

**National Institute of Technology, Hamirpur**

NITH Intern Project

**Attendance Management Android Application**

Name : **Dayanidhi Gupta**

Roll No: **185065**

Programme: **B.Tech**

Branch: **Computer Science and Engineering**

Submitted to :

|  |
| --- |
| **Dr. T P Sharma** |

|  |  |
| --- | --- |
| S.NO | **CONTENTS** |
| 1 | **INTRODUCTION**  1.1 ABOUT THE PROJECT |
| 2 | **SYSTEM ANALYSIS**  2.1 PACKAGE SELECTED  2.2 DATAFLOW DIAGRAM |
| 3 | **SYSTEM DESIGN**  3.1 ARCHITECTURAL DESIGN  3.2 INPUT/OUTPUT FORM DESIGN  3.3 TABLES |
| 4 | **CONCLUSION**  **4**.1 SUMMARY OF THE PROJECT |

How to login as admin:

user name and password for admin is:

username: **admin**

password: **admin123**

1. INTRODUCTION

**1.1. ABOUT THE PROJECT**

This project is entitled as “ Attendance Management Android App”. The main objective of this project is to enhance the learning of mobile based technology.This is basically an android application which use sqlite database for managing and storing attendance as well as information and data of faculty and students.

With this application we can add faculties , view faculties details, add students, view students details and their attendance by date ,month and year.

This app is for administrator and faculty only.

Admin can add student and faculties with their details. Admin can also see the overall attendance of all students.

Faculty can take attendance of particular branch , year and subject and at a specific date. Faculty can also view Total attendance of student or also according to date, year and branch.

Disadvantages:

* This App is not for students but can aslo be made for students which would result more beneficial for students in tracking their attendance .
* The final result of this project is not very useful for the educational orgainsations to keep track and maintain the database of students in real time.
* We cannot update ,delete,add data in realtime. But it can be possible using Google’s FIREBASE Database Technology. Which can do many database related transaction in real time. And Even student could access data or keep track of their attendance in real time.

**2. SYSTEM ANALYSIS**

**2.1 PACKAGE SELECTED**

Front End: Designing - **XML**, Development - **JAVA.**

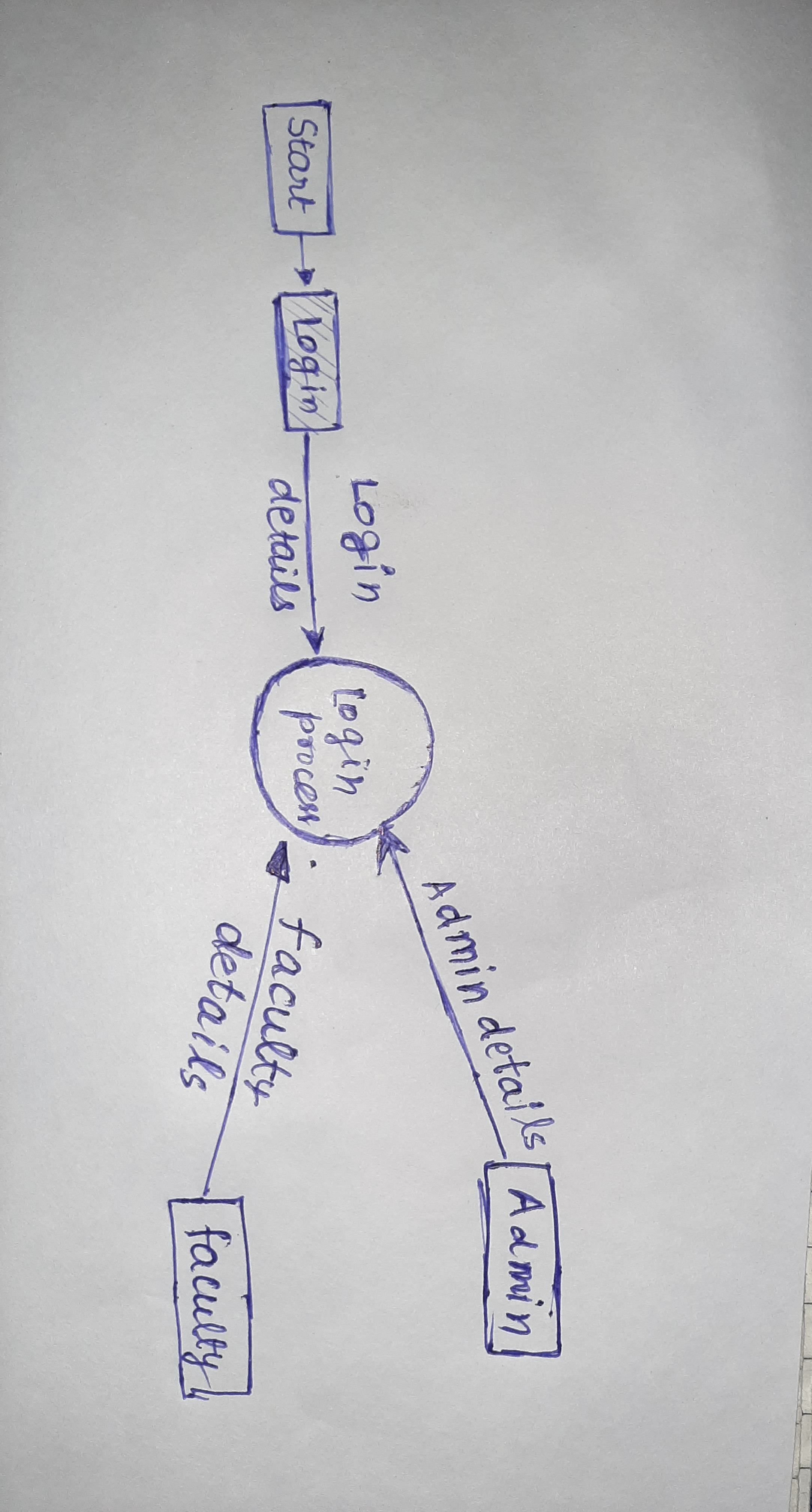
Back End: **SQLITE(extending SQLiteOpenHelperClass)**

Operating System: **Linux Mint** (we can also work on other os like windows ,other linux distros )

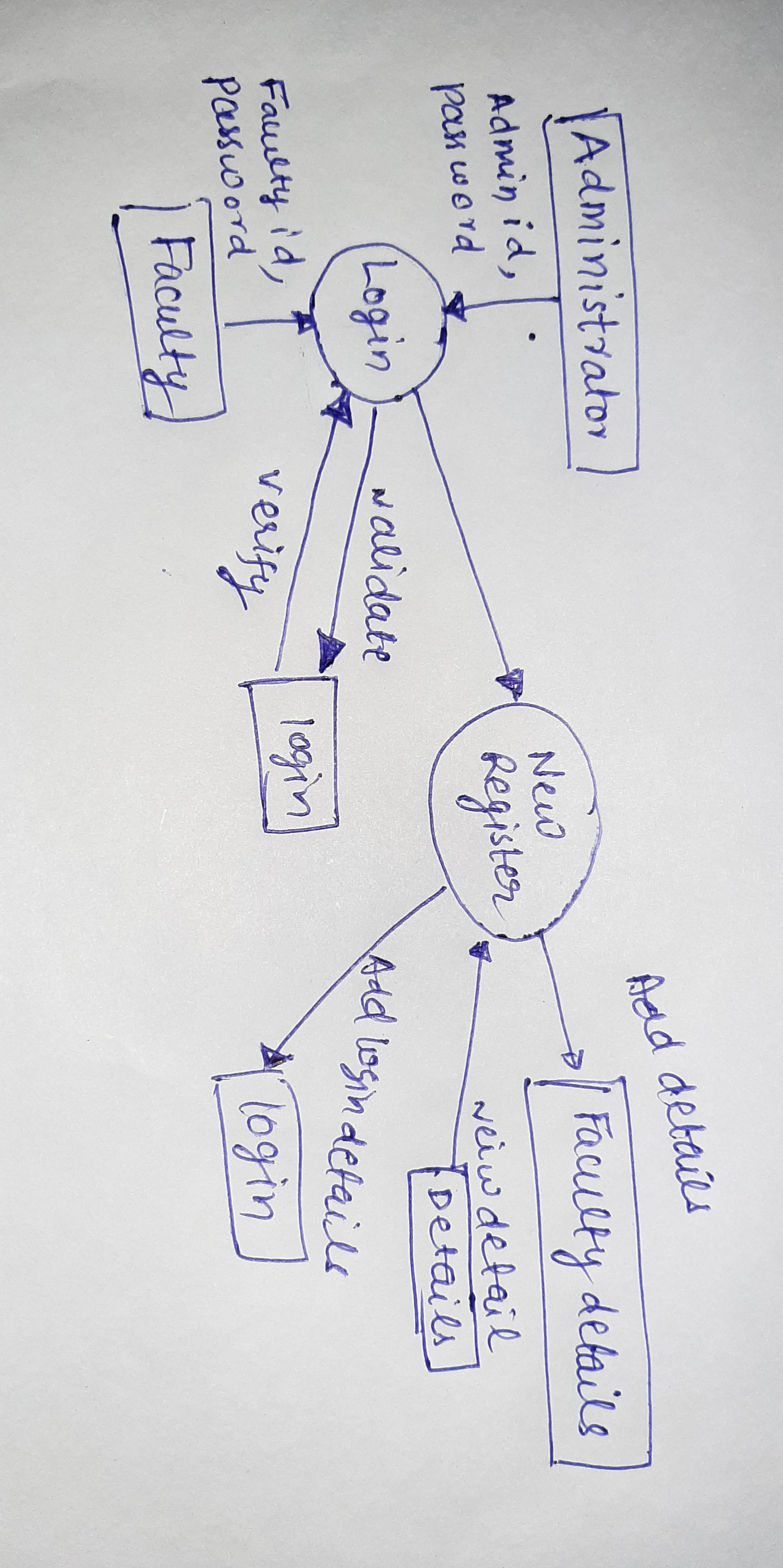
Used **ANDROID STUDIO** for developing Android Application.

**2.2. DATA FLOW DIAGRAM**

Data Flow Diagram (DFD) is one of the best ways if documenting the entire functionality of the system. For any system, which will have some data inflows, processing and data outflows from the system can be documented or represented effectively by the means of the data flow diagram. It is a diagrammatic representation of the system.



LEVEL 0 DFD



LEVEL 1 DFD

**3.1 ARCHITECTURAL DESIGN**

Android Attendance Management

FACULTY

DATABASE

VIEW/EDIT ATTENDANCE REPORTS

TAKE ATTENDANCE

LOGIN

VIEW/EDIT ATTENDANCE REPORTS

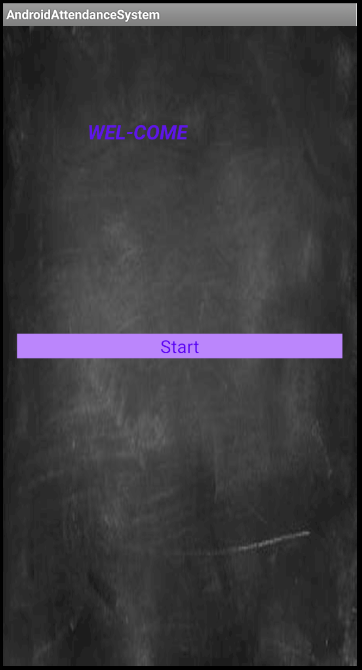
ADD/REMOVE STUDENT

ADD/REMOVE FACULTY

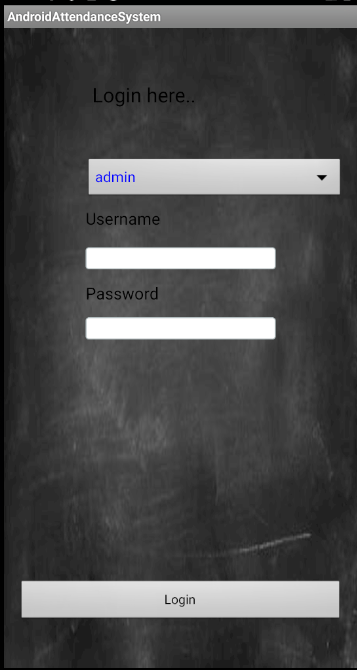
LOGIN

ADMIN

**3.2 INPUT AND OUTPUT FORM DESIGN**



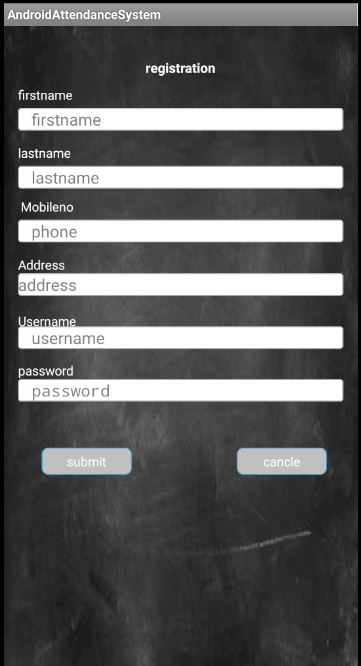
**WELCOME ACTIVITY**

****

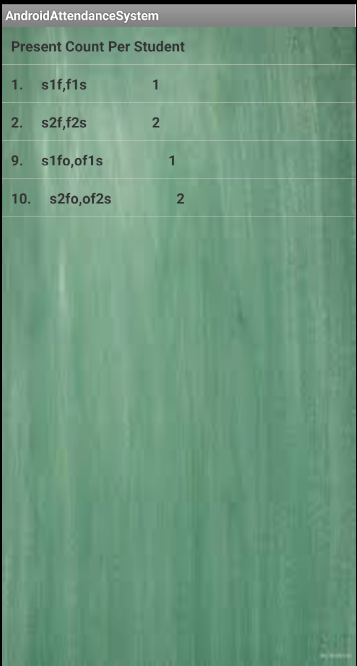
**LOGIN SCCREEN(ADMIN/FACULTY)**



**ADMIN HOME PAGE**



**ADDING FACULTY AND ASSIGINING USERNAME AND PASSWORD**

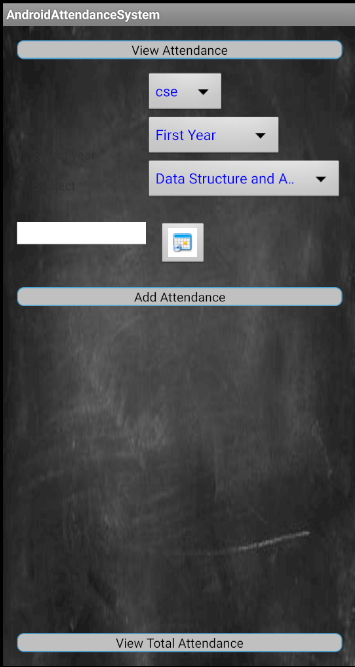


**OVERALL ATTENDANCE**

**OF STUDENT**



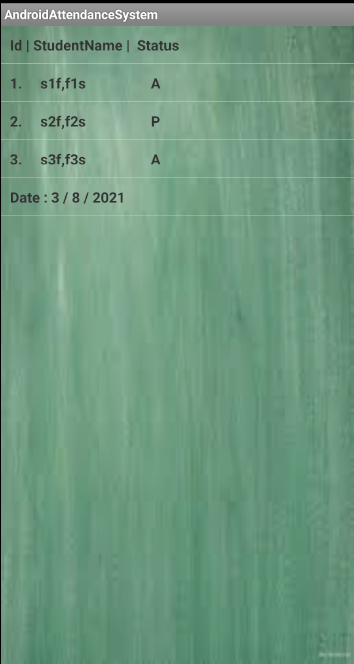
**VIEW ALL FACULTIES**



**FACULTY HOME PAGE**



**VIEW STUDENT**



**VIEW STUDENT ATTENDANCE**

### 3.3 TABLES

### **Table Design**

**Table : faculty\_table**

|  |  |  |  |
| --- | --- | --- | --- |
| **Field Name** | **Data Type** | **Constraints** | **Description** |
| faculty\_id | INTEGER | NOT NULL | PRIMARY KEY AUTOINCREMENT |
| faculty\_firstname | TEXT | NOT NULL |  |
| faculty\_lastname | TEXT | NOT NULL |  |
| faculty\_mobilenumber | TEXT | NOT NULL |  |
| faculty\_address | TEXT | NOT NULL |  |
| faculty\_username | TEXT | NOT NULL |  |
| faculty\_password | TEXT | NOT NULL |  |

**Table : student\_table**

|  |  |  |  |
| --- | --- | --- | --- |
| **Field Name** | **Data Type** | **Constraints** | **Description** |
| student\_id | INTEGER | NOT NULL | PRIMARY KEY AUTOINCREMENT |
| student\_firstname | TEXT | NOT NULL |  |
| student\_lastname | TEXT | NOT NULL |  |
| student\_mobilenumber | TEXT | NOT NULL |  |
| student\_address | TEXT | NOT NULL |  |
| student\_department | TEXT | NOT NULL |  |

**Table : attendance\_session\_table**

|  |  |  |  |
| --- | --- | --- | --- |
| **Field Name** | **Data Type** | **Constraints** | **Description** |
| attendance\_session\_id | INTEGER | NOT NULL | PRIMARY KEY AUTOINCREMENT |
| attendance\_session\_faculty\_id | INTEGER | NOT NULL |  |
| attendance\_session\_department | TEXT | NOT NULL |  |
| attendance\_session\_class | TEXT | NOT NULL |  |
| attendance\_session\_date | DATE | NOT NULL |  |
| attendance\_session\_subject | TEXT | NOT NULL |  |

**Table: attendance\_table**

|  |  |  |  |
| --- | --- | --- | --- |
| **Field Name** | **Data Type** | **Constraints** | **Description** |
| attendance\_session\_id | INTEGER | NOT NULL |  |
| attendance\_student\_id | INTEGER | NOT NULL |  |
| attendance\_status | TEXT | NOT NULL |  |

# **4.Conclusion**

**4.1 Summary of the Project**

This whole work is to access the details about the student attendance information and generate a final report. It is only based on local shared preferences but it can be made more effective when we can access student details in real time and for everyone using firebase. It is useful for faculty to manage attendance of students.

How to use:

->Just install the apk file .

->user name and password for admin is:

username: **admin**

password: **admin123**