Group members:

Aayush Adoni(img 2020001@iiitm.ac.in)
Lav Kush meena(img 2020034@iiitm.ac.in)
Patil Shahu Shivaji(img 2020048@iiitm.ac.in)

Software Requirement Specification

Topic: A Social Interaction Website For College.

Introduction

a. Objectives of the project -

The main function of the social networking system of the campus is to facilitate and encourage information and knowledge sharing and knowledge creation on campus.

In particular, the key functions of the social media platform are to support online communication, sharing and collaboration in the learning, teaching and research of institutional users.

Information sharing and knowledge creation are closely related and continuously influenced. Because the college social network system provides direct support for information sharing and indirect support for knowledge creation.

Students are among the most active users of online internet services, especially emerging services including social networking services. As this social networking site is related to college campus activities, it will increase the chances of being used by the faculty members and students.

This is a great benefit of this project as it will develop students and intellectuals alike to strengthen their academic and collaborative connections.

b. **Scope of the project -** The main idea behind it is to share the job-related details posted by placement officers via adding a post which can be read by all the students as well as faculty using the website. This web application can be handled by the admin and manage students as well as faculty.

Students can register and login into the system once their registration is approved by the admin. Students' posts are first sent to the admin for approval. It keeps the system stable by not posting any spam or miscellaneous content on the web.

Students can register and join the program once their registration has been approved by the administrator.

Once a student has entered the program, he/she can write and submit articles on a variety of topics of their choice. He/she can communicate to other students.

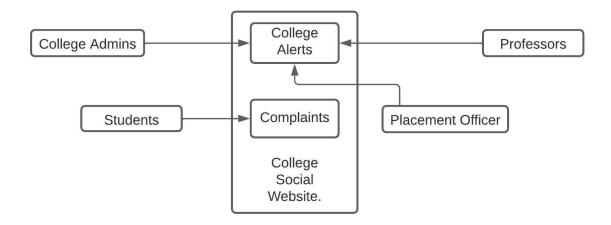
Users can also upload photos to their posts.

Users can view the News Feed posted by each student and faculty member.

Admin can approve and reject the student registration and admin can remove the posts.

System Environment

The College Social Website has four active actors. College Admins who post alerts about meetings/events, Placement Officers posting internship alerts, Professors posting lecture/project details and Students who react to these alerts and give suggestions.



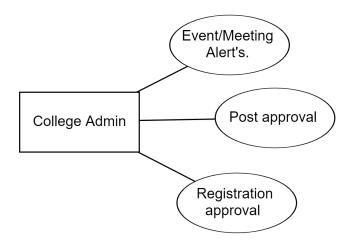
Functional Requirements Specification

This section outlines the use cases for each of the active roles separately.

College Admins, Placement Officers, Professor and Students have multiple use cases.

College Admins Use Case:

Use Case: Alerts of events/meetings, Students post approval, Registration approval.



Description: Is on number one on the hierarchy of control over the website, He/She generates event alerts, approves a student post to avoid miscellaneous content, approves the registration form to avoid any person outside the college from joining.

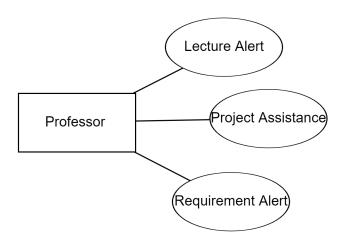
Initial Step-By-Step Description:

Before this use case can be initiated, the Admin has already logged in on the website.

- 1. The Admin writes the alert in the description box.
- 2. Choose who can see the alert.
- 3.Clicks the Post button.
- 4. The System generates a text section for the alert where the recipients can reply to the same.

Professor Use Case:

Use Case: Lecture updates, Projects assistance, Requirement alerts.



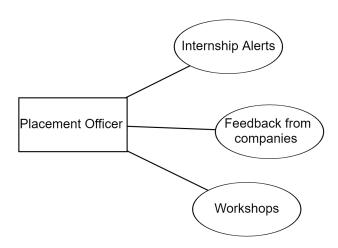
Description: Professor gives updates on lectures and helps students on projects, they can also give alerts on lab assistant requirements and many other things.

Initial Step-By-Step Description:

Before this use case can be initiated, the Professor has to be registered on the database of the website.

- 1. The Professor writes the lecture details in the description box.
- 2. If any assistance is required by the students the Professor can answer the query posted by the students.
- 3. Post about any requirements can be done along with its details.

Placement Officer Use Case:



Use Case: Alerts of internship, Collecting feedback from the companies, Organise entrepreneurship workshops.

Description: Placement Officer gives updates Companies looking for interns, they develop an entrepreneurship mindset by organising workshops.

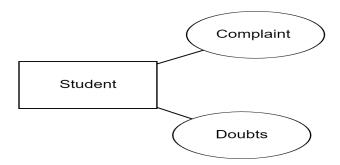
Initial Step-By-Step Description:

Before this use case can be initiated, the Professor has to be registered on the database of the website.

- 1. The Professor writes the lecture details in the description box.
- 2. If any assistance is required by the students the Professor can answer the query posted by the students.
- 3. Post about any requirements can be done along with its details.

Students Use Case:

Use Case: Post complaints/suggestions, Ask for Assistance.



Description: Students can post their complaints/suggestions regarding administration, Ask for assistance from professors/Seniors.

Initial Step-By-Step Description:

Before this use case can be initiated, the Student has to be registered on the database of the website.

- 1. The Student Post about the complaints/Suggestion regarding administration.
- 2. If any assistance is required he/she will post about it and a professor or student will reply to the post.

Update Information use cases

Use Case: Update Student



Description: The Admin enters a new Student or updates information about a current Student in the database.

Initial Step-By-Step Description:

Before this use case can be initiated, the Student has to be registered on the database of the website.

- 1. The Admin selects to Add/Update Student.
- 2. The system presents a choice of adding or updating.
- 3. The Admin chooses to add or to update.
- 4. If the Admin is updating an Student, the system presents a list of Student to choose from and presents a grid filling in with the information; else the system presents a blank grid.
- 5. The Admin fills in the information and submits the form.
- 6. The system verifies the information and saves the information in the database.

Use Case: Update Placement Officer



Description: The Admin enters a new Placement Officer or updates information about a current Placement Officer in the database.

Initial Step-By-Step Description:

Before this use case can be initiated, the Placement Officer has to be registered on the database of the website.

- 1. The Admin selects to Add/Update Placement Officer.
- 2. The system presents a choice of adding or updating.
- 3. The Admin chooses to add or to update.
- 4. If the Admin is updating a Placement Officer, the system presents a list of Placement Officers to choose from and presents a grid filling in with the information; else the system presents a blank grid.
- 5. The Admin fills in the information and submits the form.
- 6. The system verifies the information and saves the information in the database.

Use Case: Update Professor.



Description: The Admin enters a new Professor or updates information about a current Professor in the database.

Initial Step-By-Step Description:

Before this use case can be initiated, the Placement Officer has to be registered on the database of the website.

- 1. The Admin selects to Add/Update Professor.
- 2. The system presents a choice of adding or updating.
- 3. The Admin chooses to add or to update.
- 4. If the Admin is updating a Professor, the system presents a list of Professor to choose from and presents a grid filling in with the information; else the system presents a blank grid.
- 5. The Admin fills in the information and submits the form.
- 6. The system verifies the information and saves the information in the database.

Use Case: Update Complaint Status.



Description: The Admin updates about a complaint made by a student.

Initial Step-By-Step Description:

- 1. The Admin selects the complaint section from the main page of the website.
- 2. The system presents a list of complaints along with their subject.
- 3. The Admin chooses a complaint.
- 4. The system gives a text box to the admin to write about the status about the selected complaint, this status is only visible to the student who wrote a complaint.

Use Case: Remove Complaint.



Description: The Admin removes a complaint after the required thing is done.

Initial Step-By-Step Description:

- 1. The Admin selects the complaint section from the main page of the website.
- 2. The system presents a list of complaints along with their subject.
- 3. The Admin chooses a complaint.
- 4. The system removes the selected complaint from the list.

Use Case: Assistance Post.



Description: The Student Post about the help needed by him/her.

Initial Step-By-Step Description:

- 1. The Student selects the Assistance section from the main page of the website.
- 2. The system presents a text box in which the student describes the problem .
- 3. The Student chooses whom to ask for help from the professor or seniors.
- 4. The Student posts the problem.

User Characteristics

The Admin, Professor, Placement officer, Students are expected to be Internet literate and be able to use a search engine.

The main screen of the Website will have divided categories like "Complaints, Suggestions, Assistance, etc".

Non-Functional Requirements

The Website will be hosted on a server with high speed Internet capability.

The College Admin will contain an Access database. Access is already installed on this computer and is a Windows operating system.

Requirements Specification:

External Interface Requirement:

It's a web app so users will use a web browser to use the website. It has a sign in page for users to sign in into the website. First time users need to fill in their details to sign up. Admin will approve the registration. After logging in to the system the user will be shown his profile and wall containing posts by the user's friend. The user is given log-out options, to search for people and change his / her personal settings on his / her homepage.

Functional Requirements:

i. User registration:

Use case name	Registration
Precondition	The web is displayed with sign up and sign in options
Path	The user search the website with name
Postcondition	Signed up will be displayed
Description	User will create an account if there isn't any existing account, is associated with a user email id. User must enter account details such as name, email-id, contact number, date of birth and password. These are required fields and account creation cannot proceed unless these are completed. The user is registered after this information has been verified and the user agrees to the terms and conditions. The contact number should be a 1- digit number field. First and last name mustn't Have more than 18 characters. password must be at least 8 characters long and must be at least 1 letter & consisting of at least one uppercase letter and lower case and special character and number
Dependency	none

ii. College admin:

Use case name	admin
Description	college admin should be able to approve the registration and post of other students. Admin should be able to post alerts of events and meetings.
Dependency	none

iii. Professor use case:

Use case name	professor
Description	The professor can give lecture alerts and
	provide assistance on projects
Dependency	login use case

iv. Faculty list use case:

Use case name	Faculty list
Precondition	The user has accessed the main page of
	website
Path	The user select the faculty list option
Postcondition	Faculty list will be shown
Description	It will show the faculty members of college
Dependency	Login use case

v. Login:

Use case name	login
Precondition	The web is displayed with sign up and sign in
	options
Path	The user search the website with name
Postcondition	Signed in will be displayed
Description	Users must be registered in order to log in.
	The entry will be an email id and login
	password. Password hash must match the
	password hash stored on the website. If the
	three attempts of the password are incorrect,
	captcha will appear.

	If more than 10 attempts are incorrect the account will be locked and an email will be sent to the user informing you of the incorrect password attempts. To open an account the user must click on the unlock link sent to him by email. if a user clicks on a forgotten password then a password reset link should be emailed to the user.
Dependency	Registration use case

vi. Complete profile:

Use case name	Complete profile
Precondition	The user has entered on the main page
Path	
Postcondition	Your profile is completed
Description	it is the part of creating a user profile. User should be able to add educational information. These fields may remain blank. The user must log in and their account must be marked as authenticated in order to add education. The user must be able to add personal information language, gender, about the user and his or her interests. These fields may remain blank. The user must log in and their account must be marked as authenticated in order to add personal information.
Dependency	On login step

vii. Edit account information:

Use case name	Edit account information
Precondition	The user has accessed the main page of
	college social networking system
Path	The user select the edit account information option
Postcondition	Account information has edited
Description	it's also part of creating user profile. User should be able to edit account details such as name, date of birth, email id, phone number and address.
Dependency	login use case

viii. Privacy settings:

Use case name	Privacy settings
Precondition	The user has accessed the main page of college social networking system
Path	The user selects the privacy setting option
Postcondition	The privacy settings has been updated
Description	the user should be able to aet his account's visibility according to his preference whether to make personal information private or public. Personal information will be visible to public by default.
Dependency	login use case

ix. Show profile:

Use case name	Show profile
Precondition	The user has accessed the main page of
	college social networking system
Path	The user selects the show profile option
Postcondition	The user will be redirected on profile page
Description	all signed in user should be able to see other user's profile.
Dependency	Login and registration use case

x. Delete account:

Use case name	Delete account
Precondition	The user has accessed the main page of college social networking system
Path	The user selects the delete account option
Postcondition	The account will be deleted
Description	user should be able to delete his account permanently as he wish. This step will delete the user information and the account will be removed from friend list and other data will be cleared.
Dependency	Login and registration use case

xi. Add friend:

Use case name	Add friend
Precondition	The user has accessed the main page of college social networking system
Path	The user selects the add friend option
Postcondition	Friend request is sent
Description	The registered user must be able to send friendly requests to other users. User can submit a friend request to registered users. The user can search for a friend among registered users and send a friend request to him or her
Dependency	Login and registration use case

xii. Accept or ignore Friend request:

Use case name	Accept or ignore friend request	
Precondition	This user has sent you friend request	
Path	Friend requests	
Description	if the user receives a friend request from another user then the receiving user should have the option to accept or ignore the friend request. if the user chooses to accept a friend request the applicant is added to the hosting friend. if the user chooses to ignore the request the sender continues to see the status of the request as a sent request and the request is removed from the recipient queue.	
Dependency	Add friend use case	

xiii. Delete friend:

Use case name	Delete friend	
Precondition	The user has accessed the friend list	
Description	all registered user should be able to unfriend	
	other existing friends	
Dependency	Registration and Add friend use case	

xiv. Friend list:

Use case name	Friend list
Precondition	The user has accessed the main page of college social networking system
Path	The user selects show friend list option
Postcondition	The user will be redirected to friend list page

Description	whenever a user is on anyone's profile page they should have the option to view friends of the user profile currently open on the page. The user can have man + friends and the maximum number of friends displayed at the time will be 18 and the paint will be used to show more friends if the user has more than 18 friends.
Dependency	Login, registration and add friend use case

xv. Search user:

Use case name	Search user	
Precondition	The user has accessed the main page of	
	college social networking system	
Path	The user selects search option	
Postcondition	The searched user will be shown	
Description	The user should be able to search for their potential friends who are registered on the site. The user will enter a friend's name and click on the search after which search results will show all people registered on the site with the search term. then the search results are displayed, the maximum number of results displayed at the time will be 18 and the pager will be used to display more results.	
Dependency	Login use case	

xvi. Post:

Use case name	post	
Precondition	The user has accessed the main page of	
	college social networking system	
Path	The user selects add post option	
Postcondition	The user will be redirected to a blank box that takes input as english letters	
Description	the registered user can share the post with his friends. The user can enter the post in the selected text area and by clicking the post button it should be visible to the user and his friends	
Dependency	Login, registration and add friend use case	

xvii. Remove post:

Use case name	Remove post	
Precondition	The user has accessed the post options	
Path	The user selects remove post option	
Postcondition	The post has been removed will be shown	
Description	the user can remove his or her post. After removing the post it won't be visible to others. Admin should be able to remove the post.	
Dependency	Post use case	

xviii. Placement information use case:

Use case name	Placement information	
Precondition	The user has accessed the main page of website	
Path	The user will select the placement information option	
Description	This use case will show the placement information of previous years and also give alerts on current placement and internships	
Dependency	Login use case	

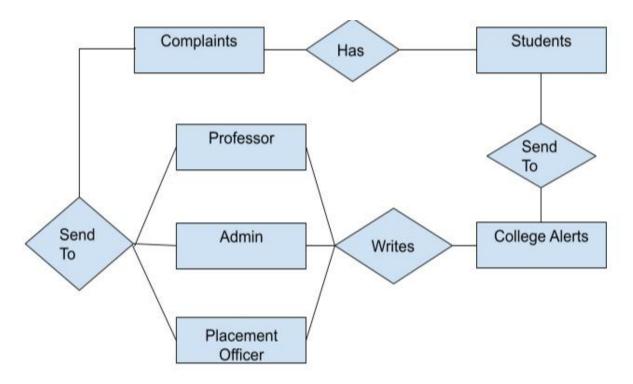
xix. Alumni:

Use case name	alumni
Precondition	The user has accessed the main page
Path	The user will select the alumni option
Description	This will connect students with alumnus . the alumnus will be able to clear the doubts of students related to placement and internships.
Dependency	Login step

• Logical Structure of the Data

The logical structure of the data to be stored in the internal College Social Website Manager

Database is given below:



Logical Structure of the College Social Website

• The data descriptions of each of these data entities are as follows:

Collage Admins Data Entry:

Data Item	Туре	Description
Name	Text	Name of admin
Email Address	Text	Internet address
Admin.ID	Text	Unique Identification of Admin

Professors Data Entry:

Data Item	Туре	Description
Name	Text	Name of Professor
Email Address	Text	Internet Address
Pr.ID	Text	Unique Identification of Professor

Placement Officer Data Entry:

Data Item	Туре	Description
Name	Text	Name of Placement Officer
Email Address	Text	Internet Address
Of.ID	Text	Unique Identification of Placement Officer

Student Data Entry:

Data Item	Туре	Description
Name	Text	Name of Student
Email Address	Text	Internet Address
St.ID	Text	Unique Identification of Student
Complaints	Text	Queries about alerts
History	Text	Comments on alerts

Data Item	Туре	Description
Name	Text	Heading of Alert
Content	Text	Body of Alert
Sent By ID	Text	ID of an entity who have sent alert
Sent Date	Date	Date of alert

Complaints Data Entry:

Data Item	Туре	Description
Name	Text	Heading of Complaint
Content	Text	Body of Complaint
Sent By ID	Text	ID of student who has sent alert
Sent Date	Date	Date of Complaint

• Security:

The server on which the College Admins, Professors, Placement Officers will have its security to prevent unauthorised write/delete access. There is a restriction on reading access.