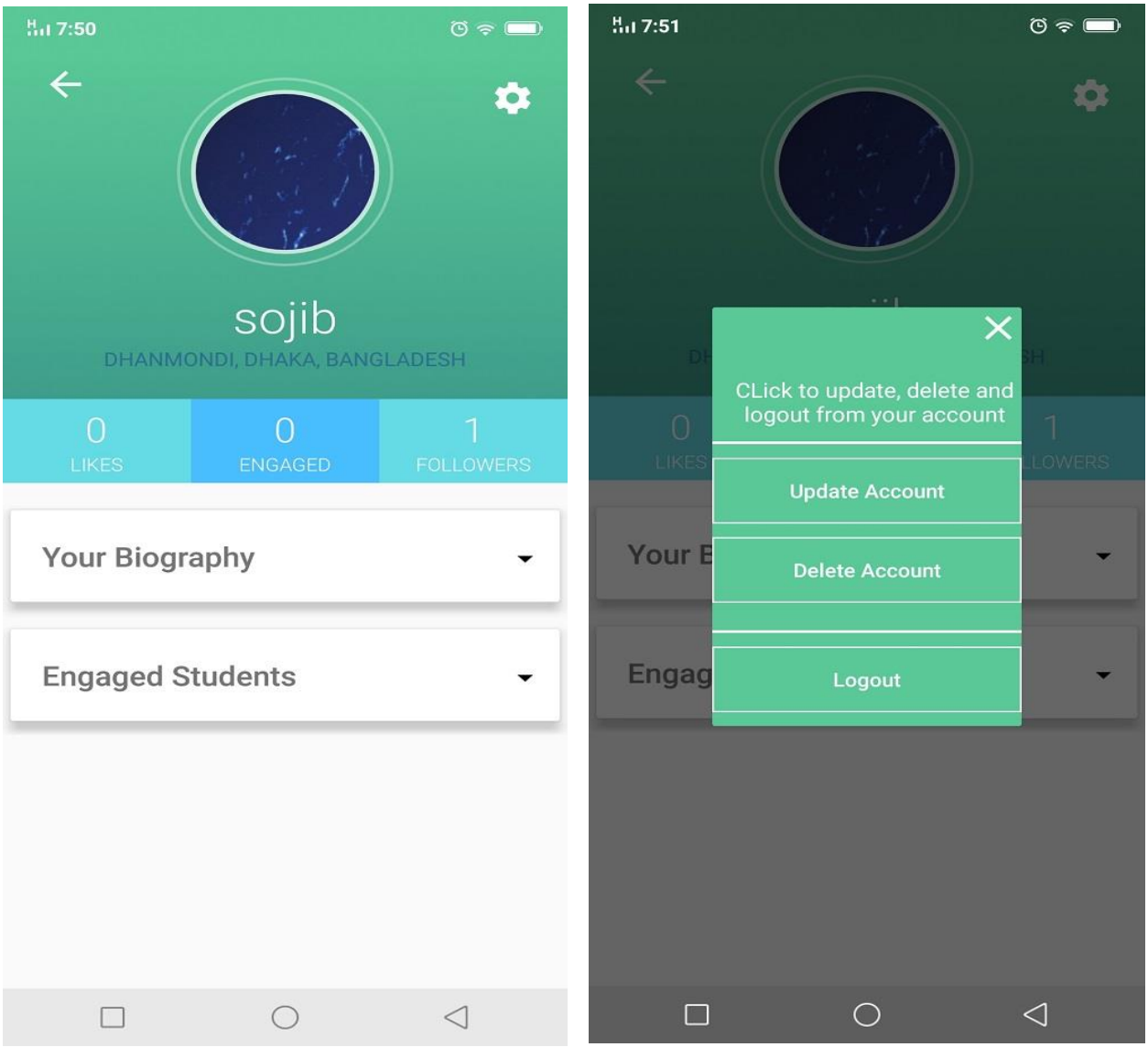


Figure 4.5.6: Tutor manage account and delete, update and logout.

4.5.7: Add Tutor Information and showing in the list.

Add tutor information uses to add a tutor's all personal information. There is a selection one spiner to one's gender. Gradually tutor needs to put tutor's age, subject name, interested area where tutor wants to teach, which class tutor wants to teach , tutor's housing number and lastly tutor's contact number. After filling all the requirement tutor will be added at BD Tutors list according to gender. If tutor is female then she will be add at female list otherwise at male list.

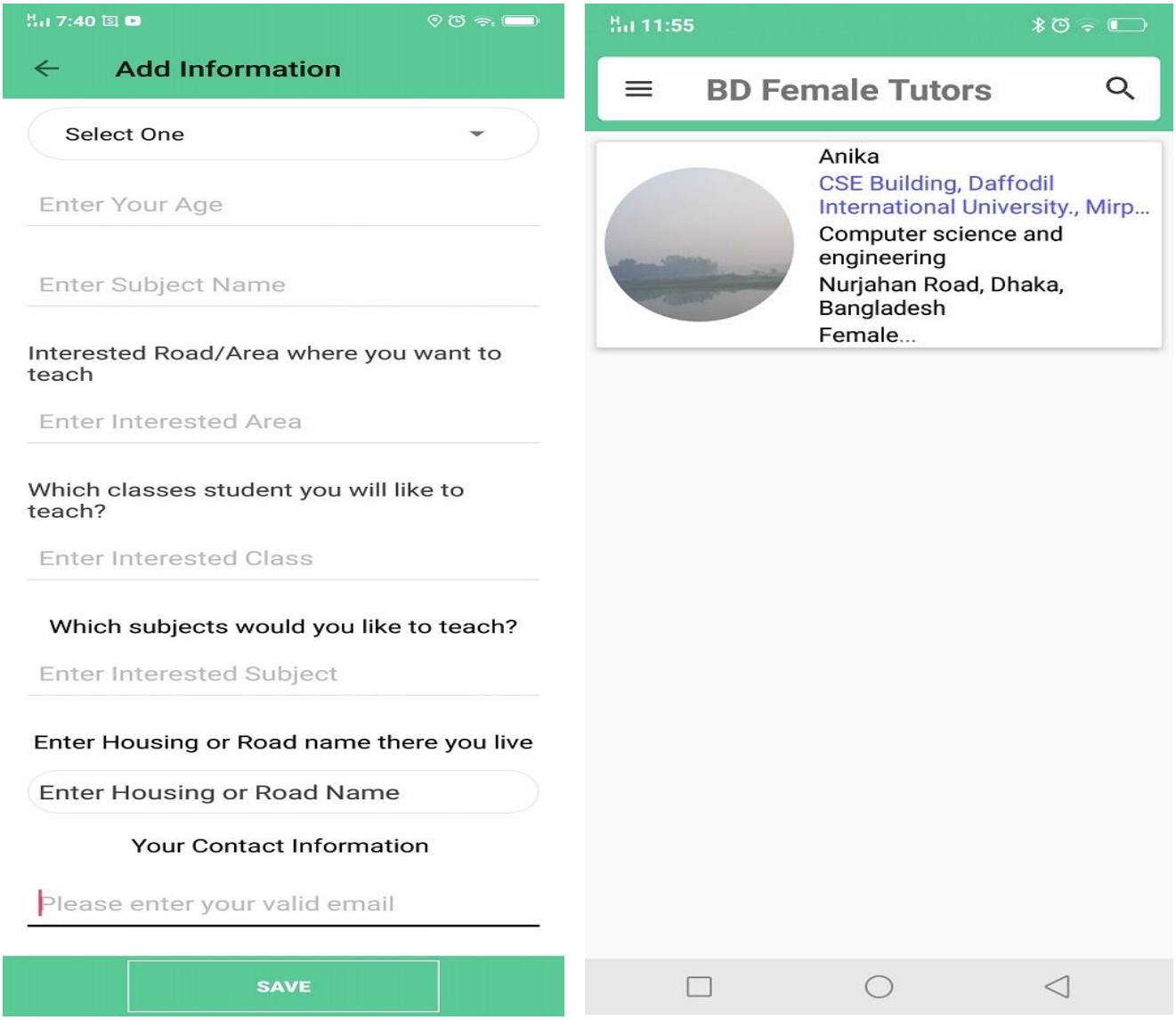


Figure 4.5.7: Add Tutor Information and showing in the list.

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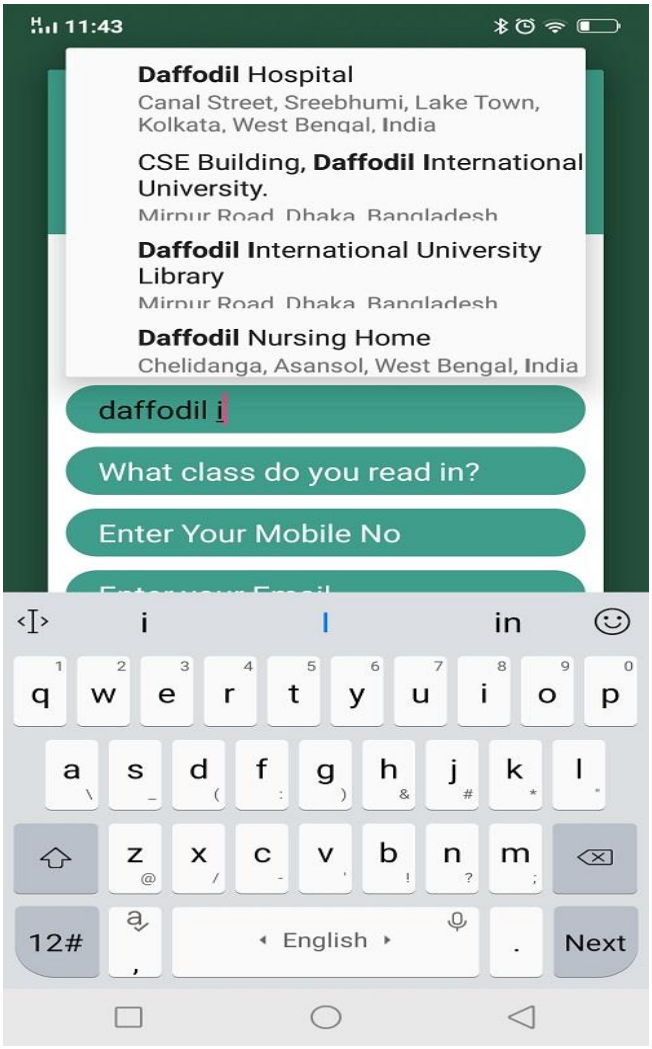
4.5.8: Autocomplete text view and Google place marker.

In the left side picture, the application is using autocomplete text view for making the application more user friendly and easy. For autocomplete text view an user don't need to write full name automatically corresponding name will appear which makes the application more appealing to user. In right side picture user can use Google place marker to detect a tutor through marker. When a tutor open a account, the application takes the location of the account and puts it on Google map. Through Google place marker an user can find his desire nearby tutor from one's current location. If user click on the marker the application takes user to that particular tutor's account.



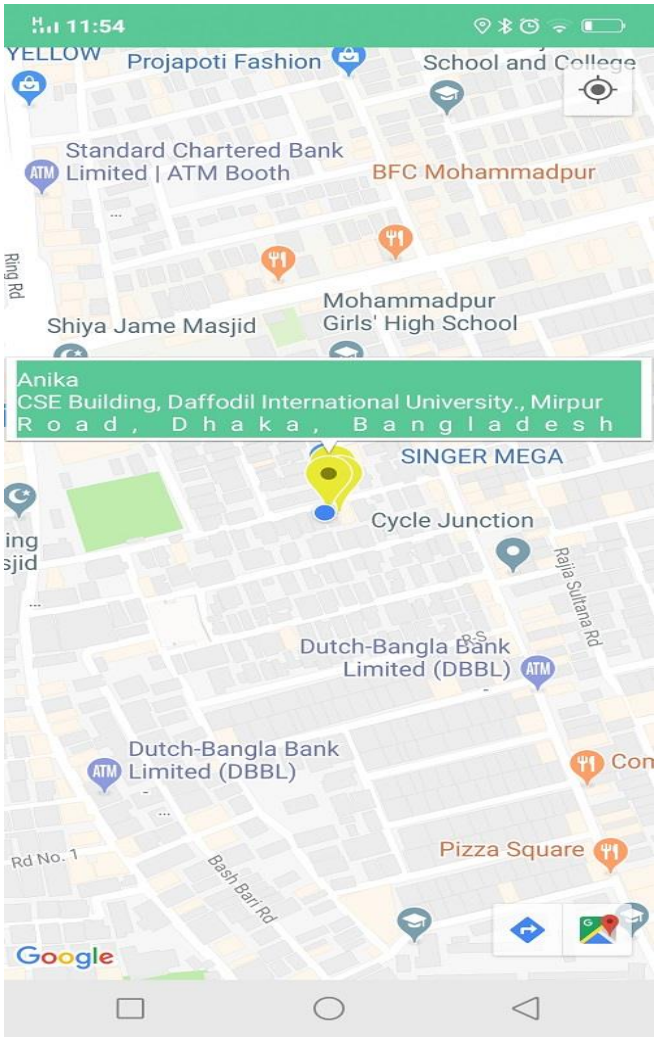


Figure 4.5.8: Autocomplete text view and Google place marker.

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4.5.9: Account Permission, Tutor Biography and Engaged students

In the account management user see one's profile picture and name. If user does any post then user can watch a like button under the name. User also can see likes, followers and engaged counter. In the right side picture, after adding post user can also see spendable biography layout and inside the spendable circler one can watch how engaged students user has.

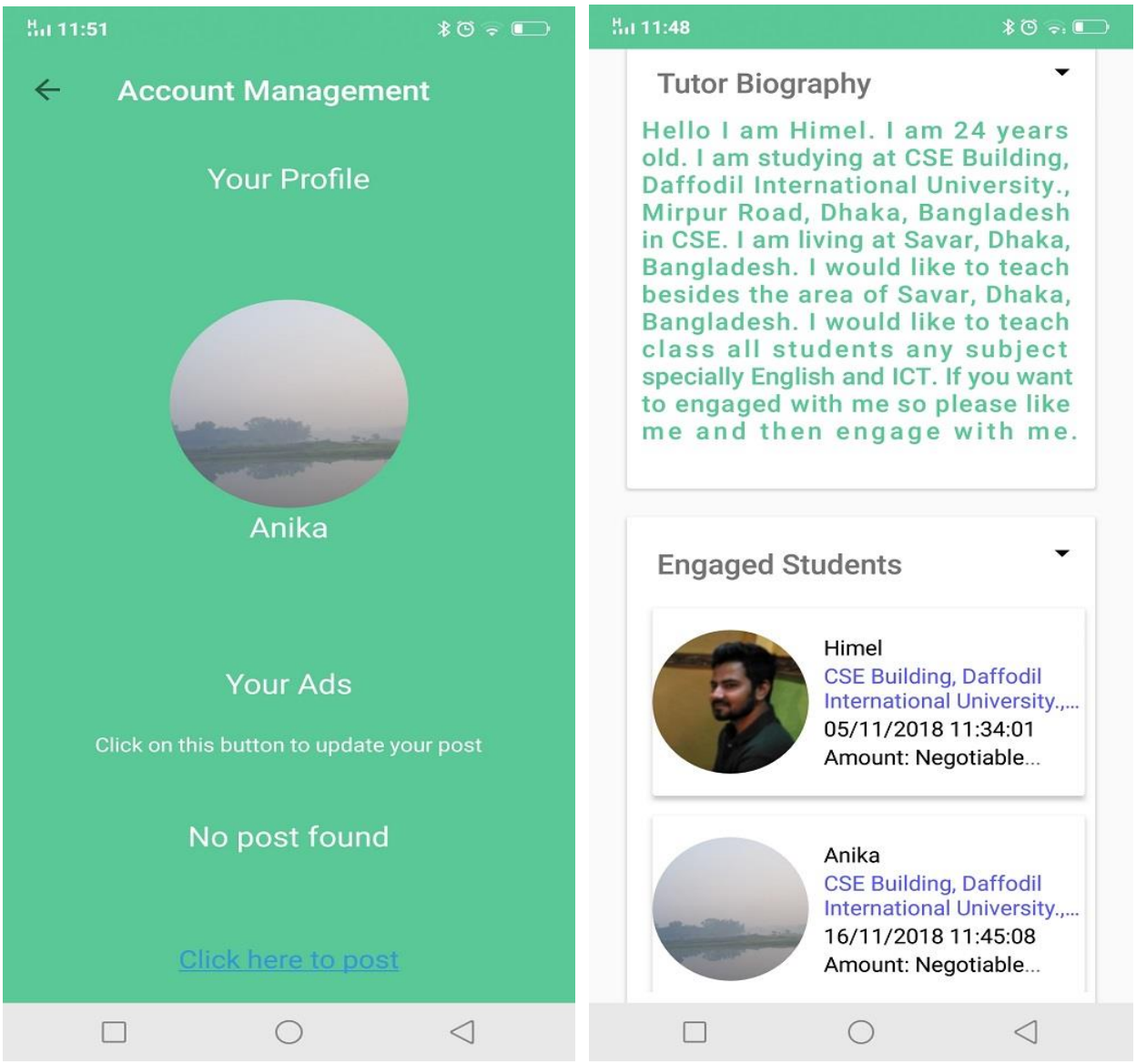
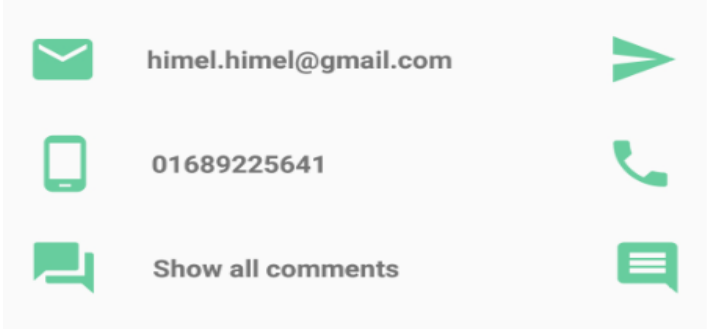


Figure 4.5.9: Account Permission, Tutor Biography and Engaged students

4.5.10 Calling

If user get engaged, a number will be shown on dialer and user can call in that number if he wants. The below figure shows the number in dialer and an ongoing call in process.



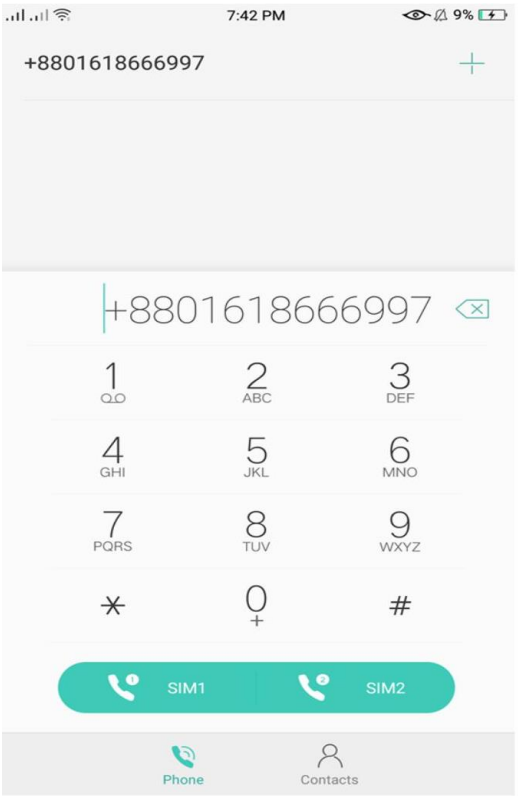


Figure 4.5.10: Calling

4.6 Design Requirements

4.6.1 Android Studio

Android Studio is the IDE (integrated development environment) for android operating system. It designed specifically for android application development. Using android studio, we developed our application.

4.6.2 Android SDK

Android SDK provides the API libraries and developer tools necessary to build, test, and debug android applications.

To develop Android application, Android SDK is the essential tool. This SDK is very comprehensive tool that contains not only the library for development, but also includes the simulator to test the application.

4.6.3 Java Development Kit (JDK)

JDK is an implementation of either one of the Java SE, Java EE or Java ME platforms.

4.6.4 Android Virtual Device (AVD)

The AVD manager provides a graphical interface which run the android application called emulator. A QEMU-based device-emulation tool that can use to debug and test applications in an actual Android run-time environment.

CHAPTER 5

Testing and Evaluation

5.1 Introduction

Chapter five is all about the test and ability of the application. How much the application is capable of doing all the deed is to very important to know.To get sure before releasing an application in the market it is needed to test. Porate chai android application has been tested by Usability Test and Unit Test. It has also showed the result of every test.

5.2 Usability Test

In usability testing basically, we as testers tests the ease with which the user interfaces can be used. It is tests that whether the application or the product built is user-friendly or not. We ran a survey among 30 users, aged between 18-35, where 20 of them were male and 10 were female. Few questions were included in this survey which had parameters to ensure the success of this survey. The pattern of the survey form with questions is given in the Appendix. The output of the survey is given below as a bar chart:

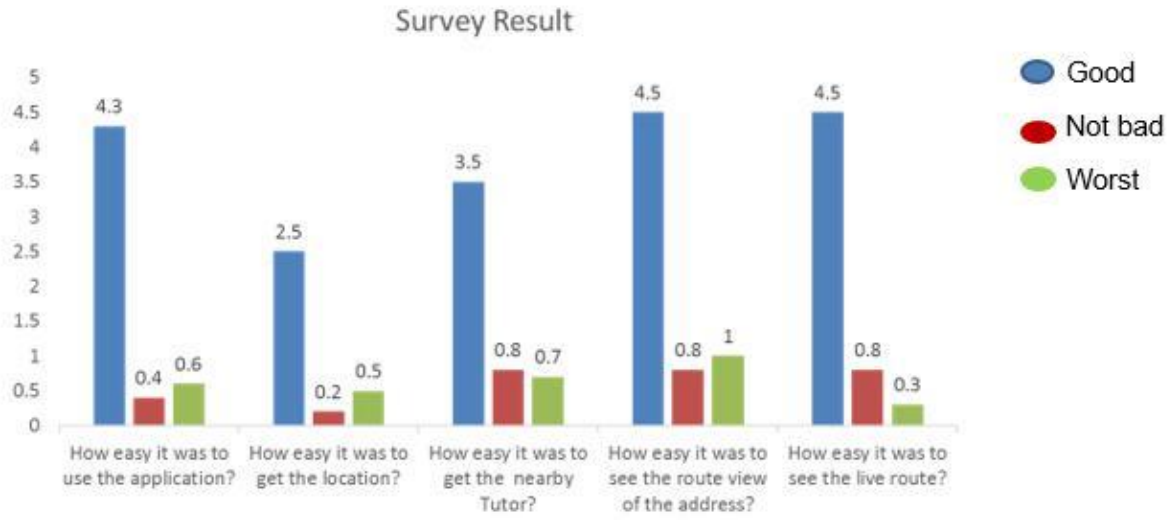


Figure: 5.1: Survey Result

So, at the end we can carry out the results as the benefits of usability testing to the end user or the leaner:

- Better quality Application.
- Application is easier to use.
- Application is more readily accepted by users.
- Shortens the information for new users.
- Better UI.
- Innovative idea for the traveling environments.

5.3 Unit Test

Unit testing is used in a details designing and implementing of a project [9]. Unit testing is a process of application development in which the smallest testable parts of an application, called units, are individually and independently tested and implemented after passing the test. Unit testing involves only those characteristics that are vital to the performance of the unit under test [9]. The Unit test was done in time of implementing the codes of this application and also upon completion of this project.

Test case is a combination of conditions or variables that will determine if a system fulfill or satisfies the requirements or not.

The results of the Unit test is shown below in Table 1:

5.4 Result of Unit Test

Table 1: Result of Unit Test

Test Case	Test Input	Expected Output	Actual Output	Result
Interface visibility	Tested on AVD	Interface are display Correctly.	Interface are Displayed Correctly.	Pass
Correct Response for each button	Tested on AVD	Display correct activity	Displayed Correctly	Pass
Click Call Button	Tested on AVD	It should make a Call	Successfully Calling	Pass
Click About Us Button	Tested on AVD	It should go About Us activity	Go successfully About Us activity	Pass
Map Zoom in & out	Tested on AVD	Should zoom in & out properly	Successfully Zoom In & Out	Pass
Click Logout Button	Tested on AVD	It should leave from account	successfully logout	Pass
Click network connectivity button	Tested on AVD	It should connect with internet	Successfully connect	Pass
Click Back Button	Tested on AVD	It should go back	Go Back Successfully	Pass

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CHAPTER 6

Conclusion and Future Work

6.1 Introduction

In this chapter the main thing to discuss is conclusion and future work. In this what is the convenient and better side, we can see. What it does. We can get an over view of our application and what can be added in the future for betterment of the application.

6.2Conclusion

Porate Chai is an android based mobile application which supports the people in their short time by providing information regarding their desired Tutor. It also provide the Google map location for all tutors and for the consequences user also can see the live Location and shortest path from the current location [11]. It also provides the information of near tutor by Google map. Therefor user can see from Google map and can also see the specific teacher details information .Using this application getting desired Tutor information will be easier than ever before.

6.3 Future Work

This application is built such way that it would cover only Bangladesh but in future we will make it updated that it can cover all over the world. And now the language of our application is English so in future we will setup language setting option so that user can setup language according to their country.

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REFERENCES

[1] Play.google.com. (2018). [online] Available at: https://play.google.com/store/apps/details?id=ht.com.housetutor [Accessed 5 Apr. 2018].

[2] Play.google.com. (2018). [online] Available at: https://play.google.com/store/apps/details?id=com.tariqulislam.tutorfinder [Accessed 5 Apr. 2018].

[3] Play.google.com. (2018). [online] Available at: https://play.google.com/store/apps/details?id=com.tutor.bdhometutor [Accessed 5 Apr. 2018].

[4] Play.google.com. (2018). [online] Available at: https://play.google.com/store/apps/details?id=com.tuitionteacher.com.tuition [Accessed 5 Apr. 2018].

[5]En.wikipedia.org. (2018). *Use case diagram*. [online] Available at: https://en.wikipedia.org/wiki/Use_case_diagram [Accessed 5 Apr. 2018].

[5] Sharma, V., Sharma, V., Sharma, A., Sharma, A., Sharma, V., Sharma, V., Sharma, V., Sharma, V., Sharma, V., Sharma, V., Sharma, A., Sharma, A., Sharma, A. and Sharma, A. (2018). *Uses of internet in our daily life - Everyday Internet*. [online] KLIENT SOLUTECH. Available at: http://www.klientsolutech.com/uses-of-internet-in-our-daily-life-everyday-internet/ [Accessed 5 Apr. 2018].

[6] Lucidchart. (2018). *What is an Entity Relationship Diagram*. [online] Available at: https://www.lucidchart.com/pages/er-diagrams [Accessed 5 Apr. 2018].

[7] Lix.polytechnique.fr. (2018). *What is Systems Architecture?*. [online] Available at: https://www.lix.polytechnique.fr/~golden/systems_architecture.html [Accessed 5 Apr. 2018].

[8] BusinessDictionary.com. (2018). *Which of your friends needs to learn this term?*. [online] Available at: http://www.businessdictionary.com/definition/motivation.html [Accessed 5 Apr. 2018].

[9] [duplicate], W. (2018). *What is unit testing and how do you do it?*. [online] Stackoverflow.com. Available at: https://stackoverflow.com/questions/652292/what-is-unit-testing-and-how-do-you-do-it [Accessed 5 Apr. 2018].

[10] Google.com. (2018). *business process model - Google Search*. [online] Available at: https://www.google.com/search?ei=FI_CWoikI8rivASt6arYDQ&q=business+process+model&oq=busi&gs_l=psyab.3.1.35i39k1l2j0i67k1l2j0l3j0i131k1l2j0.7781.8728.0.11096.4.4.0.0.0.0.166.635.0j4.4.0....0...1c.1.64.ps y-ab..0.4.631....0.XEJvgmCtlic [Accessed 5 Apr. 2018].

[11] www.tutorialspoint.com. (201*8)*. [online] Available at: https://www.tutorialspoint.com/index.htm [Accessed 5 Apr. 2018].

[12] Smartdraw.com. (2018). *Data Flow Diagram - Everything You Need to Know About DFD*. [online] Available at: https://www.smartdraw.com/data-flow-diagram/ [Accessed 5 Apr. 2018].

[13] PNMsoft. (2018). *Business Process Management Platform | BPM Software (BPMS)*. [online] Available at: http://www.pnmsoft.com/resources/bpm-tutorial/bpm/ [Accessed 5 Apr. 2

APPENDIX

Appendix A

Survey Form for application

Serial no	Query	Easy	Medium	Difficult	Very Difficult	N/A
1	How easy it was to use the application?	☐	☐	☐	☐	☐
2	How easy it was to get the All tutors?	☐	☐	☐	☐	☐
3	How easy it was to get the Individual tutor?	☐	☐	☐	☐	☐
4	How easy it was to get the nearby tutor?	☐	☐	☐	☐	☐
5	How easy it was to see the All tutor in the Google map ?	☐	☐	☐	☐	☐
6	How easy it was to see the Individual tutor comment?	☐	☐	☐	☐	☐
7	How it was to call?	☐	☐	☐	☐	☐
8	How easy it was to access the all function in the application?	☐	☐	☐	☐	☐

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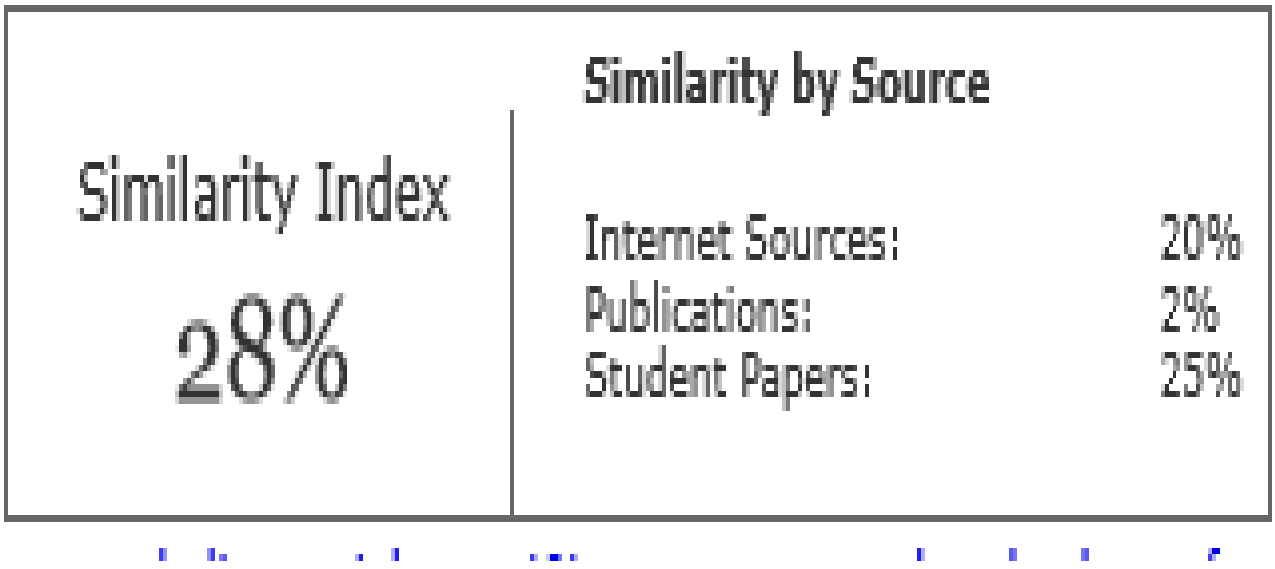
Appendix B

Plagiarism Check Report



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