# **Student Consultant Network**

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DEPARTMENT OF COMPUTER SCIENCES

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## **UNDERTAKEN**

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# **FINAL APPROVAL**

Certified that we have read this project report submitted by Mr. (Student/Students Name) and it is, in our judgment, of sufficient standard to warrant its acceptance by Department of Computer Science, COMSATS University Islamabad, Attock Campus, for the BSCS/BSSE/MSc degree.

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1.	External Examiner	(Examiner Name) Designation University Name
2.	Supervisor	(Supervisor Name) Designation
3.	Head of the Department	(HoD Name)

# **DEDICATION**

This project is dedicated to our supervisor who has helped us through thick and thin. Also, to our family members who supported us in every way possible to achieve this.

## **ACKNOWLEDGEMENT**

By the grace of Almighty Allah, who is the most gracious and most merciful, we able to complete our project. We are thankful to Allah Almighty who makes us able to complete our task timely. All praises are for Him. First of all, we would like to express a profound tribute to our parents who always motivate us and never let us down morally and financially. What we are now; only due to their prayers.

A great teacher can motivate, inspire, and ignite the imagination and love of learning, the one who is a complete institution, our trainer, our supervisor **Mr. Qasim Khan** who polished us in a way that we learn many things. We are grateful to him; he is our mentor; who guides us like a big brother and never lets us down or demoralize us. The encouragement we received from him; make us able to achieve our goal. We are grateful to our institution because they provide an opportunity for us to complete our task. Some special thanks to those who always be there for us when we need them, May Allah keep them in the shadow of his mercy.

May Allah Almighty always provides us the opportunity to help humanity in many ways? Ameen

## **PROJECT BRIEF**

PROJECT NAME STUDENT CONSULTANT

**NETWORK** 

ORGANIZATION NAME STUDENT CONSULTANTING

**NETWORK** 

**OBJECTIVE** 

• FACILITATE THE STUDENTS

TO GET ADMISSION IN

OVERSEAS UNIVERSITIES.

• PROVIDE PROPER AND UP-TO-

DATE INFORMATION TO

STUDENTS, REGARDING

UNIVERSITY SCHOLARSHIPS.

ADMISSIONS AND STAY IN

FOREIGN COUNTRIES.

• THE ADMIN OF APPLICATION

ACT AS BRIDGE BETWEEN

STUDENT AND CONSULTANT.

THE ADMIN CAN MANAGE,

DELETE AND MODIFY DATA.

• THE CONSULTANT PROVIDE

GUIDELINES TO STUDENT

ABOUT UNIVERSITIES.

• THE CONSULTANT RESPONDS

TO ALL QUERIES OF STUDENTS

USING "REAL TIME CHATTING" FEATURE OF APPLICATION.

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**COMPUTER SCIENCE** 

**CUI ATTOCK** 

STARTED ON 10/2/2020

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COMPUTER USED COR i5 4<sup>TH</sup> GENERATIONS

SOURCE LANGUAGE JAVA, XMAL

OPERATING SYSTEM WINDOWS

TOOLS USED ANDROID STUDIO, STAR UML,

**FIREBASE** 

# **ABSTRACT**

"The Student Consultant Network" is an android based app. Our application aims to provide a platform where students can get necessary information regarding admission procedure and time-bound scholarships in a foreign institution as per their qualification and financial standing.

Furthermore, students can also contact top-notch consultant firms, enlisted on the App, to guide them along with their endeavor.

Our project base on the android application, through which the students can find the universities for their higher education abroad. The main purpose of this application is to provide the platform for the students of Pakistan to get the latest information about scholarships in abroad universities according to their eligibility. Through this application, Students can also communicate with the consultant to make a perfect decision for their future.

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# CHAPTER 1 INTRODUCTION

## 1.1 Introduction

During this era, most of the brilliant students want to study in the world one of the best universities in the world. The most efficient way to secure an admission in a foreign university is to hire a consultant. They have valuable knowledge and vast experience to facilitate the tedious process of student migration. However, in this era, a good consultant firm is hard to find. The elite firms are located in major urban centers' s--Islamabad, Peshawar, Karachi, etc.-- and a huge amount of money and time is lost in traveling to and residing in them.

Apart from this, students are also vulnerable to get duped into paying a huge sum of money to sly consultants. It is easy to swindle them into paying exorbitant charges when students are utterly ignorant about the admission and immigration procedure.

Our project is designed in such a way that it would act like an virtual consultant for only those students who want to pursue an education in foreign universities, especially higher education.

Our android-based application will provide a suggestion, based on the input data, for the high ranked universities. So that student can easily decide where he/she should pursue their higher education. After the successful decision regarding institute, a student can be facilitated with list scholarships for whom he/she is eligible. Plus, if they want to, the application will connect students to top consultant firms that always available for them to provide guidance. So that students can get all the necessary information, about the expense of traveling, residential, fee structure, and many more, from the consultant.

#### 1.2 Problem Statement

As we know the getting higher education in the top-ranked or high named universities is the dream of every brilliant student. To get admission to overseas universities a student should have a vast knowledge about the process of traveling, the process of admission, how to get residential, and many more.

However in this era, student contact with a good consultant and get every value able information from traveling to securing admission to foreign universities. But finding a good consultant is still a painstaking process for many students.

If any student finds a consultant then may he/she can face such problems likes traveling to the consultant office once a week. Students can also have to wait for a consultant response and many more, that cost student's money and time.

During the present period of technology, many android applications have been developed that facilitate students like a virtual consultant, but no such android application has been developed yet that provides valuable information to the student regarding their qualifications about top niched universities and also the available scholarships in these universities. Also in this era, in many android applications, a person can register his\herself as a student or consultant that increases the chances of the fake appearance of the personality that can cause the time and money-wasting of a student or a consultant.

## 1.3 Proposed Solution

Education is the most important thing for a student but to get from the best schools, colleges or universities is much important. To overcome all the problems that we have mention above, we come with a bitter solution in the form of an android application. We have developed our android application "Student Consultancy Network" in such a way whose priority is to serve a student according to their needs. Our application provides a platform where a student can easily get the major information about the foreign universities so that they can secure the admission by knowing the way.

The basic information of the student like qualification can be collected by filling up a form. This information can further be used to provide a list of best universities and scholarships so he can make the best decision about studying in foreign countries.

Also in this android application students can be communicated with an active consultant for more information about expenses by getting admission to the foreign countries for studies.

## 1.4 Objectives of Project

- For the authentication, the student or consultant should have to register his/her self into the application by Sign Up.
- Students or consultants have to create a profile with basic information like educational history as well as experience letters and awards (if any).

- On the behalf profile, the student has to choose a University, and scholarships form the list.
- Students can upload necessary documents like Passport, Last degree/transcript, IELTS, etc. for the authentication process.
- We can also provide the platform to online chat after the authentication of the student, where the student can get information on the spot based on current visa/admission criteria.
- After all information/data entry in the software consultant will summarize and respond accordingly.

## 1.5 Description Layout

Nowadays, the needs of the people are changed. To overcome this problem, we are providing them a platform where they will be able to put their views. Through this android base application students can get the list of recommended colleges and universities over the world according to their grades and score in IELTS / TOEFL. Students can also easily communicate with the consultant. Through this app, the student can upload their documents related to the requirements of the consultant, so the consultant can never make a call for the student to visit the office again and again. The main scope of this application is to provide the free of cost information of the colleges and universities with the list of scholarship. Where just the student will discuss all the information with the parents/guardian and finalize the option as he gets from the software and will arrange a final meeting in the consultant office.

## 1.6 Software Dependencies Requirements

- The latest version of Android Studio SDK.
- Java SDK and language for the backend.
- XML for front end
- Star UML, MS Visio
- Firebase Database.

# CHAPTER 2 Literature View

#### 2.1 Literature Review

As in the increase of technology in the current era, much android application has been developed that ease the students to get relevant information related to a foreign university and also become an ease for the consultants to manage to respond to different students as soon as possible.

Android applications like Study Abroad, MEE-Study Abroad, Study Abroad overseas education, EDAPT, Yocket provide many functionalities but some functionalities of these android applications are not that good to become a useful hand for any student who wants to study in abroad. Our purpose application will cover most of the features that cannot be found by the above mention applications.

## 2.2 Existing Application

## 2.2.1 Study Aboard

This application is being developed for the students of Pakistan to get knowledge about the world's best universities. Also, the application is useful for the people who provide consultant services in Pakistan for the students.

#### **Feature**

- By filling up an inquiry form to seek guidance about the universities forms the consultant.
- List of the university provides to students.
- Application enlist the scholarships for the student.

#### Comparison

In the study aboard app students and consultants register their selves without authentication whereas our application is fully authentic so no fake appearance will cause the wastage of time of students and also a consultant.

The list of universities and scholarships that is given by the study aboard application is not based on the qualification of students and consultant whereas in our application students only get the list of university and scholarship's for which he/she are eligible.

## 2.2.2 MME-Study Abroad

A student can experience different universities around the world with the help of the MME study abroad application. This application provides the search option to the students so he/she will find and select the universities according to their interest.

#### **Features**

- The application provides a large array of universities in the range from 3000 universities to 100,000 courses across 45 countries around the globe.
- Provide a list of eligible universities for the students.
- Connect with universities and counselors with a click of a button

#### Comparison

This application was only capable of providing a large array of universities which is much difficult for the student to search the relevant university according to their interest. But in our application student can get only those list of universities which he/she are capable of.

### 2.2.3 Study abroad-overseas education application

Study abroad-overseas education application help to find the top universities, school, and collages in certain countries. Also, this application facilitates students by giving the option of browsing the choice of country and explore the universities in the browsed country.

#### **Feature**

- Provide the top universities list.
- Specific to certain countries like Australia, Brazil, Canada, Germany, Spain, France, Italy, Japan, Mexico, Netherlands, Sweden, USA, China, UK, Russia.
- Option to browse the universities.

#### **Comparison**

As our application provides a list of universities for which the student is eligible and also gives the list of scholarships in such of the university. Whereas Study abroad-overseas education application just provides a specific list of universities without any criteria.

## 2.2.4 Yocket - Study in the US, Canada, UK, Germany

This application is for those students who want to study Bachelors' MBA, MS, or Ph.D. courses in overseas universities. It provides a better environment through which students can help one another. Also through this application students can get help from the Yocketer to discuss their plans.

#### **Feature**

- Admission information in different programs
- Communication area where students talk to one and another and with Yocketer.

#### Comparison

The application didn't have the feature where it guides the students about the scholarships and also didn't call for authentication by uploading the necessary documents.

## 2.2.5 EDAPT - Discover, Connect & Study Abroad

This application provides the free collection of scholarships that make this application as a scholarship application. Through this application, students can get an updated list of scholarships in too many countries. Also, inform the student about the admission process in different universities.

#### **Feature**

- Provide the list of scholarships
- Updates about scholarships
- Process of admission information
- Information on how to apply in various scholarships.

#### Comparison

The main difference between our application and this application is that this application is only about the scholarship whereas our application provides information about universities plus scholarships and a communication factor with the top-rated consultant.

# CHAPTER 3 SYSTEM REQUIRMENTS SPECIFICATIONS

## 3.1 Requirements

The process of gathering the requirements from the users and describe these requirements in the well suitable form in any document so it can be used later in the project is known as the requirements specifications of the documents. Namely, the requirements for any system or project may be functional and non-functional. User may need specific hardware or software which lies in the hardware requirements and also software requirements.

Before going to develop any system: the user may want to know the scope and precision of the system which easily deviates from the system requirements specification in the light of expression of the user requirements. During the contract negotiations, the system requirements specification may be utilized and also after the system purchase, with the highly constrained to meet the desire need of the contractor that has been agreed to accept.

The non-functional requirements for our system as follow:

## 3.2 Non-Functional Requirements

To perform a certain functions we define its non-functional requirements that specify how this system works. On functional requirements describe how a system behaves and what limits there are on its functionality. On functional requirements specify the system quality characteristics and attributes. There are following some non-functional requirements of our web system.

## 3.2.1 Availability

In terms of availability, our application is fully responsible for the users if they have stable internet connections.

Authentication is a must every time the user gets login; or signup if the user is new and then the user can be login by providing a valid email or password.

## **3.2.2** Easy to Use

Due to the user-friendly environment, the app will be easily understandable by the user and enables the user to use it without any difficulty.

#### 3.2.3 Performance

The app will be able to handle a large number of users at a time and give a quick response to them as well.

## 3.2.4 Accuracy

The app will work accurately and can be helpful for a large number of users.

## 3.2.5 Compatibility

The term compatibility refers to anything that interacts with suitable environments. Our application is only compatible with android technology and cannot function with IOS or Windows technology.

## 3.2.6 Reliability

In terms of reliability, our application is much reliable for students and students will be facilitated with the correct information about universities and scholarships regarding their grades.

## 3.3 Hardware and software requirement

For any system requirements related to hardware or software's is very important because the developer of the system must be aware of the hardware specification of the system which he/she is going to develop and also awareness about the tool which is the helping hands for the developer. Most of the time it has been specifying the contractor or the stakeholder of the system.

Hardware and software specification related to our applications are the following:

## 3.3.1 Hardware specification:

- Smartphones related to android technology:
- RAM of smartphone minimum 2GB
- 5 to 10 MB internal space in the smartphones must be available
- A customary processor of the smartphone
- Any internet technology Wi-Fi OR Mobile data

#### 3.3.2 Software specification:

- The latest version of Android Studio SDK.
- Java SDK and language for the backend.
- XML for front end
- Star UML, MS Visio
- Firebase Database.

## 3.4 Functional Requirements

The specific features or functionality that is defined by its stakeholders that must be performed by an application or system are known as the functional requirements of the application or the system. Our application is specially designed for those students who dream to complete their higher educations from overseas schools, colleges, and universities. The namely functional requirements of this application are the following:

## **3.4.1 Sign Up**

Table 3. 1 Signing up

Use case Name	Sign up
Priority	Mandatory
Trigger	When students or consultants interacting first
	time with the application only.
Precondition	Signed out
Basic Path	Application Startup view

First of all, if any students and consultants are new to this application then they have to first register themselves by filling up a simple form so they can facilitate themselves with the different features and functionalities of the application.

## **3.4.2** Sign In

Table 3. 2 Signing In

Use case Name	Sign in
Priority	Mandatory
Trigger	The first time and then anytime the
	user/consultant wants.
Precondition	Settings →Start-up Profile
Post condition	Signed out
Basic Path	Application Startup view
Exception Path	None

After the successful registration by signing up for this application now students/consultants can easily log in to the application using a valid and unique email address and password. If the

students or any consultant didn't register themselves self then they have to sign up first to get access to the functionalities of the application. The user has must have a stable internet connection otherwise the application will not be working.

#### 3.4.3 Profile Creation

**Table 3. 3 Profile Creation** 

Use case Name	Profile Creation
Priority	Mandatory
Trigger	After the successful registration of the users.
Precondition	Sign in → profile Creation
post condition	Signed out
Basic Path	After the login view
Exception Path	None

Once the users log in to the application then the next activity they do in the application is to create a profile. Both the student and consultant have to fill's up a form with certain requirements. To facilitate further both have to full fill all the requirements that are asked in this activity.

#### 3.4.4 Recommended list of Universities

Table 3. 4 Recommended list of Universities

Use case Name	Recommended list of Universities
Priority	Mandatory
Trigger	After the successful profile creation of students
Precondition	Profile Creation → Recommended list of universities
post condition	Profile creation\sign out
Basic Path	After profile creation
Exception Path	None

This application is helping out the students to make valuable decisions regarding their studies in foreign universities. This activity specially designs for only students where students get the list

of universities regarding their profile, which they build in the previous activity. Here the student will know about the best universities for which he capable and select one from it.

## 3.4.5 Recommended list of Scholarships

Table 3. 5 Recommended list of Scholarship

Use case Name	Recommended list of Scholarships
Priority	Mandatory
Trigger	After the successful selection of university by
	the students
Precondition	Recommended list of universities →
	Recommended list of scholarships
post condition	Profile creation\sign out
Basic Path	After the selection of universities
Exception Path	None

After facilitating by the list of universities now a user has the list of scholarships for which he is fully capable. Here the student has to mark the scholarships from the list. This selection tells the students about the scholarships through which they know that certain scholarships are only available for them.

## **3.4.6** Uploading the necessary documents

Table 3. 6 Documents upload action

Use case Name	Documents upload action
Priority	Mandatory
Trigger	After the successful selection of scholarship
	by the students
Precondition	Recommended list of scholarships →
	Documents upload action
post condition	Profile creation\sign out
Basic Path	After the selection of scholarships
Exception Path	None

For the authentication of the student, this activity is very important. Here the consultant can verify the student personality by cross-matching the documents with its profile that he\she created in the profile creation selection.

## 3.4.7 Communication

**Table 3. 7 Communication** 

Use case Name	Communication
Priority	Mandatory
Trigger	After successfully uploading the documents
	by the students
Precondition	Documents upload action → communication
post condition	sign out
Basic Path	After uploading the documents
Exception Path	None

This application can provide the students to communicate with a top-rated consultant. Students can further guide by the consultants about how to get the desired university for whom he/she did all the necessary things throughout this application.

# CHAPTER 4 PROJECT DESIGN

## 4.1 Project Design

A process where the structure of the system and important deliverable have to planed out is known as Project Design. As the design for anything must provide accuracy and consistency so that the system works properly. The design of the project helps out the risk that maybe occur during the development phase.

So in this chapter, we will describe the design of the system which will increase the understandability of the project.

## 4.2 Methodology

The methodology of software development is a process, which helps to develop a system in a well-structured and controlled manner. "Software Model development" methodology is used, to avoid the risk of failure of the project, to make sure that the system being developed that much flexible to accept the change in requirements and help to develop the system on time.

## 4.3 Use Case Diagram

The use case diagram is used when we have to represent the requirement of the system. To describe the workflow of a system or a project the use-case approach, in this case, proves much realistic and unambiguous and also helps to clearly define the aims and actions of any users. This diagram also helpful in the presenting of interaction between different actors and use-cases.

## 4.3.1 Admin Use Case Diagram

The figure below shows the use case diagram of an admin of the project.

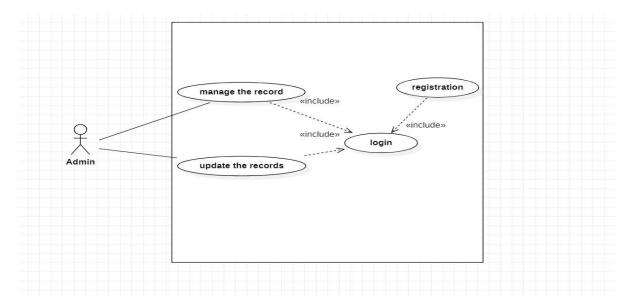


Figure 4. 1 Use case diagram of Admin

#### **Admin Use Case Description**

#### Login

Admin login into system through his email and password.

#### Manage the records

Admin can manage the records of the users.

#### Update the records

Admin can view and if any change has to update then admin can also do it for the users.

#### Registration

An admin must be registered only by admin. There is no sign-up process for the admin.

## 4.3.2 Student Use Case Diagram

The figure below shows the use case diagram of a Student of the project.

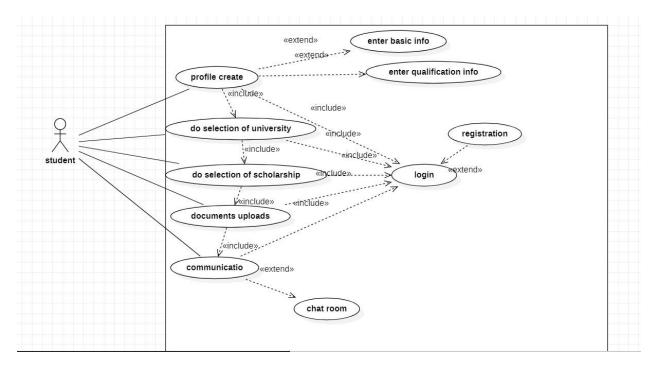


Figure 4. 2 Use case diagram of Student

## **Student Use Case Description**

#### Login

Verification is necessary for login.

### Sign up

A student has to signs up to become a member of the system.

#### **Profile create**

Students have created his profile with the information related to him and about his qualification.

#### **Select the university**

Students have to mark one of the university after the profile creation so that he can move to the next action.

#### **Select the Scholarship**

Students have to mark one of the scholarships after the selection of university so that he can move to the next action.

#### **Documents Upload**

Students have to upload his required documents to verify the student's interest.

#### Communication

After the verification of the student has elected to seek help or knowledge further from the top consultants.

## **4.3.3** Consultant Use Case Diagram

The following diagram shows the use case of the consultant.

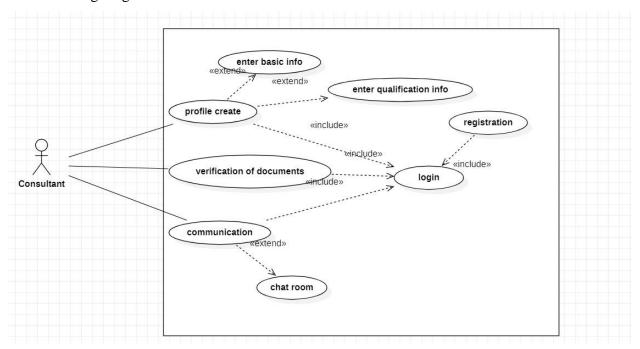


Figure 4. 3 Use case diagram of Consultant

## **Consultant Use Case Description**

#### Login

Verification is necessary for login.

#### Sign up

The consultant has to signs up to become a member of the system.

#### Profile create

The consultant has created his profile with the information related to him and about his qualification.

#### **Verification of Documents**

The consultant has to verify the uploaded documents of the student and for the authentication.

#### Communication

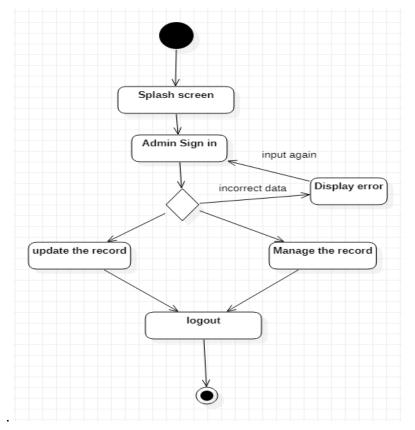
After the verification of the student documents, the consultant can invite the student to a chat room where they can discuss the terms and conditions.

## 4.4 Activity Diagram

To show the flow of activities in the system, the activity diagram is much useful in this case. Major activities can be represented as the operation of the system in the activity diagram. It is a much familiar diagram with a flowchart diagram. In the activity diagram, the major and dynamic features or action of the system is described.

## 4.4.1 Admin Activity diagram

The below diagram shows the activity diagram of the Admin.



#### Figure 4. 4 Activity diagram of admin

#### **Admin Activity Diagram Description**

Firstly admin can be login to the application using his email and password. In case of wrong input, the admin has an error message and is bound to reenter the requirements again. After the successful login into the application now admin can manage the record of students or consultants or can delete the record if it is not valid for the application.

## 4.4.2 Student Activity diagram

The below diagram shows the activity diagram of the Student.

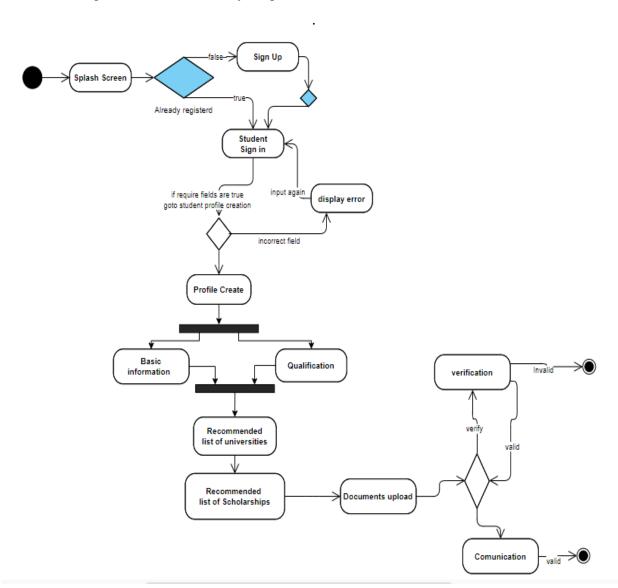


Figure 4. 5 Activity diagram of student

#### **Student Activity Diagram Description**

Firstly students can be login to the application using his email and password. In the case of invalid input, the students have an error message and are bound to reenter the requirements again. After the successful login into the application now the student can build his profile by inputting the data in the form. After that, the student can get the list of universities from which he/she has to select one from it. Then students have to mark a scholarship from the list of scholarship section. Then students have to upload to the documents for the verification and if the student is authentic then he/she can approach the consultant.

## 4.4.3 Consultant Activity diagram

The below diagram shows the activity diagram of the Consultant.

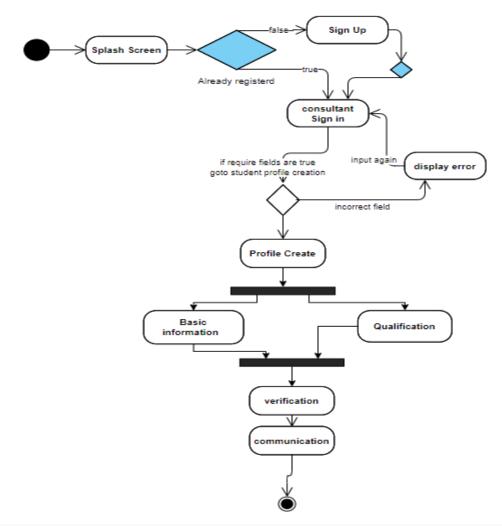


Figure 4. 6 Activity diagram of Consultant

#### **Student Activity Diagram Description**

Firstly students can be login to the application using his email and password. In the case of invalid input, the students have an error message and are bound to reenter the requirements again. After the successful login into the application now the student can build his profile by inputting the data in the form. After that, the student can get the list of universities from which he/she has to select one from it. Then students have to mark a scholarship from the list of scholarship section. Then students have to upload to the documents for the verification and if the student is authentic then he/she can approach the consultant.

#### 4.5 Class Diagram

A class diagram uses to represent the different operations or functionalities perform by the classes. The below diagram is the class diagram for this application that shows the relationship between the classes, attribute, and their operations.

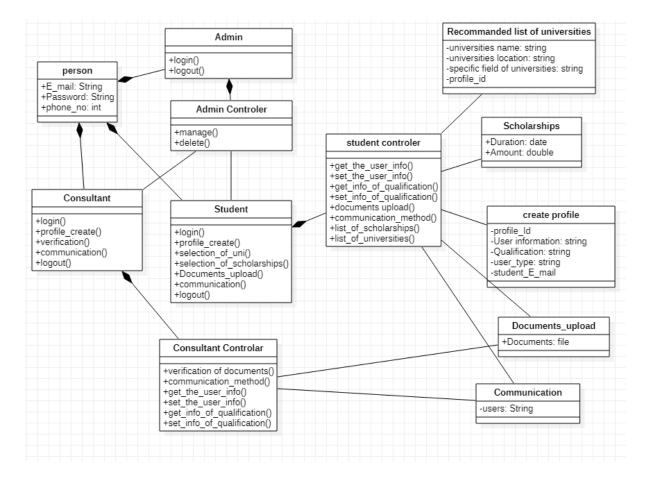


Figure 4.7 Class diagram

# CHAPTER 5 IMPLEMENTATION

#### 5.1 Implementation

Any ideal software is being useful or we can say that worthy until they physical exists. So any idea or thought related to any software get their physical existence when they Implemented by developers. So the desire application or software is being produce after the successful implementation of ideas ad thoughts. In the phase of implementation the Developers make a conceptual model of an idea by writing the source code.

#### 5.2 Technologies and Tools

- Firebase Database
- Android Studios 3.3.3

#### **5.3** Software and Hardware Requirements

- **Operating system:** Android Kit Kat (4.4)
- Languages: Java, XML
- Intel ® Core TM i5 4th generation
- Android Mobile phone with Minimum Kit Kat 4.4 version OS

#### **5.4** User Interface

There are Screen shot of application user interface as follow

#### **5.4.1** Splash Screen

The first screen short of application is shown in the figure 5.1 which is called the "splash screen". When we first run the application on our android device we firstly see the splash Screen which show the logo and within a few second our screen move towards the main activity screen of our android application which is a login panel for students, consultant and admin.



Figure 5. 1 Splash Screen

### **5.4.2** Sign In

In the login screen here students and consultants or admin login too the applications using the email and password upon which they created their accounts.

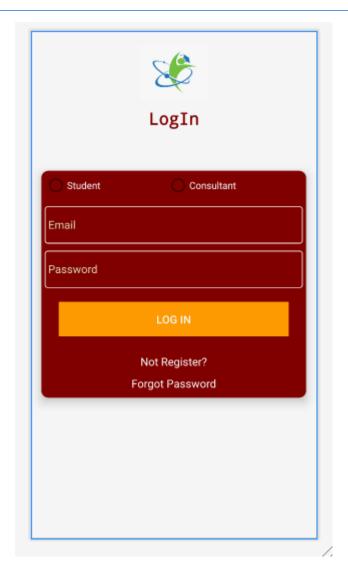


Figure 5. 2 Sign In

#### **5.4.3** Sign Up

So if the Students, consultant are new to the application they have to register as a user of the application. Here they have to fill up some information such as name, mobile number, valid email address, and passwords.

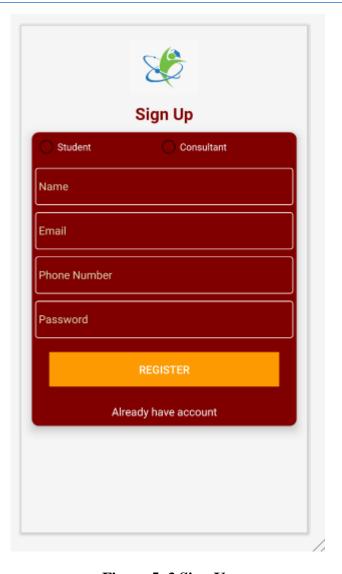


Figure 5. 3 Sign Up

#### **5.4.4 Profile Creation**

Below screenshot of the application represent the profile creation. Where the students and consultant who are new to application have built their profile by providing relevant information about them. Figure 5.4 shows that the students profile activity and Figure 5.5 shows the profile creation of the consultants.



Figure 5. 4 Profile Creation

#### 5.4.5 Recommended list University

In the Figure 5.6 represent the activity of recommended list University. Which shows the list of 10 universities with their name and locations that's is based on the information of student's profile. Student have to make a selection from the list.



Figure 5. 5 List of Universities

#### **5.4.6 Recommended list Scholarships**

In the Figure 5.7 represent the activity of recommended list of scholarships. Which provide the information to the students of scholarships of marked University by them.



Figure 5. 6 List of Scholarships

#### **5.4.7 Documents Uploads**

After the successful selection of the universities and scholarships within that universities now student have to upload necessary document in the "Documents uploads" activity that have been required by the consultant. This activity is perform by the students because to get surety about

the student that he or she have fully interested to get the admission in the foreign universities.



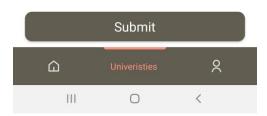


Figure 5. 7 Documents Upload

#### **5.4.8** Communication

The activity of communication is take place when a student is verify by consultant. Now both can talk with one another and discuss further terms and conditions.

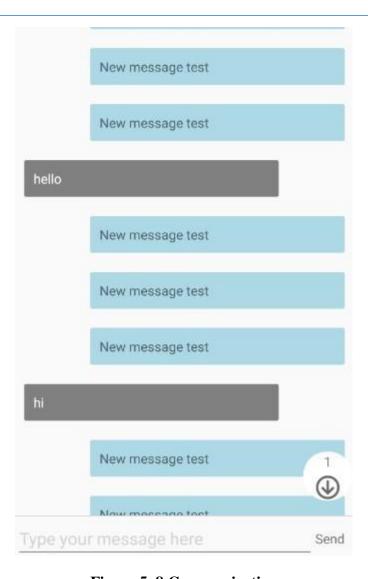


Figure 5. 8 Communication

#### **5.4.9** Admin Home Activity

Below screenshot shows the home activity of the admin. Here admin can see list of the students who are member of this application and also the list of consultant that applied for the membership. Admin can manage the changes that has been requested by the students or consultant.

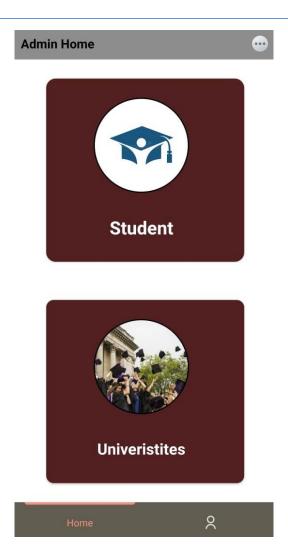


Figure 5. 9 Admin Home

## CHAPTER 6 EVALUATION AND TESTING

#### **6.1** Evaluation

To check whether the project meets or fulfill the desires requirements or not, the evaluation take place. Once the project is fully completed or developed, we applied the testing to make sure that the project meets the aim or desire functionality of users or for being its creation. Once the testing and evaluation phase successfully done then developer of the project can say that the project is free from errors. Evaluation is useful for the ongoing success of the project and for the future work as well.

#### 6.2 Testing

When the application or any software is fully developed then a process is perform which can identify any errors or any missing requirements that process is called a software testing. So testing any software is compulsory because for build an authentic, or highly quality and well define performance software that satisfy all the specific requirements of end users with having no bugs or any errors.

#### **6.3** Types of Testing

#### **6.3.1** Unit testing of modules

A software is being built in the various units or module. So the unit test that are perform on application or software is all about its codes testing of its units one by one. As all the activities of the software or application are linked with one and other we can easily check the flow of code with the help of unit testing. Most of the time the unit testing are often automatic but can also be done arduously. So all the units in this testing is well check to provide the result is every module is working perfectly or not.

#### **6.3.2** Function testing

Function testing is all about to check the functionalities of the applications is they are working reliably or not. We perform all the testing of the application functionality that helps to focus on the best possible way to make all our application working plans pacific and fascinating. So in order to check the functionalities of the software application we can do this by manually checking or automatically.

#### **6.3.3** System testing

System testing of software is achieved on a complete unified system to determine the settlement of the system with its agreed specifications. So to perform the system testing we did not have to gain the knowledge about the inside system design code or logic of the system. If we take system

testing instead of other types of testing we find out that the system testing have more restricted then the others because it is done to find out the error or defect within the system boundaries. The requirement document is being used by system testing as reference document and also the goal is being used to check it out did our developed software meets its requirements or not.

#### 6.4 Testing

All the tests cases are perform on the system in the duration of system development and which are marked qualified as follows.

#### 6.4.1 1st Test Case Sign Up

Table 6. 1: 1st Test case Sign Up

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Whenever clicks on register As on Button for Registration without Email and Password.	Massage is appear Enter Required Info	Massage is appear Please enter valid information	Pass
2 <sup>nd</sup> Test	Enter Invalid Email and click on Signup button.	Massage is appear Invalid Email input	Massage is appear Invalid Email input	Pass
3 <sup>rd</sup> Test	Enter Valid Email and password and click on Register button	Sign Up Successfully	Sign Up Successfully	Pass

## 6.4.2 2<sup>nd</sup> Test case Sign In

Table 6. 2: 2<sup>nd</sup> Test case Sign In

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Clicking on Login button without entering Email and password	Massage is appear Please Enter Required Info	Massage is appear Please Enter valid Input	Pass
2 <sup>nd</sup> Test	Enter Invalid Email and click on Login button.	Massage is appear Invalid Email	Massage is appear Invalid Email	Pass
3 <sup>rd</sup> Test	Enter Valid Email and password and click on Login button	Successfully Login	Login Successfully	Pass

### **6.4.3** 3<sup>rd</sup> Test case Profile Creation

**Table 6. 3: 3<sup>rd</sup> Test case Profile Creation** 

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Clicking on button	Massage is appear	Massage is appear	Pass
	without filling up the	Please Enter	Please Enter valid	
	desire fields	Required Info	Input	
2 <sup>nd</sup> Test	Enter Invalid data in the	Massage is appear	Massage is appear	Pass
	fields and click on the	fills up remaining	fills up remaining	
	button.	fields.	fields.	
3 <sup>rd</sup> Test	Typing yes on the Edit	Didn't show up some	Didn't show up some	Pass
	text "have you ever	relevant edit texts box	relevant edit texts	
	done the Elite"	and text view.	box and text view.	

## **6.4.4** 4<sup>th</sup> Test case Selection of University

Table 6. 4: 4th Test case Selection of University

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Clicking on submit	Massage will appear	Massage is appear	Pass
	button without marking	"Please Select one of	"Please Select one of	
	any university.	the university form	the university form	
		the list".	the list".	
2 <sup>nd</sup> Test	Clicking on submit	Move to the next	Move to the next	Pass
	button by marking only	activity.	activity.	
	one university In the list.			
3 <sup>rd</sup> Test	Clicking on submit	Massage will appear	Massage will appear	Pass
	button by marking more	"Please Select only	"Please Select only	
	than one university In	one of the university	one of the university	
	the list.	form the list".	form the list".	

## **6.4.5** 5<sup>th</sup> Test case Selection of Scholarships

Table 6. 5: 5<sup>th</sup> Test case Selection of Scholarships

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Clicking on submit	Massage will appear	Massage will appear	Pass
	button without marking	"Please Select at least	"Please Select at	
	any Scholarships.	one of the	least one of the	
		Scholarships form the	Scholarships form	
		list".	the list".	
2 <sup>nd</sup> Test	Clicking on submit	Massage will appear	Massage will appear	Pass
	button with marking one	"Your profile is	"Your profile is	
	or more Scholarships.	created". And move	created". And move	
		to the next activity".	to the next activity".	

## 6.4.6 6th Test case Documents Uploads

Table 6. 6: 6<sup>th</sup> Test case Documents Uploads

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				

1 <sup>st</sup> Test	Clicking on submit	Massage will appear	Massage will appear	Pass
	button without	"Please upload the	"Please upload the	
	uploading any picture of	picture of the	picture of the	
	document in the	documents in the	documents in the	
	required filled.	required field to	required field to	
		move further".	move further".	
2 <sup>nd</sup> Test	Clicking on submit	Massage will appear	Massage will appear	Pass
	button after uploading all	"You perform all the	"You perform all the	
	the required pictures of	activities that has	activities that has	
	document in the required	been asked by us	been asked by us	
	filled.	Now we will notify	Now we will notify	
		you when Consultant	you when Consultant	
		is available for to	is available for to	
		communicate with	communicate with	
		him".	him".	
3 <sup>rd</sup> Test	Clicking on submit	Massage will appear	Massage will appear	Pass
	button after uploading	"Please upload the	"Please upload the	
	half of the required	remaining pictures of	remaining pictures of	
	pictures of document in	the documents in the	the documents in the	
	the required filled.	required field to	required field to	
		move further".	move further".	

### 6.4.7 7th Test case View Profile

Table 6. 7: 7<sup>th</sup> Test Case View Profile

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Clicking on view profile	Profile view	Profile view	Pass
	tab after the completion	Successfully.	Successfully.	
	of profile.			

## **6.4.8** 8<sup>th</sup> Test Case View Profile of students by consultant

Table 6. 8: 8th Test Case View Profile of students by consultant

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	When consultant click any student in the given list to see his profile.	Profile of student is view Successfully.	Profile of student is view Successfully.	Pass

#### **6.4.9** 9th Test Case Communication

**Table 6. 9: 9th Test Case Communication** 

Test	<b>Test Conditions</b>	<b>Expected Results</b>	<b>Actual Outputs</b>	Status
No.				
1 <sup>st</sup> Test	Enable the chat after	Message is appear on	Message is appear	Pass
	verification of the	the end of students	on the end of	
	students.	that "chat is enable	students that "chat is	
		for now you can	enable for now you	
		communicate with	can communicate	
		consultant."	with consultant."	

## CHAPTER 7 CONCLUSION

#### 7.1 Conclusion

Our main purpose to design or developed an android application with fully operating state and having the anticipated or predicted features. So our main purpose through this application has been accomplished. "Student Consultant Network" is type of android application that can be easily used by any android user with his/her android mobiles. Our application can be very useful to those student who want to study in the foreign universities because our application work as a virtual consultant. In our application students have to make his profile by providing all meaningful information. On the bases of given information our application provide certain list of universities for which he/she is totally eligible. By marking a suitable university our application provide information of scholarships within the university. After that a students can upload all the necessary documents that helps the rated consultant to confirm the interest of students in the enrollment in the universities overseas. Once Consultant is sure about the student interest he will invite the students to communicate with them in the chat activity. Where they can further talk about how and when students get chance to enroll his/her self in the aboard universities.

As we can easily say that this application being a helping hand for both students and consultants. In the development of this application we discovered how to use the android studio to develop the application like this. Our application is the time savior for both students and consultant in the busiest routine of  $21^{st}$  century.

#### 7.2 Future Work

There are many several Features that we can add in the future such as:

- We can make the verify students by using the technique of image processing to scan the documents.
- List of universities and scholarships can be generated with help of data scrapping.

## CHAPTER 8 REFERENCES

#### References

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