## Educational Networking Tool for College Students

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# **Project Summary**

Educational Networking Tool for College Students aims to create a website that allows college-level students and faculty across the country to become part of an academic community dedicated to education and learning from each other.

# Functional Requirements Specification

 ${\bf System}$ 

End User

1.Student 2.Faculty

Actor and goals

## Use Case

#### 0.1 UC-1: Register

End User creates a new account on the website. This will allow them to create a profile, add and remove their courses, and ask and answer questions.

#### 0.2 UC-2: Login

End User logs into the website. This allows them to access the full features of the website, such as asking and answering questions, as well as information specific to their account, such as school affiliation and personal info.

#### 0.3 UC-3: Ask

End User asks a new question related to a course that they have enrolled in. 1.End User types up a question (this is done from a classroom page, which is where some of the question's metadata comes from. 2.The System searches database for similar questions and displays them to the user while they are typing.

#### 0.4 UC-4: Answer

End User posts an answer to an existing question. They may have seen this question from their own classroom page, or various other pages on the site which display question feeds, such as the main page or the student center page.

#### UserManageCourses

End User manages the courses they are enrolled in. This includes either adding a new course to their enrollment list or deleting a course they are already enrolled in.

## $0.5\quad UC\text{-}6:\ Admin Manage User-Admin Manage Courses$

The Admininistrator modifies user's data, such as whether they are banned or not. Although we would like to eventually create a front end for this. The Admininistrator manages courses, including modifying existing courses, adding new courses, and removing courses that are no longer offered.

# Class Diagram and Interface Specification

Our class diagrams are divided up into two sections, the class diagram for the front end and the backend. Even though many of the classes are similar between them, they may not be exactly the same. For example, we may use the same database class for both the frontend and backend subsystems, but we are not bound to do this. We have implemented them separately so that two teams can break up and each work on their own system and not have to wait on each other at all.

#### 0.1 Lanuage

In this projects using language html,css, javascript, jquery, core python.

#### 0.2 Framework

In this project django framework, and core python , using window operating. system.

# System Architecture and System Design

### 0.1 Architectural Styles

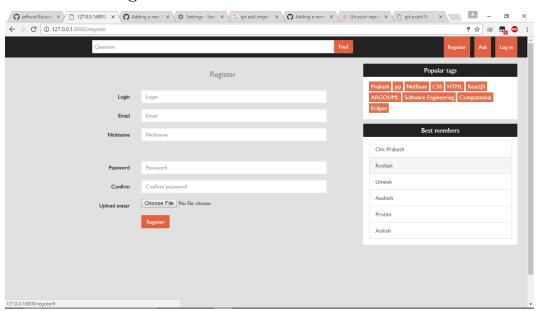
The client can send a request to the website(server). This request could be made for achieving goals such as browsing the website,adding/removing courses, viewing/asking questions, replying to a questions thread, etc. The server will receive this request and would go through the database accordingly to retrieve the corresponding data that is required to accomplish a certain task.

#### 0.2 Subsystems

1. Front-End processes: This consists of the client and the application layer of the System. This creates a connection with the client and the database. For example, when a web browser is used to access and send requests to the website, the subsystem will receive. 2. Back-end processes: The system will also be responsible several back-end processes. For example, it will go through the database and manage the Ask and Display list.

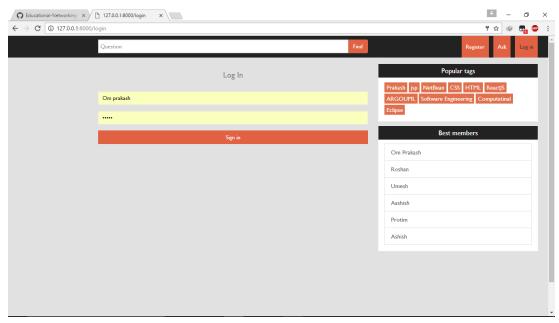
# User Interface Design and Implementation

## 0.1 UC-1: Register



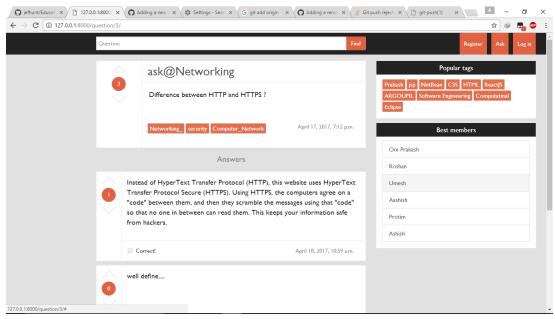
If the user does not have an account, a link "Register Now!" is provided in UC-1 Login. This link takes the user to the register page. This register page allows new users to create their own account.

## 0.2 UC-2: Login



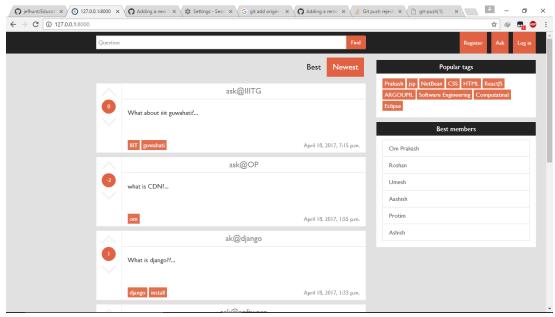
This webpage allows a user to log in by entering in their email and password in the "Email" and "Password" field respectively, and clicking the "Login" button.

UC-3: Ask- UC-4: Answer



This question page displays the question and the existing answers to the question. The Classroom page allows a user to enter in a question title and a question description and then click Ask.

#### 0.3 Home



This home page display the all question and exitsting answer and setting option. The user can't give direct answer without register.

# History of Work: Current Status of Implementation

The first report included interaction diagrams, domain analysis etc. These were use to describe the project in a basic way. The project was broken into parts so as to create a distributive system where each team member worked on a certain part of the project. The actual planning and compiling of the first report stirred up interest in how the various parts that make up the project were going to work. It led to minor individual research in areas such as social networking, forums etc.

# Key Accomplishments of the Project

- Understanding and mastering python.
- Learning to work in sync with a development team.
- Understanding SQLI3 databases and how to manage data.
- $\bullet$  Understanding and implementing software engineering principles .

# Conclusions and Future Work

#### 0.1 Technical Challenges

Out of the 2 group members, only 1 had any previous experience with web development, python and SQLI3. We had to set up our own server and install Apache, MySQL, PHP, and phpMyAdmin, which none of us had ever done before. Once we had our development environment set up we had to start the actual creation of the webpage. This is where our second technical challenge came in.