

College Management System

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Abstract - This project is based on COLLEGE MANAGEMENT SYSTEM. College management system application provides the simple interface for maintenance of student information, staff information and college related information. It can be used by colleges to maintain the records of all students and different staffs of different department. The student module of application deals with all kind of student related details like student profile, batch details, result details, attendance details, progress details. It will also have the various academic notification to the all staff and student updated by college administration. The faculty of particular department is responsible for updating the assignments, updating the attendance of every student, updating the notification related to department. Also the faculty has facility to submit request for leave. The library module is special library contains the information related to the information about books availability, staff of library.

Key word: College Management System, Department, Library, Staff, Attendance, Book, Student Information, Leave, Assignment.

1. INTRODUCTION

The college management system is developed by using the Android. The main aim of this project is to develop an android application which covers the all the details of college like student profile, teacher profile, student progress, academic events, student attendance, Bus fees, College Fees, library, sports. All the data related to college, staff and student is securely stored on firebase database which is managed by the college administrator. The system utilizes the authentication, each subactivity has authentication allowing the authorised users to login in the system to create or update information in the particular activity. The staff can submit request for the leave thus reducing the processing time. The application reduced the time needed to access and deliver the student records to users.

College Management System project is implemented in java platform. College Management system is integrated android application that handles various academic or nonacademic activities of college. The system can access by every students/faculties/employee of the college through internet with help of android mobiles with their email id

and password. Every users in college management system has different home page with their respective levels like student has the different level and teacher has the different level. Through that displayed menu user can access the different option of the application assigned him.

The system college management system can be used to manage data of all type of education institute. It will support both stand alone and also networking environment. The application reduces as much as possible to avoid error while entering the data. No formal knowledge is needed for the user to use this application. Thus it provide user-friendly environment for everyone.

2. LITERATURE SURVEY

Srikant Patnaik, Khushboo kumari Singh, Rashmi Ranjan, Niki Kumari College management system assists in modifying the existing system to site based system. This is a paperless work. It can be monitored and controlled remotely. It reduces the manpower required. It provides accurate information always. Malpractice can be reduced. All gathered and extra information can be saved and can be accessed at any time. The data which is stored in the project helps in taking intelligent and quick decisions by the management. So it is better to have a Web-Based Information Management system. All the stakeholders, staff members can get the desired information without delay. This system is essential in the colleges/hostels and universities.[1]

Kartiki Datarkar, Neha Hajare, Nidhi Fulzele, Sonali Kawle, Vaibhav Suryavanshi, Dipeeka Radke Online College Management System assists in automating the existing manual system. This is a paperless work. It can be monitored and controlled remotely. It reduces the manpower required. It provides accurate information always. Malpractice can be reduced. All years together gathered information can be saved and can be accessed at any time.

The data which is stored in the repository helps in taking intelligent decisions by the management. So it is better to have a Web Based Information Management system. All the stakeholders, faculty and management can get the required information without delay. This system is essential in the colleges/hostels and universities. [2]

2.1 Need Of Work

The College Management System is the version of manual System. The Manual College Management System consist of Consist Following Drawbacks:

Lack of Security:

The manual system consists a lots paper document. The paper document is less secure than advance electronic system. In case of loss of paper document there is some less chance of recovery.

Time Consuming:

In the manual college management system handling of the paper document and storing is not easy. Manually managing is very time consuming. Finding the paper documents in manual system takes up long time. It is very time consuming and difficult to handle.

Insufficient Space:

In case of increasing the number of documents in manual system its require lots of space to store the documents. Upgradation of the storage in manual system is not easy.

Increasing Cost:

One of the biggest problem in manual college management system is management of paper document is associate with cost. Storage of paper documents, recoding leads with increasing cost.

Updating Data:

Updating manual paper documents requires lots of time and also difficult to maintain. If you want to make any change you will have to make a copy, so you don't destroy the original with any edits or comments you might add.

To overcome these problems, We designed our college management system in android.

3. PROBLEM DEFINATION

The existing system which we using in our college is traditional process is a complete manual process. To Reduce to override the problems prevailing in the practicing manual system we develop Our College Management System.

4. OBJECTIVE

The main objective of this project is to online platform to student and employee that provide an interface to view activity related college. The main aim of this project is to develop an android application which covers the all the details of college like student profile, teacher profile, student progress, academic events, student attendance, Bus fees, College Fees, library, sports. All the data related to college, staff and student is securely stored on firebase database which is managed by the college administrator.

5. ARCHITECTURE

5.1. System Architecture

There are three functional component of this system i.e the admin, the student and the employee. Both employee and student need to login in order to access the information. In this system admin has highest priority. Main functionality of admin is to add the employee and manage the database dashboard. Admin gives the login credential to the employee. Main functionality of student is to register the account and login into system. After the login student has the various menu to do the task related their profile like view notification, view assignment, view their progress, office related task and library related task. Employee module has further divided into submodules the main functionality of employee module is login to system and do the task related their profile like teacher profile has task related teaching while hod profile has task related department and so on.

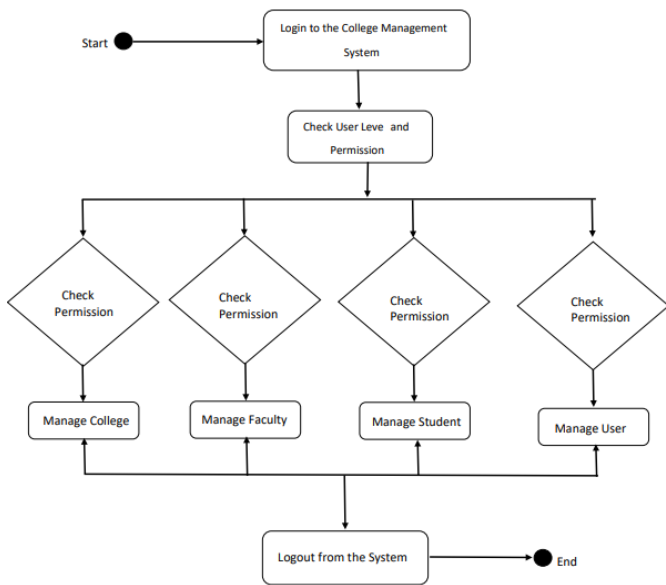


Fig 1: Activity Diagram for College Management System

5.2. Modules

The System is implemented in java and consist of three modules:

1. Admin Module -: This is the main module in our college management system. It play very important role in the college management system. This module contains the main registration part of the employee in the college system. This is main task in our system because it is necessary to maintain the security. Admin create the accounts of employee using there email address and password. This account created are stored according to there department and designation. Admin have the highest priority in our college management system. Admin have the all access of the database. They have permission like view the information, edit the information, delete the information etc.

2. Student Module -: he student module enables you to store all personal, academic, professional and history data regarding a student, his/her parents. In manual college management system they are facing the problem related maintaining the record of student. Sending assignment and notification to the student and so on. So in this student

module they have the facility like registration there account in our college management system with there data. This data of register student are store according with there department. When the student complete there registration they have facility to login there account with register email address and password. If student doesn't have there password our system have the facility to forgot there password with register email. After the login account student have many options related to section like assignment section, notification section, office section, library section and profile section. The main part in the student section is the complete the profile section is first it is necessary part. When the student done the complete profile part the our college management system create the student account in the various section like in office section, library section, bus section if student have the bus facility and hostel section it is also depend on the student. This all data of the student are maintain using there department, year and current year. Student module has the facility to update the information.

3. Employee Module -: The registration part of employee in college management system done by the admin. This module only contain the login part with there email id and password that are provided by admin. The system has facility to forgot there password. This module are further divided into submodule with there designation of employee in college. The submodule are as follows:

- a. Teacher Module
- b. HOD Module
- c. Staff Module

- a. **Teacher Module** -: After the login they have different section's like profile section, assignment section, notification section, leave section and attendance section. Teacher can upload the assignments or delete the assignments. Also they take the attendance of student of particular class. They give the notification to the student related to department or college. Whenever they need a

leave they give the leave application to head of department.

- b. **HOD Module** -: After the login the head of department contains the same options like teacher module along with that they contains extra options because they play both role as a teacher and as a HOD. The extra options are like manage the record of department, manage the timetable of classes, accept the leave application from teachers and send to the principle for approving.
- c. **Staff Module** -: The staff module contains the different staff of college like office staff, library staff, bus department staff etc. They have their particular task according to their position.

6. RESULT



Fig 1. Main Screen

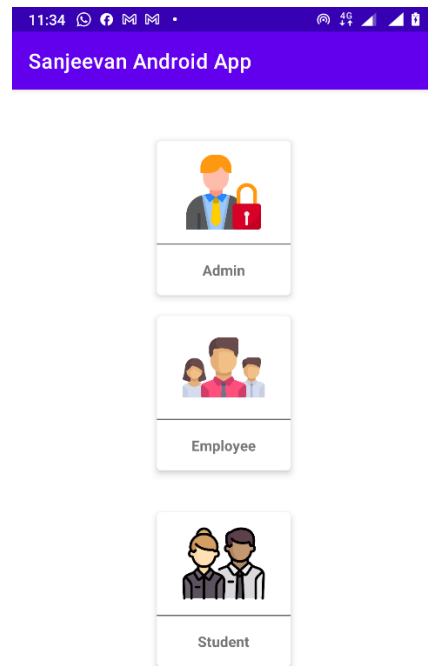


Fig 2. Home Screen

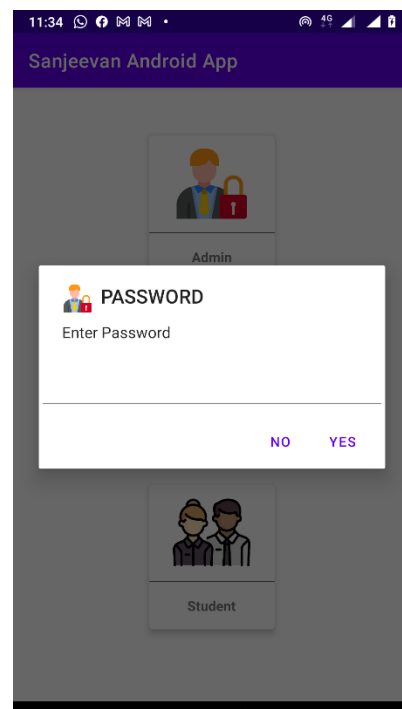


Fig 3. Admin Login Screen

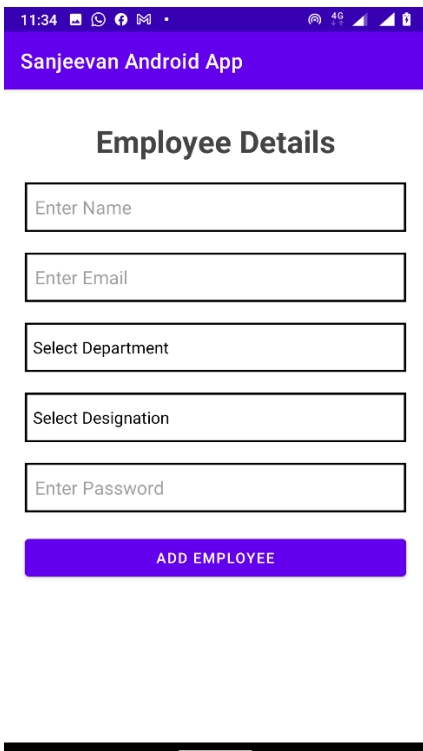


Fig 4. Admin Add Employee Screen

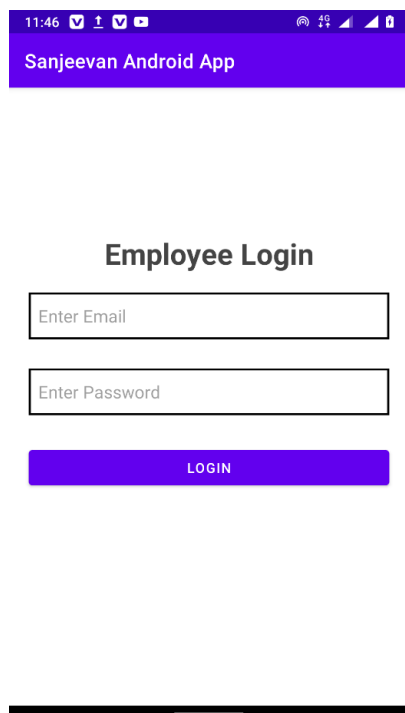


Fig 5. Employee Login

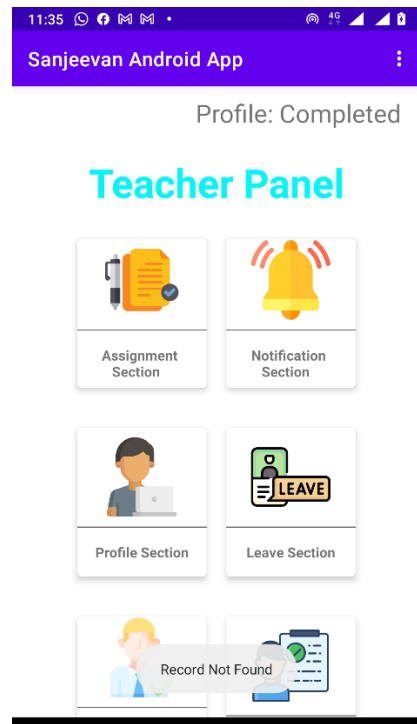


Fig 6. Teacher Panel Screen

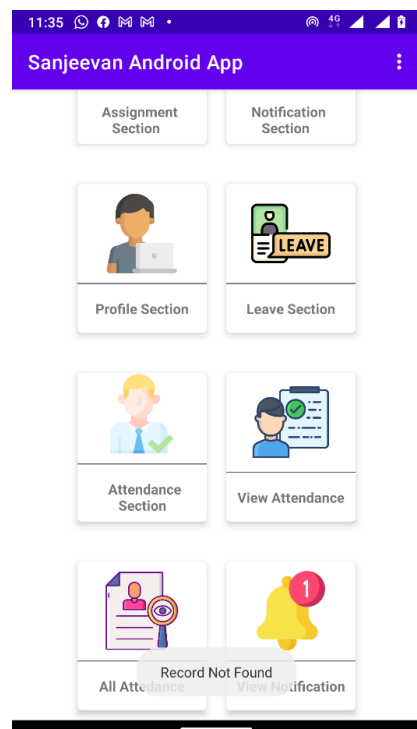


Fig 7. Teacher panel Screen

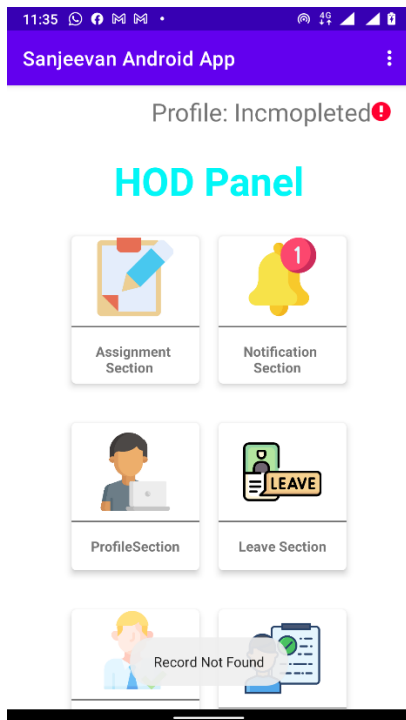


Fig 8. HOD Panel Screen

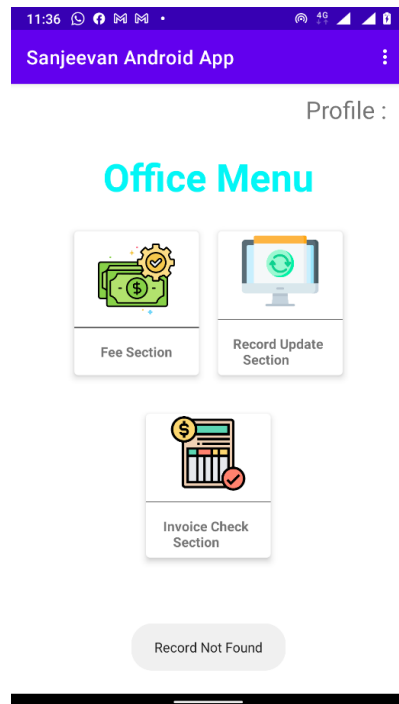


Fig 10. Office Menu Screen

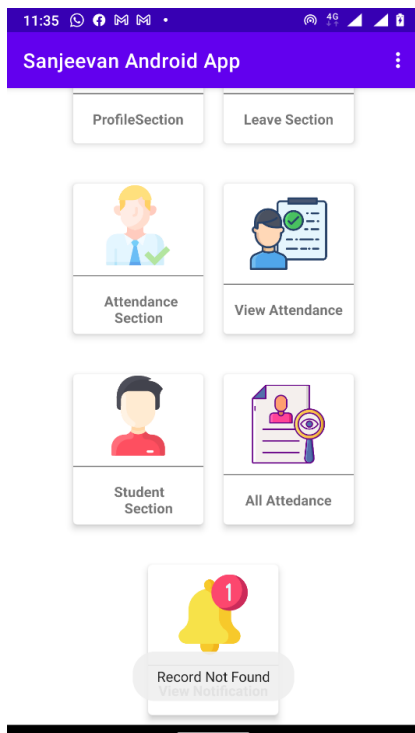


Fig 9. HOD Panel Screen

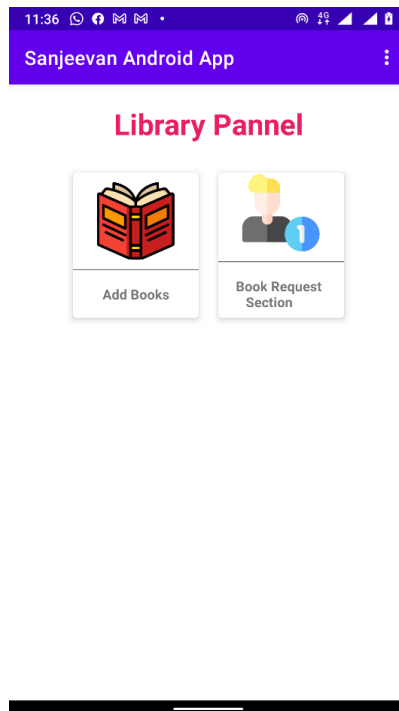


Fig 11. Library Panel Screen

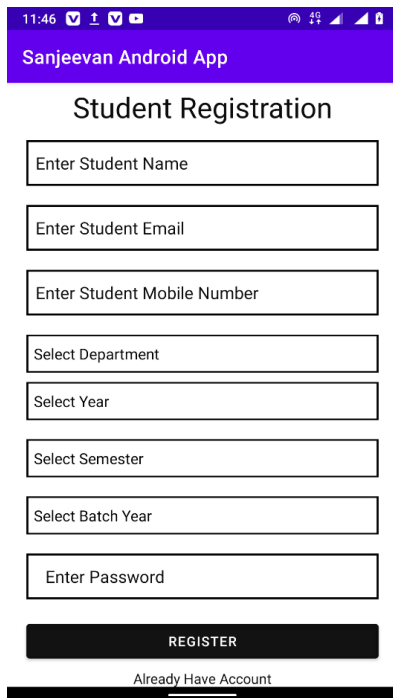


Fig 12. Student Registration Screen

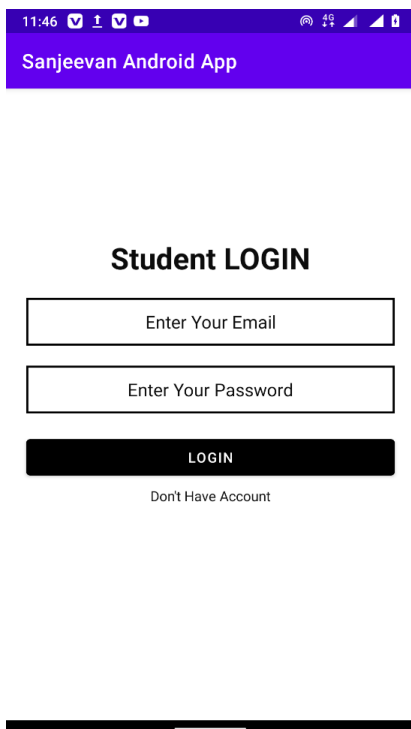


Fig 13. Student Login Screen

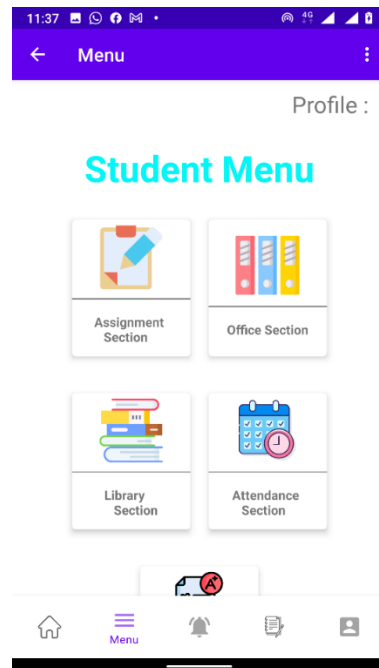
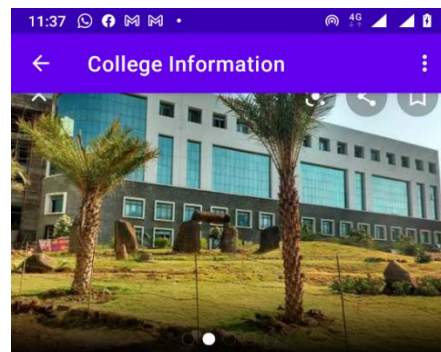


Fig 14. Student Menu Screen



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In this study all the beam specimens failed in flexure mode only. Sudden failure was not occurred in high performance concrete beams. It can inferred that the reduction in crack width is directly related to partial replacement of cement and fine aggregate with silica fume.

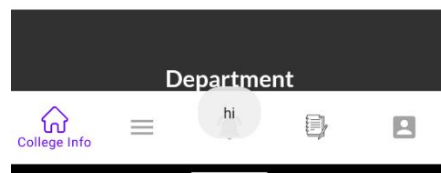


Fig 15. College Information Screen

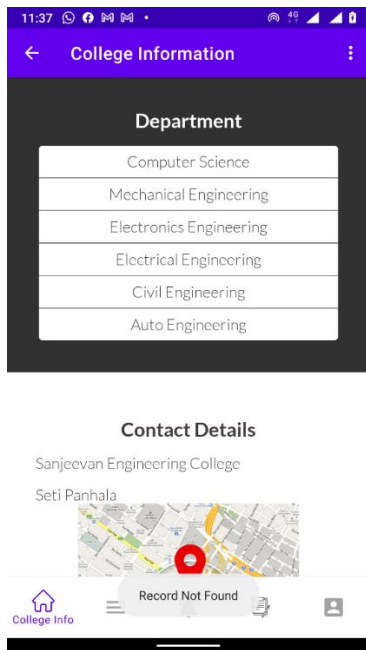


Fig 16. College Information Screen

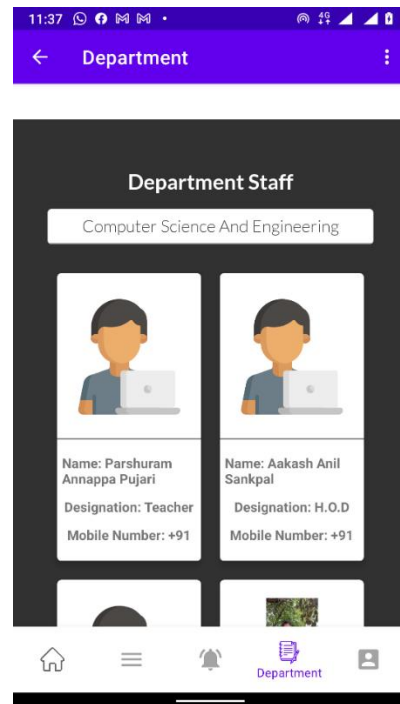


Fig 18. Department Information Screen



Fig 17. Department Information Screen

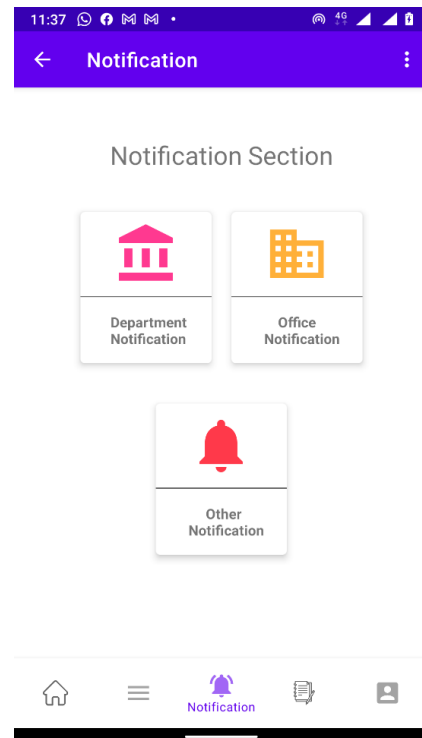


Fig 19. Student Notification Screen

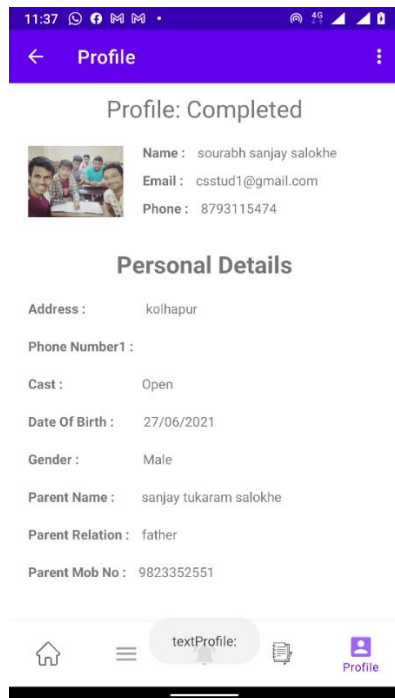


Fig 20. Student Profile Screen

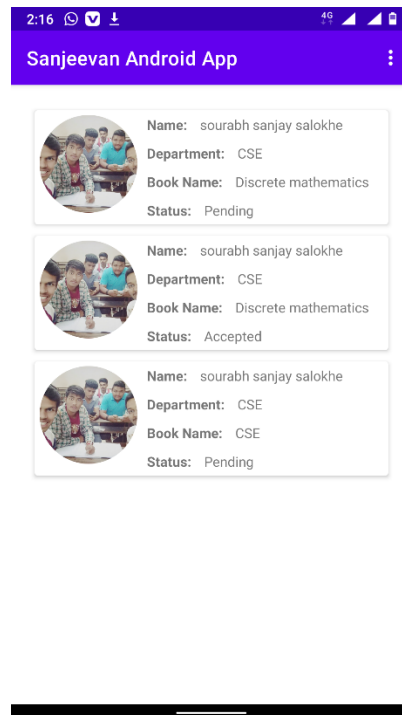


Fig 22. Student Office Section

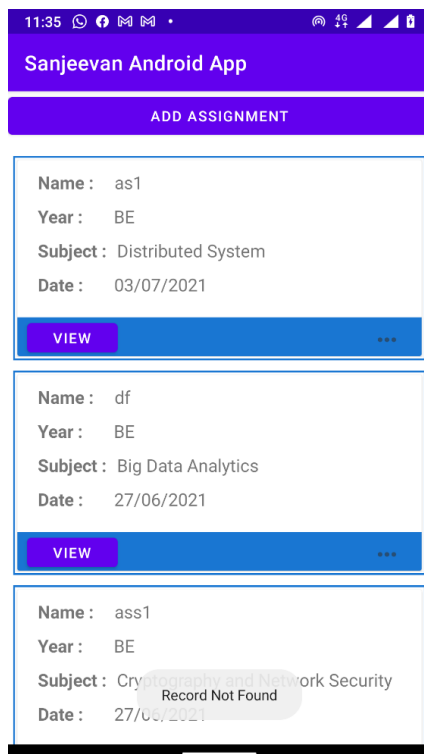


Fig 21. Teacher Assignment Screen

CONCLUSION

The project as College Management System is the system that deals with the issue related manual college management system. This project is successfully implemented with all the features required for college.

The application provides appropriate information to user according to the chosen activity. The project is designed keeping in view the day to day problem faced by a manual college management system. Deployment of our College Management System help the college to reduce unnecessary wastage of time in doing work using manual college management system.

The system is user-friendly, highly interactive and flexible for further enhancement. The system generates the reports as when required. The coding is done in a simplified and understandable manner.

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