# **Software Requirements Specification**

for

# <u>All in One Departmental App</u>

App : DeptConnect

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# **Revision History**

| Name | Date | Reason For Changes | Version |
|------|------|--------------------|---------|
|      |      |                    |         |
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# 1. Introduction

#### 1.1 Purpose

The purpose of this document is to give a detailed description of the requirements for the "All In One Departmental" app namely DeptConnect. It will illustrate the purpose and complete declaration for the development of the system. It will also explain system constraints, interface and interactions with other external applications.

The purpose of the "All In One Departmental" app is to provide authentic notices and question papers. The students of the department can organise an event and participate in different events of the department through this system.

The teachers and the executive members can also post question papers, datesheet of internal exams, details of any events, create polls for voting, upload question papers and assign roles to the students.

#### •Problem Statement:

Ever been in a situation where you get a notice and end up knowing that it was fake and not authentic.

All in one app where we can have complete access to authentic notices all the events being organized in the department.

Students get updated from time to time about the upcoming and ongoing events.

Online voting, roles assigning(of executives by the teacher) can also be done through this app.

## •Limitation of the Current System:

Being a student, we know it gets difficult to stay updated about day to day notices and events in our department and sometimes we even don't get authentic notices, we end up knowing that "this news was fake".

All in One Departmental app will also provide online voting. Below are the advantages of online voting:

Voting online saves money

Voting online saves time and eases note management

Online voting maximizes participation

Online voting is private and secure

Voting online is environment friendly.

The recommendations should be in terms of providing authentic notices and updates, online voting, role assigning and participating and organizing events, question papers, datesheet of internal exams, everything at one place.

#### •Proposed Solution:

ALL IN ONE DEPARTMENTAL APP

AIM: to make all the notice/circular, online voting, event organizing, question papers, datesheet of internal exams, everything available at one place.

#### •Advantages of proposed solution:

- •Real and genuine notices and updates of departments available at one place.
- •Easy login through email id or phone number.
- •Easy and free to use app.
- Easy event organizing
- Question paper of every subject available at one place
- Datesheet of internal exams is provided
- Online voting: Voting online saves money

Voting online saves time and eases note management

Online voting maximizes participation Online voting is private and secure Voting online is environment friendly

## 1.2 Product Scope

#### In scope:

- Provide circulars/information/announcements
- Provide all information regarding department
- Able to maintain authenticity of information
- Event organizing
- Online voting
- Registering yourself in events.
- Volunteering in events.
- Provide question papers
- Provide datesheet of internal exams

### Out of scope:

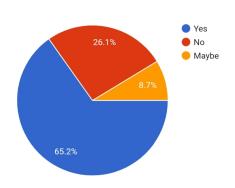
- Recorded lectures of different subjects
- Informations not related to the Department

# 1.3 Requirement Elicitation

# What kind of events/seminars do you want to be conducted by the department? 23 responses Career Counselling Interviewing Skills Technical Skills Xyx On Skill based Earning NA Motivational or relaxing seminars. Department fest 0 10 20

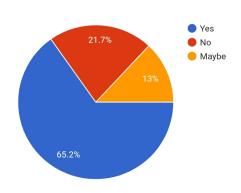
Have you ever faced difficulty/inconvenience while searching for previous year question papers?

23 responses



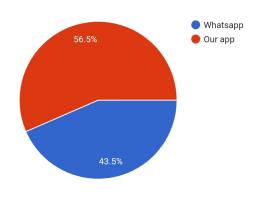
Have you ever missed important announcements/circulars of your department or college?

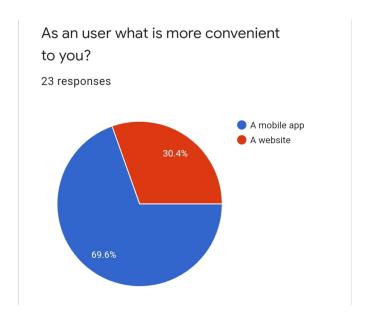
23 responses

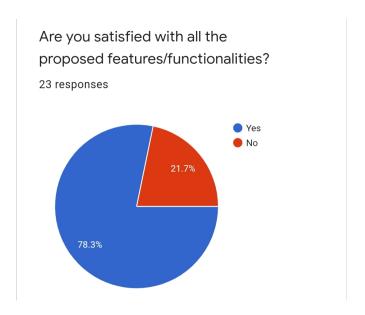


Do you prefer important information to be circulated over whatsapp messages or via push notification in this app?

23 responses







What other features should we add to make it more beneficial for you?

23 responses

Recorded Lectures, Assignment Exams and Events Reminder

Хух

Add the option of FAQ so that students can clear their doubts as well

Interaction with members of department

Maybe something to keep track of Study material needed for a semester

Nothing thank you

Contacts of head dpt.

info about the event atleast a week prior to it

| NA   |
|--|
| Conducting seminars outside of classes timings.  |
| The app should also provide solutions of previous year question                            |
| Event tracking & Doubt sessions  |
| To let students know the probability which of their class could get cancelled before time. |
|  |
| Proper scheduling of events  |
| Include praticals also   |
|  |
| Proper scheduling of events  |

| Proper scheduling of events                           |
|---|
| Include praticals also                                |
|   |
| Enough listed features                                |
| Sorting by interests                                  |
| High light important information                      |
| Reminder option                                       |
| I don't know. It's already added in this app I guess. |
| Keep updated  |

#### 1 4 References

Requirement elicitation form of the following: <u>Elicitation Form</u>

• GUI for better understanding : GUI

• Prototype: <u>Prototype</u>

# 2. Overall Description

## 2.1 Product Perspective

The mobile application of this system will require the user (student) to login using their number/email id .

Once they are logged in they can see updates and question papers. They can volunteer for events and register for events.

We'll use cloud drive (A cloud drive is a Web-based service that provides storage space on a remote server) format to make question papers available to the users.

Hence, the question papers would be uploaded on a specific drive and then would be shared publicly through specific links on our app.

The teachers and executive members are the ones who can upload notices and papers and datesheet of internal exams. Teacher and/or executive members can assign rolls and create a poll for voting and with that students can vote using the poll.

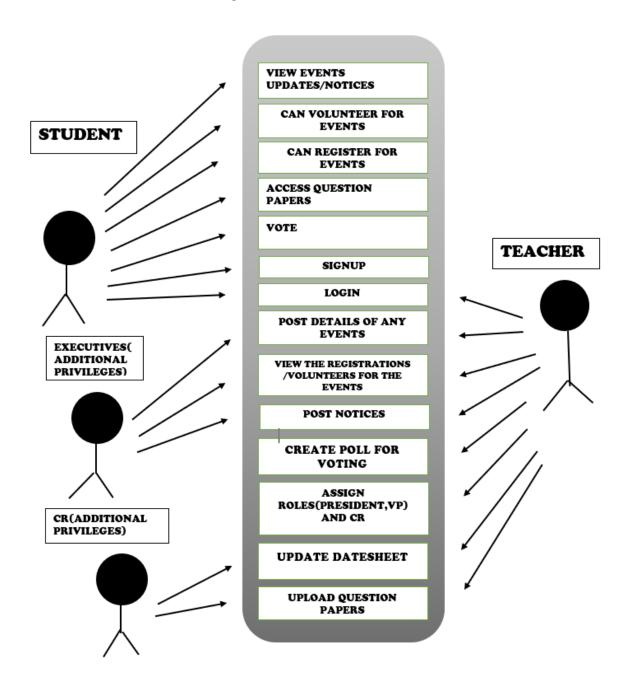
#### 2.2 Product Functions

#### 2.2.1

- The application will make all the information regarding society's events, notice/circular, voting available at one place.
- The student will also be able to check the latest updates.
- The teacher/executive members are the only ones who can post about notices.

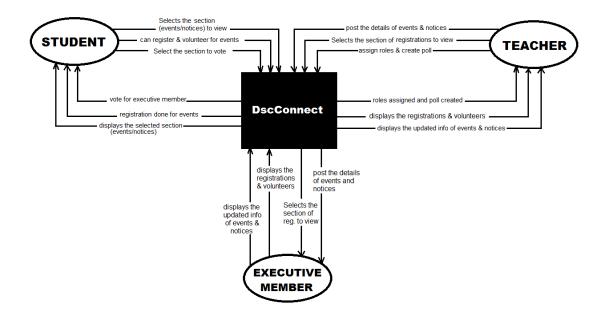
- Teacher can assign roles and create a poll for voting.
- Students can vote for their desired candidates.

# 2.2.2 Use Case Diagram

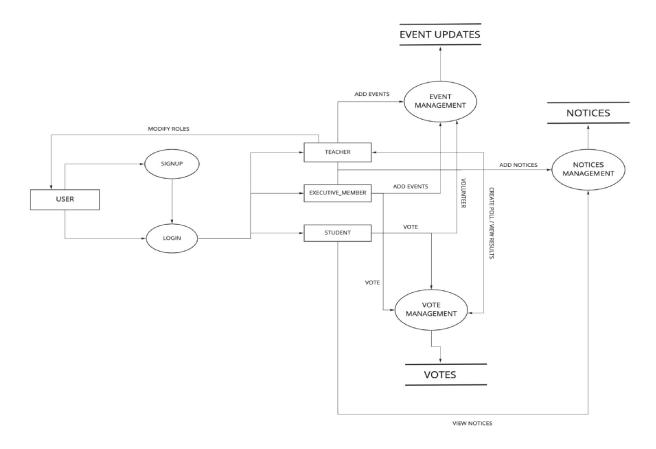


2.2.2 DFD

# LEV-0 DFD



#### LEV-1 DFD



#### 2.3 User classes and characteristics

There are three types of users that interact with the system: main users of the mobile application, that is, students, teachers and executive members. Users have different uses of the system so each of them has their own requirements.

The registered students can use the application to check the recent updates or notices and can also volunteer for an event, register for different events and vote for their desired candidates.

The teachers and/or executive members can manage the information about the post about notices, assign roles and create a poll.

## 2.4 Operating Environment

The app will be basically made for android users as most people have android OS it will be easier to maintain and develop.

## 2.5 Design and Implementation Constraints

 Application documentation will be shown to the department as well as college and will be made keeping in mind the regulations of college.

## 2.6 Assumptions and Dependencies

- Users must have an android device.
- Users must be members of the department.
- Users must have an Email ID and contact number for verification.
- Users must have an active data connection while using the app.

## 2.7 Apportioning of Requirements

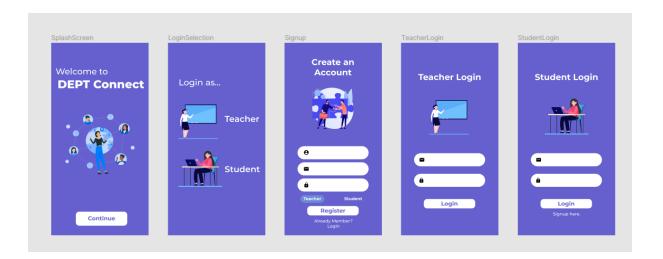
- Some features that might be included in future versions of ACA:
  - 1. Chat feature might be introduced.

# 3. External Interface Requirements

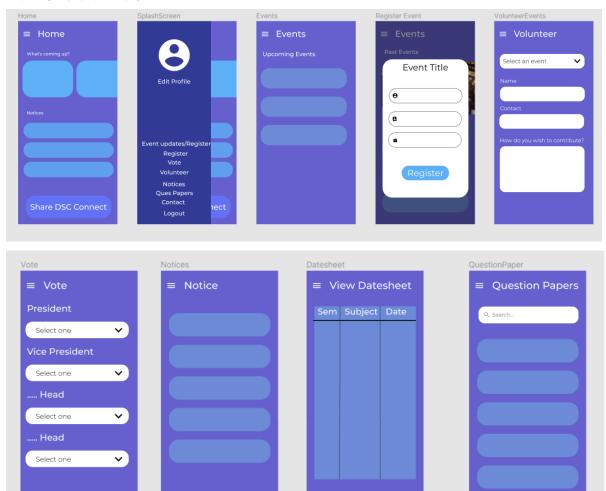
#### 3.1 User Interface

At first the user of the application should see the welcome page. Then the user should see the signUp page where he/she can create an account.

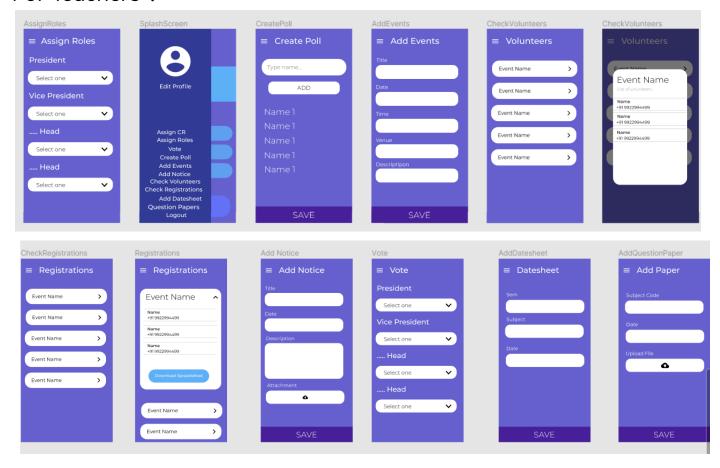
If the user has already registered, he/she should be able to log-in on the login page, which is different for teachers and students.



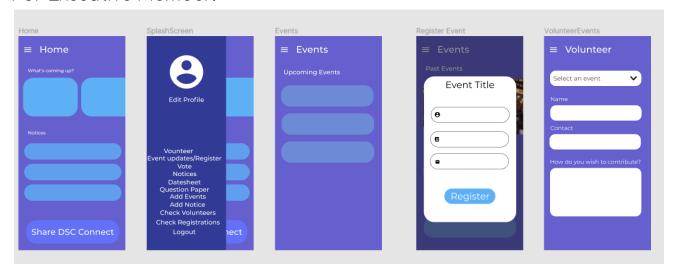
#### For Students:

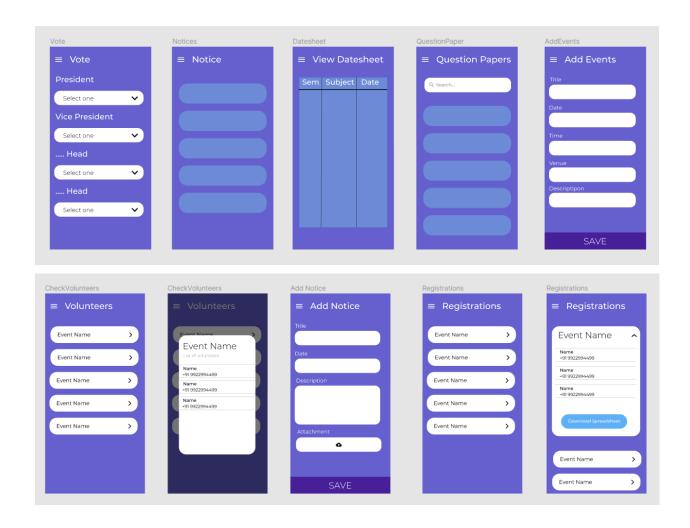


#### For Teachers:

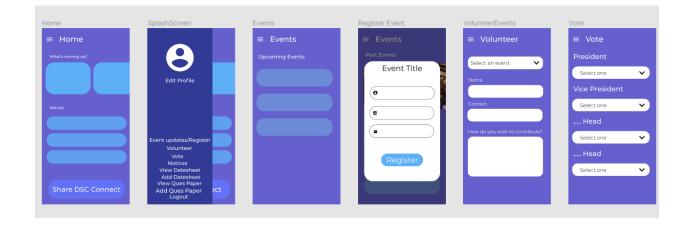


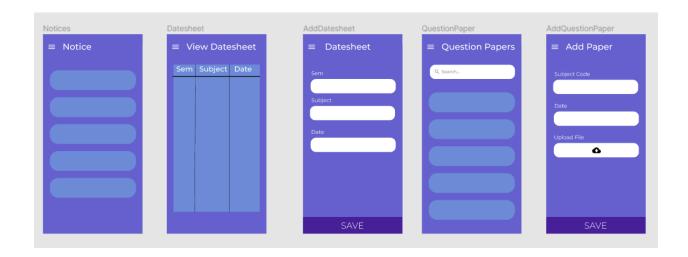
#### For Executive Member:





#### For CR:





## 3.2 Hardware Interfaces

• Android Device

# 3.3 Software Interfaces

• OS: Android

# 3.4 Communication Interfaces

Active Internet Connection

## 3.5 Functions

1)Use Case Template: 1

Description: SIGN UP Actor: Students

## Flow Of Events:

i) enter name→ enter roll no. --> enter year→ enter email and/or phone number → create password → confirm password : sign up done

Requirement: students must have an email/phone number.

2)Use Case Template: 2

Description : LOGIN Actor: teacher, student FLOW OF EVENTS:

1)Once the student has signed up and made an account, he/she must be able to login using their email/phone number and password.

For teachers, teacher ID will be provided through which any teacher can log in into the application.

#### 2)If unable to login:

i)Log out then re login

ii)Students must have registered first and teachers should Login using the given teacher ID only.

REQUIREMENTS: must have internet connectivity

3)Use Case Template: 3

Description: POST DETAILS ON ANY EVENTS

Actor: Teacher, Executive Member

#### FLOW OF EVENTS:

i)enter updates on events → enter name of the event → enter date → enter time → enter venue : UPDATES ON EVENTS WILL BE ADDED

ii)if unable to post details on any events : refresh, if still not able to post, then re login in the system.

REQUIREMENTS: must have internet connectivity

#### 4)Use Case Template :4

Description: ASSIGN ROLES(PRESIDENT, VICE PRESIDENT)

Actor: Teacher, Executive Member

FLOW OF EVENTS:

i)select/assign the one for a particular role(president, vice president, head) → submit

ii)if unable to assign roles : refresh, if still error arises, then re login in the system.

REQUIREMENTS: must have internet connectivity

5) Use Case Template: 5

Description : Create Poll For Voting Actor: Teacher, Executive Member

#### FLOW OF EVENTS:

i)type details of the student 1 for poll  $\rightarrow$  add  $\rightarrow$  type details of student n for poll  $\rightarrow$  save and/or submit

ii))if unable to create poll : refresh, if still error arises, then re login in the system.

REQUIREMENTS: must have internet connectivity

#### 6) Use Case Template: 6

Description: Post question papers Actor: Teacher, Executive Member

#### FLOW OF EVENTS:

i) select the type of paper(Previous year/ mock test) → incase of previous year paper, enter the details of the paper like date and year and name of subject → save and/or submit

ii))if unable to post question papers: refresh, if still error arises, then re login in the system.

REQUIREMENTS: must have internet connectivity

#### 7) Use Case Template: 7

Description: Post Datesheet of internal exams

Actor: Teacher, Executive Member

#### FLOW OF EVENTS:

i) select the year and semester  $\rightarrow$  upload the datesheet in .png or .pdf form  $\rightarrow$  save and/or submit

ii))if unable to datesheet: refresh, if still error arises, then re login in the system.

REQUIREMENTS: must have internet connectivity

#### 8) Use Case Template: 8

Description: Can volunteer for events(Organizing Events)

Actor: Student

#### FLOW OF EVENTS:

- i) select an event  $\rightarrow$  enter name  $\rightarrow$  enter contact details  $\rightarrow$  submit valid answer for "how do you wish to contribute"  $\rightarrow$  submit
- ii)if unable to respond : refresh, still the issue arises, re login in the system.

REQUIREMENTS: must have internet connectivity

9)Use Case Template: 9

Description: Access the question paper

Actor: Student

#### FLOW OF EVENTS:

i)enter the subject name  $\rightarrow$  click open the available question paper  $\rightarrow$  question paper will be stored in the cloud and can be accessed on drive.

ii) if unable to access : refresh, still the issue arises, re login in the system.

REQUIREMENTS: must have internet connectivity and drive/cloud account

10)Use Case Template: 10

Description: View events updates

Actor: Student FLOW OF EVENTS:

i)click open the new updates/announcements

ii)if unable to access : refresh, still the issue arises, re login in the system.

REQUIREMENTS: must have internet connectivity

11)Use Case Template: 11

Description : Vote Actor : Student

#### FLOW OF EVENTS:

i)select the desired candidate under different roles/posts given → submit

ii))if unable to vote : refresh, still the issue arises, re login in the system.

REQUIREMENTS: must have internet connectivity

12)Use Case Template: 12

Description: Can register for events(Participating in events)

Actor: Student

#### FLOW OF EVENTS:

i) select an event  $\rightarrow$  enter name  $\rightarrow$  enter contact details  $\rightarrow$  submit valid answer for "how do you wish to contribute"  $\rightarrow$  submit

ii)if unable to respond : refresh, still the issue arises, re login in the system.

REQUIREMENTS: must have internet connectivity

# 4. System Features

# 4.1 System feature 1

USER CLASS 1: Students

- 4.1.1 Download mobile application
  - A user should be able to download the mobile application through either an application store or through the provided link. The application should be free to download.

## 4.1.2 User registrations

 Given that a user has downloaded the mobile application, then the user should be able to register through the mobile application. The user must provide name, phone no., password and email address. The user can choose to provide a regularly used phone number.

#### 4.1.3 User Login

• Given that a user has registered, then the user should be able to log in to the mobile application.

#### 4.1.4 Log Out

• Given that a user has registered, then the user should be able to log out from the application .

#### 4.1.5 Events

• Given that a user is logged in to the mobile application, then the user can volunteer and register for an event by providing their basic details.

#### 4.1.6 Vote

• Students can vote for their desired candidates.

#### 4.1.7 No match found

 If no match is found the user should be informed but kept on the search page in order to get the possibility to conduct a new search right away.

# 4.2 System Feature 2

USER CLASS 2: Teacher

4.2.1 Log in using given Teacher ID

In order to login, teachers must use the teacher id provided to them. Every teacher of the department must use the same process in order to login.

#### 4.2.2 Log Out

•Given that a user has registered, then the user should be able to log out from the application.

#### 4.2.4 Manage information

- •In order to manage information the teacher should be logged in.
- Will be able to post notices, make announcements, create polls for voting and assign roles.

# 5. Other Nonfunctional Requirements

## 5.1 Performance Requirements

Performance of the app depends upon the specifications of your android device and how well up to date it is.

## 5.2 Software quality attributes

- <u>AVAILABILITY</u>: App once installed will provide all its services 24\*7
- MAINTAINABILITY: Easy to maintain.
- <u>USABILITY</u>: Application can be used again and again without distortion.
- ACCESSIBILITY: It can be accessed on any android device.

# **6.Other Requirements**

<Define any other requirements not covered elsewhere in the SRS. This might include database requirements, internationalization requirements, legal requirements, reuse objectives for the project, and so on. Add any new sections that are pertinent to the project.>

# **Appendix A: Glossary**

<Define all the terms necessary to properly interpret the SRS, including acronyms and abbreviations. You may wish to build a separate glossary that spans multiple projects or the entire organization, and just include terms specific to a single project in each SRS.>

# **Appendix B: Analysis Models**

<Optionally, include any pertinent analysis models, such as data flow diagrams, class diagrams, state-transition diagrams, or entity-relationship diagrams.>

# **Appendix C: To Be Determined List**

<Collect a numbered list of the TBD (to be determined) references that remain in the SRS so they can be tracked to closure.>