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**E-Learning System**

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**Document Approval**

The following Software requirement Specification has been accepted and approved by the following:

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**Chapter 1**

Introduction

# 1. Introduction

E-learning (Electronic Learning) is web based system to provide free online learning. The main objective of E-Learning is to offer free education to the learners who can save a lot of time and give fast results. Students can easily get access to all the educational information, audio & video lectures, books, lecture notes and take quizzes according to their subject and interest.

The main aim of E-Learning is to facilitate the Users with friendly environment of study in which Users can easily take lectures of all categories of computer science without going to any classroom. The Users can post the questions and answers on the system and another Users can answer to those question. Users can discuss different topics of said department on the system as well.

## Purpose

The foremost purpose of this project (E-Leaning) is to develop a system which will be able to provide a facility to the students, teachers and other Users in a way that the learning development and judgment does not remain limited to the four walls of the classroom.

Another objective of this project is to find an easy way to provide a center of excellence in education by providing all the study material like notes, books, audio & video lectures and quizzes available to student online. The students who belong to distant areas or have busy routine who have to earn and learn at the same time are unable to attend regular classes. Such students will be facilitated through this project who can take and download videos lectures of all the subjects and can take quizzes to check their ability. They can ask questions from one another and discuss difficult points.

* 1. **Existing System:**

In existed system, System provides the facility of online learning only. But it does not provide the facility of taking quizzes and video lectures. Moreover it provides books, notes and lectures with cost. It offers limited categories of computer science. It does not provide the facility of posting and answering questions.

* + 1. **Problem in Existing System:**

In existing system all the categories of computer science are displayed on one page and User gets confused in searching and finding required material. There are limited questions of quizzes with no negative marking. Moreover quality of video lectures is also low.

* 1. **Purposed System:**

Proposed system provides a solution to the problems of existing system by extending its facilities as fellow.

* New system supports ‘N’ number of User.
* In new system User can post questions and answer the questions as well.
* This system provides the facilities of quiz and video lectures.
* In this system, only registered User can free downloads video lectures, books, notes etc.
* Unregistered User can only view the books, notes, lectures etc.
* This system provides more categories of computer science than existing system.
  1. **Scope**

This project will be very useful for those student who can’t attend classes regularly due to belonging distant areas and those who have busy daily routine. Further, it can also be Useful for all other Users who want to learn online. It will provide required knowledge about all the categories of computer science. It will be beneficial for those Users who want to learn all aspects of computer science. User can post questions and answers on the system. This system is designed in a way that it can be easily manageable and will provide more features to every User. This system is only accessible to the administrator who have a valid Username and password.

This system also provide many facilities such as:

* ‘N ’number of Users can get access to E-learning.
* Provide lectures, notes and books
* Based on the requirement of Users.
* All the data and quizzes (According to subjects) can be uploaded by administrator.
* Viewing the results of the quiz.
* Questions and answers can be posted on the system
  1. **Definitions, Acronyms, and Abbreviations**
* **Definition**

The System-(Composition of backend (accessing database) and frontend (Web pages).

* **Acronyms and abbreviations:**
* **GUI** - Graphical User Interface
* **ASP** - Active server pages
* **UCD** - Use Case Diagram
* **UML** - Unified modeling Diagram
* **ERD** - Entity Relationship Diagram
* **SRS** - Software Requirements Specification

## 1.6 Overview

This system is accessible to all those Users who want to learn at home. This system provides all kind of computer science knowledge to the User. This system offers to User to conduct online quizzes and download books, lecture notes and audio, video lectures. Further, User will be able to post questions and answers on the system

* 1. **Advantages of E-Learning System**
* This system is most beneficial for teachers and students
* Student can easily take lectures at home
* Student can be able to download books, video lectures.
* Student can take online test
* All books, notes and lectures are free provided to Users.
* Users can be discuss topics with other Users thorough posting questions and answers
* And also un-registered User can be able to view all the system
* Un-registered User can be read lectures, books.
* It saves a lot of time of User.

**Chapter 2**

Overall Description

# 2. The Overall Description

## 2.1 Product Perspective

E-Learning system is the replacement of the manual work. It provide quizzes online where there is no Use of paper, pen to solve the test. Furthermore time of checking these tests can also be saved. This system provides all types of computer science knowledge to the Users. All computer science books, audio & video lectures, notes and quizzes are provided by this system. This system can be handled only by the administrator. This system provides forums for the Users

## 2.2 Product Functions

* Only administrator can upload audio & video lectures, notes, quizzes etc.
* Only administrator can delete, update, add and view all question answers that are posted by Users.
* Only administrator can manage all the User accounts and privacy policy of the system.
* Only registered Users can post answers and question on the system.
* Only registered Users can download all kinds of data from system.
* Unregistered User can only views the system
* Unregistered User can read online books and notes only.

## 2.3 User Characteristics

This system have three Users that can interact with system and those are administrator, registered User and unregistered User.

### **2.3.1 Administrator**

This User is able to add, delete and modify data on the system and can delete, edit and post answers of questions on the system that are posted by Users.

### **2.3.2 Registered User**

This Users is able to register, download all data from the system and can post answers and questions on the website.

## 2.3.3 Unregistered User

This User is able to search and view all the categories on the system and also can read all the question and answer on the system. It can also be able to read books and notes online.

## 2.4 General Constraints

### 2.4.1 **Technology Constraints:**

This system is web based and it will be implemented using ASP.Net Used for front end (web pages) and SQL for server back end (database).

**2.4.2 Interface Constraints:**

This system is web based so it should be works on major web browser like Internet explorer, Opera, Google chrome, Mozilla etc.

**2.4.3 Safety and Security Constraints:**

This system is used by only authenticated Users, any unauthenticated User should not be able to access and change the data

## 2.5 Assumptions and Dependencies

The number of facts that may affect the system requirements that are define:

* If database engine is corrupted it effects the system.
* If back up not saved, then any error may be lost some data.
* If privacy not tight then our system may be hacked.

**Chapter 3**

Specific Requirements

**3.1 Functionality:**

**3.1.1 Login**

**3.1.1.1 Introduction**

Administrator can be able to login on the system and only use admin account by administrator not any other user of the system.

**3.1.1.2 Input**

Enter User name and password to ensure that only the appropriate user is able to use the account

**3.1.1.3 Processing**

The system will be able to validate username and password.

**3.1.1.4 Output**

Admin is successfully login on the system.

**3.1.2 Upload Data**

**3.1.2.1 Introduction**

Administrator can be able to upload data like books notes, Audio & video lectures and quizzes.

**3.1.2.2 Input**

This feature will be available only for admin will be login to the system and select data and upload it

**3.1.2.3 Processing**

The system will be select, check the data and upload on the system.

**3.1.2.4 Output**

Data is uploaded on the system successfully.

**3.1.3 Delete Data**

**3.1.3.1 Introduction**

This feature is only available for the administrator for delete the from the system

**3.1.3.2 Input**

Admin will be able to select the data from the system

**3.1.3.3 Processing**

The system will be select, check the data and deleted from the system.

**3.1.3.4 Output**

Data is deleted from the system successfully.

**3.1.4 Update Data**

**3.1.4.1 Introduction**

This features will be available for the admin to update already uploaded data.

**3.1.4.2 Input**

Admin select the data and update/modify on the system

**3.1.4.3 Processing**

The system will be select the data and update on the system.

**3.1.4.4 Output**

Data is updated on the system successfully.

**3.1.5 Add new Category**

**3.1.5.1 Introduction**

Admin can login the system and add the new category. Admin can add books, lectures, notes and some others data .Admin can also add some different category related to computer science.

**3.1.5.2 Inputs**

Admin select the category and add it.

**3.1.5.3 Processing**

Different category related to computer science is added to the System.

**3.1.5.4 Output**

New category is added successfully on the system.

**3.1.6 Delete Category**

**3.1.6.1 Introduction**

Admin must be logged in to the system and delete the different category. Admin can delete the books, Notes, lectures and some others data. Admin can also delete the different category related to computer science.

**3.1.6.2 Input**

Admin can search and select the different category and delete it.

**3.1.6.3 Processing**

Different Category that is selected is deleted from the system.

**3.1.6.4 Output**

Different Category selected from the system is deleted successfully.

**3.1.7 Update Category**

**3.1.7.1 Introduction**

Admin must be logged in to the system and update the different category. Admin can update the books. Notes, Lectures, and some others data. Admin can also update different category related to computer science.

**3.1.7.2 Input**

Admin can search the different category and admin can also add some new data change data and replace the data form the system then new category is updated.

**3.1.7.3 Processing**

Different category is added changed, replace and updated from the system.

**3.1.7.4 Output**

Category is change replace and updated from the system successfully.

**3.1.8 Display message and Notices**

**3.1.8.1 Introduction**

Admin can log in to the system and display messages, notices, books and some other data. Admin can also display the different category related to computer science.

**3.1.8.2 Inputs**

Admin type the different messages notices and display them from the system.

**3.1.8.3 Processing**

Different messages notices that is typed is display from the system.

**3.1.8.4 Output**

Different messages notices is display from the system is successfully.

**3.1.9 Add Answer**

**3.1.9.1 Introduction**

This feature will be for user and administrator but user cannot be able to delete the admin posted answers but admin delete the answers that are posted by user.

**3.1.9.2 Input**

Admin login on the system and search the question for post the system and type the question.

**3.1.9.3 Processing**

The system will be able to post the answer on the system.

**3.1.9.4 Output**

Answer is posted on the system successfully.

**3.1.10 Update Answer and questions**

**3.1.10.1 Introduction**

This feature will be for the admin to update already posted answers and questions.

**3.1.10.2 Input**

**S**electthe already posted question and answer on system and then modify

**3.1.10.3 Processing**

The system will be able to update the answer and question on the system.

**3.1.10.4 Output**

Question and answer updated on the system successfully.

**3.1.11 Delete answer and question**

**3.1.11.1 Introduction**

This feature will be for administrator for delete already posted question and answers from the system.

**3.1.11.2 Input**

Admin login on the system and select the question and answer for deletion from the system

**3.1.11.3 Processing**

The system will be able to delete the answer and question from the system.

**3.1.11.4 Output**

Question and answer is deleted from the system successfully.

**3.1.12 Change privacy policy**

**3.1.12.1 Introduction**

This feature will be for administrator for change the privacy of the system

**3.1.12.2 Input**

Admin go to the settings and change the privacy policy of the system.

**3.1.12.3 Processing**

The system will be verify the person and changing that are perform on the system

**3.1.12.4 Output**

Privacy policy is changed successfully on the system.

**3.1.13 Signup**

**3.1.13.1 Introduction**

User can registered their self for login. For registration user can do signup processes.

**3.1.13.2 Input**

For signup user enter username, password, email address, gender and date of birth for registered their self.

**3.1.13.3 Processing**

The system will be able to verify the information of user.

**3.1.13.4 Output**

User is successfully registered their self.

**3.1.14 Login**

**3.1.14.1 Introduction**

User can be able to login on the system and only use user account for login on the system.

**3.1.14.2 Input**

User enter username and password for login.

**3.1.14.3 Processing**

System verify the username and password.

**3.1.14.4 Output**

User successfully login on the system.

* + 1. **View**
       1. **Introduction**

Registered users can visit the system and view the required data. Registered users can also view the books, view the lectures, notes and some others required information when he visit the whole system.

**3.1.15.2 Inputs**

Registered users search the required data and view data.

**3.1.15.3 Processing**

Registered users can view whole data when he visit the system.

**3.1.15.4 Outputs**

View the lectures, notes, books and some others details information successfully.

* + 1. **Add question**

**3.1.16.1 Introduction**

This feature allow the registered user to post question on the system. For post question user first login on the system.

**3.1.16.2 Input**

Registered User enter username and password.

**3.1.16.3 Processing**

System verify the username and password.

**3.1.16.4 Output**

User successfully post question on the system.

* + 1. **Add Answer**

**3.1.17.1 Introduction**

This feature will be for user to post the answer of the question. For posting answer user must be login.

**3.1.17.2 Input**

User login on the system and search the required question and post the answer.

**3.1.17.3 Processing**

The system will be able to post the answer on the system.

**3.1.17.4 Output**

Answer is posted on the system successfully.

* + 1. **Reset Password**

**3.1.18.1 Introduction**

This feature allow the user to reset the password if user forget the password.

**3.1.18.2 Input**

User enter username, old password and also enter new password for reset the password.

* + - 1. **Processing**

System verify the user and set the new password.

**3.1.18.4 Output**

System reset the password successfully.

* + 1. **Download**

**3.1.19.1 Introduction**

Registered user download lectures, notes, books, presentation and also download video and audio lectures from the system.

**3.1.19.2 Input**

User enter username/email is and password for login.

* + - 1. **Processing**

System verify the user and allow the users to download the lectures etc.

* + - 1. **Output**

User successfully download the lectures, notes, books and presentation etc.

* + 1. **Logout**

**3.1.20.1 Introduction**

This feature allow the user can logout their self after login.

**3.1.20.2 Input**

Go to setting and logout.

* + - 1. **Processing**

System check the user is login before logout.

* + - 1. **Output**

User successfully logout.

* + 1. **View**

**3.1.21.1 Introduction**

Non registered users can visit the system and view the required data. Non registers users can also view the books and view the lectures and notes and some others required information when he visit the whole system.

**3.1.21.2 Inputs**

Non registered users search the required data and view data.

* + - 1. **Processing**

Non registers users can view whole data when he visit the system.

* + - 1. **Outputs**

View the lecture notes r books and some others details information successfully.

**3.1.22 Search**

**3.1.22.1 Introduction**

Non registers users can visit the system and search the required data. Un- registers users can also search the books, lectures, notes, and some others required information when he visit the whole system.

**3.1.22.2 Inputs**

Non registers users search the required data.

**3.1.22.3 Processing**

Non registers users can search the required data. When he visit the system.

**3.1.22.4 Outputs**

Search the lectures, notes, books and some others details information successfully.

**3.2 External Interface Requirements**

### **3.2.1 User Interfaces**

This system is a Web application so it should provide User friendly environment. It should be easy to Use all the commands for the User and User easily navigate from one place to another. It should have a professional look and easy navigation for the User

**3.2.2 Hardware Interfaces**

No other specific hardware is required to run the system. The hardware works well during peak times for the web servers

### **3.2.3 Software Interfaces**

This system should support all browser that makes the system easy to access and Use for the User. The backend of the system, for example database services designed in efficient because all Users want to get access to all the data in short time.

### **3.2.4 Communications Interfaces**

This system provide online communication using forums. Users will be able to exchange information, question and answers to one another. Moreover this interface is easily accessible and easy to Use.

**3.3 Functional Requirements**

**3.3.1 Administrator Requirements**

|  |  |
| --- | --- |
| **Req. No:** | **Description** |
| **3.3.1.1** | Administrator account can be managed by the Administrator. |
| **3.3.1.2** | Administrator can login to the system. |
| **3.3.1.3** | Administrator can able to upload   * Audio lectures * Video lectures * Lecture Notes * Quizzes * Books |
| **3.3.1.4** | Administrator can change the data of the system. |
| **3.3.1.5** | Administrator can change the data of category.   * Update data * Delete data |
| **3.3.1.6** | Administrator can be able to view the feedback sending from the Users. |
| **3.3.1.7** | The Administrator can get access to all the information about all the Users of the system. |
| **3.3.1.8** | All User accounts can be managed by the Administrator. |
| **3.3.1.9** | Administrator can also change the privacy policy of the system. |
| **3.3.1.10** | Administrator can also post a question on the system. |
| **3.3.1.11** | Administrator can answer the question asked by the User on the system. |
| **3.3.1.12** | Administrator can   * Delete the question * Delete the answer   Posted by the User. |
| **3.3.1.13** | Administrator can update question and answers that are posted from User. |

|  |  |
| --- | --- |
| **Req. No.** | **Description** |
| **3.3.2.1** | User must be registered their self for login to the system. |
| **3.3.2.2** | For signup, User required following things.   1. First name 2. Last name, 3. Email ID, 4. Password 5. Date of birth 6. Gender 7. Submit signup |
| **3.3.2.3** | Registered Users enter Username, E-mail address and password for prove their Identity. |
| **3.3.2.4** | User can also change the password after login. |
| **3.3.2.5** | After login, User check all categories detail. |
| **3.3.2.6** | Register User access all type of data about different categories of computer science. |
| **3.3.2.7** | Register User can view the lectures about category. |
| **3.3.2.8** | Register Users can download lectures, notes, presentation and books etc. from system. |
| **3.3.2.9** | Register User can also download video lectures form system. |
| **3.3.2.10** | Register User can also send feedback to administrator. |
| **3.3.2.11** | Registered User also give online quiz. |
| **3.3.2.12** | Registered User post questions. |
| **3.3.2.13** | Registered User can also answer the questions. |
| **3.3.2.14** | Registered User can logout from the system |

**3.3.2 Registered User Requirements**

**3.3.3 Un-Registered User Requirements:**

|  |  |
| --- | --- |
| **3.3.3.1** | Non registers Users can visit the system |
| **3.3.3.2** | Non registers Users cannot download the lectures, notes, videos lectures, and audio lectures. |
| **3.3.3.3** | Non registers Users can search the computer science category. |
| **3.3.3.4** | Non registers Users can view the computer science category of the system. |
| **3.3.3.5** | Also search sub category of the computer science. |
| **3.3.3.6** | Non registers Users can read online book. |
| **3.3.3.7** | Non registers Users cannot give any query about any category |
| **3.3.3.8** | Non registers Users can also get information about registration and necessary for registration is email ID and passwords and some others detail. |
| **3.3.3.9** | Non registers Users can also read online lectures notes. |
| **3.3.3.10** | None register User visit the system for signup and search information about signup or login. |
| **3.3.3.11** | Non registers Users cannot give quiz. |
| **3.3.3.12** | Non registers Users cannot give Feedback. |
| **3.3.3.13** | Non registers Users cannot post question. |

## 

## Non-Functional Requirements

**3.4.1 Performance**

The system should be able to works properly with its all function on all major web browsers. It should not be slow due to heavy work, even peak hours without affecting service quality of the system

* + 1. **Reliability**

Reliability is measured only the basses of testing. Testing is a process of identifying the problems of system. The system is check with given any number of input.

Three types of testing can be done in testing phrase.

1. Unit testing
2. Integration testing
3. Acceptance testing
   * 1. **Availability**

The system function work properly on time. And the system should available to all the Users.

* + 1. **Security**

The system should be more secure. The system security on a server is high, because any unauthorized User not be able to access/delete any information of the system. The System should provide security to User using advance way of security or algorithms. The Username and password of a User should not share to any other.

* + 1. **Maintainability**

The system should be easy to maintain. For maintain system, backup data is stored. If any important data lost, using backup data can easily recovered

* + 1. **Portability**

The system should be portable. It can works on any environment or browser. Its functionality should not be changed on any other browser or environment

* 1. **Use Cases\***

**3.5.1 Use Case # 01:**

**1. Use Case ID**:

SUcn01

**2. Use Case name:**

Login

**3. Use Case description:**

Administrator can login on the system using Administrator account



**4. Actor**:

**4.1** **Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator should login.

**6. Flow of event:**

* 1. **Primary flow of event**:

1. Enter User name
2. Enter Password
3. Login

**6.2 Secondary flow of event:**

The Administrator can cancel the login task.

**7. System response /exception:**

The exception will occur when the Administrator enter the wrong Username or password.

**8. Special requirements:**

Username and password must be required for Administrator login.

**9. Post condition:**

After submitting right information properly, the Administrator can Use their account.

**Activity Diagram:**



**3.5.2 Use Case # 02:**

**1. Use Case ID:**

Ucno02

**2. Use Case name**:

Upload data

**3. Description:**

Administrator can upload data.

**Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Browse file
2. Upload

**6.2 Secondary flow of event:**

The Administrator can cancel the task.

**7. System responses and exceptions:**

The exception will occur when file is not found.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Upload data successfully on the system

**Activity Diagrams:**



**3.5.3 Use Case # 03**

**1. Use Case ID:**

Ucno03

**2. Use Case name**:

Delete data

**3. Description:**

Administrator can delete data from the system

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Select the data
2. Delete

**6.2 Secondary flow of event:**

The Administrator can cancel the task.

**7. System responses and exceptions:**

The exception will occur when file is not found.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Date is deleted successfully form the system

**Activity Diagram:**



**3.5.4 Use Case # 04**

**1. Use Case ID:**

Ucno04

**2. Use Case name**:

Update data

**3. Description:**

Administrator can update data on the system.

**3.1 Use Case Diagram**

5

**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the data
2. Add new data at this place
3. Update

**6.2 Secondary flow of event:**

The Administrator can cancel the task.

**7. System responses and exception:**

When data is updated then system will response that data is updated successfully.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Data is updated successfully on the system.

**Activity Diagram:**



**3.5.5 Use Case # 05**

**1. Use Case ID:**

Ucno05

**2. Use Case name**:

Add new Category

**3. Description:**

Administrator can add new category on the system for the User.

**Use Case Diagram**

s.

**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must be logged in

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Select the Category
2. Add it

**6.2 Secondary flow of event:**

The Administrator can cancel the task.

**7. System responses and exceptions:**

The exception will occur when duplicate category is added

**8. Special requirements:**

N/A.

**9. Post conditions:**

New category is added successfully on the system.

**Activity Diagram**



**3.5.6 Use Case # 06:**

**1. Use Case ID:**

Ucno06

**2. Use Case name**:

Delete Category

**3. Description:**

Administrator can delete category from the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the category
2. Delete

**6.2 Secondary flow of event:**

The Administrator cancel the task.

**7. System responses and exceptions:**

Category is deleted successfully from the system.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Category is deleted successfully from the system.

**Activity Diagram:**



**3.5.7 Use Case # 07:**

**1. Use Case ID:**

Ucno07

**2. Use Case name**:

Update category

**3. Description:**

Administrator can update category on the system.

**3.1 Use Case Diagram:**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the category
2. Add new data/change data/replace data
3. Update

**6.2 Secondary flow of event:**

The Administrator can cancel the task.

**7. System responses and exceptions:**

Category is updated successfully from the system.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Category is updated successfully on the system.

**Activity Diagram**



**3.5.8 Use Case # 08**

**1. Use Case ID:**

Ucno09

**2. Use Case name**:

Display message and notices

**3. Description:**

Administrator can display notices and messages on the system for the User.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A  
**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 se flow of event:**

1. Type important notices/messages
2. Display

**6.2 Secondary flow of event:**

The Administrator can cancel displaying messages.

**7. System responses and exceptions:**

Messages are displayed or noticed on the system successfully.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Messages are displayed or noticed on the system successfully.

**Activity Diagram:**



**3.5.9 Use Case # 9:**

**1. Use Case ID:**

Ucno09

**2. Use Case name**:

Change privacy policy

**3. Description:**

Administrator can change privacy policy of the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Change the privacy policy
2. Save

**6.2 Secondary flow of event:**

The Administrator can cancel the privacy policy of the system.

**7. System responses and exceptions:**

Privacy policy of system is changed successfully.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Privacy policy of system is changed successfully

**Activity Diagram**



**3.5.10 Use Case 10:**

**1. Use Case ID:**

Ucno10

**2. Use Case name**:

Post answers

**3. Description:**

Administrator can post answers of the questions that are asked by the User on the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator/User must login

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Type the answer
2. Post

**6.2 Secondary flow of event:**

The Administrator can cancel the posting answer

**7. System responses and exceptions:**

Post answer on the system.

**8. Special requirements:**

Any Users can’t be able to delete this answers

**9. Post conditions:**

Answer is posted on the system successfully

**Activity Diagram:**



**3.5.11 Use Case # 11:**

**1. Use Case ID:**

Ucno11

**2. Use Case name**:

Delete question

**3. Description:**

Administrator can delete the question from the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must be logged in

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the question
2. Select the question
3. Delete question

**6.2 Secondary flow of event:**

The Administrator cancel the deletion of the question

**7. System responses and exceptions:**

Question remove from the system

**8. Special requirements:**

N/A.

**9. Post conditions:**

Question delete from system successfully

**Activity Diagram:**



**3.5.12 Use Case # 12:**

**1. Use Case ID:**

Ucno12

**2. Use Case name**:

Delete answers

**3. Description:**

Administrator can delete answers from the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The Administrator must be logged in

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the answer.
2. Delete

**6.2 Secondary flow of event:**

The Administrator cancel the deletion on the system.

**7. System responses and exceptions:**

Answer remove from the system.

**8. Special requirements:**

Answer only delete by administrator.

**9. Post conditions:**

Answer delete from system successfully

**Activity Diagram:**



**3.5.13 Use Case # 13:**

**1. Use Case ID:**

Ucno15

**2. Use Case name**:

Update question

**3. Description:**

Admin and User can update the questions on the system

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

User  
**5. Precondition**:

The admin/User must be log in

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the question
2. Modify/change/Add
3. update

**6.2 Secondary flow of event:**

The Admin/User can be able to cancel the updating of answer.

**7. System responses and exceptions:**

Change in answer successfully completed.

**8. Special requirements:**

User must be login with correct Username and password.

**9. Post conditions:**

Question updated successfully

**Activity Diagram:**



**3.5.14 Use Case # 14:**

**1. Use Case ID:**

Ucno14

**2. Use Case name**:

Update answers

**3. Description:**

Admin and User can update the answers on the system

**3.1 Use Case Diagram**



**4. Actor**

**4.1 Primary actor:**

Administrator

**4.2 Secondary actor:**

User  
**5. Precondition**:

The admin/User must be logged in

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the answers
2. Modify/change/Add
3. update

**6.2 Secondary flow of event:**

The Admin/User can be able to cancel the updating of answer.

**7. System responses and exceptions:**

Change in answer successfully completed.

**7.1 Exception:**

Invalid User

**8. Special requirements:**

User must be login with correct Username and password.

**9. Post conditions:**

Answer update successfully

**Activity Diagram:**



**3.5.16 Use Case # 15:**

1. **Use Case ID:**

Ucno15

1. **Use Case Name :**

Signup

1. **Description:**

Signup is used to create account.

**3.1 Use Case Diagram**

****

1. **Actors:**
   1. **Primary Actor:**

Registered User

* 1. **Secondary Actor:**

N/A

1. **Precondition:**

Email not be already registered.

1. **Flow of Events:**
   1. **Primary Flow of Event:**
2. Enter Full Name
3. Enter User name
4. Enter Password
5. Re-Enter Password
6. Enter Email
   1. **Secondary flow of Event:**

N\A

**7. System response/Exception**

After creating account the system response that the account created successfully.

**8. Special Requirements:**

Account is verify with 24 hours.

**9. Post Condition:**

User sign up successfully.

**Activity Diagram:**



**3.5.15 Use Case # 16**

1. **Use Case ID**

Ucno16

1. **Use Case Name :**

Login

1. **Description**

User can login for Use their account.

* 1. **Use Case Diagram**



1. **Actors:**
   1. **Primary Actor:**

Registered User

* 1. **Secondary Actor:**

N\A

1. **Precondition:**

Before login User cannot open account.

1. **Flow of Events:**
   1. **Primary Flow of Event:**
2. Enter User name, email address
3. Enter password
4. Login
   1. **Secondary flow of Event:**

User can cancel the login process

**7. System response/Exception**

Exception when User enter invalid email and password.

**8. Special Requirements:**

When User forget password, User can verify with phone number.

**9. Post Condition:**

Login process is successfully completed

**Activity Diagram:**

****

**3.5.17 Use Case # 17**

**1. Use Case ID:**

Ucno17

**2. Use Case name**:

View

**3. Description:**

Registered User can view data from the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Registered User, Un-Registered User

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The registered User must be logged in

**6. Flow of event**:

**6.1 Primary flow of event:**

1. Search the require data
2. View

**6.2 Secondary flow of event:**

The User cancel the task.

**7. System responses and exceptions:**

System responses that data view to User.

**8. Special requirements:**

N/A.

**9. Post conditions:**

Data successfully view from the system.

**Activity Diagram**



**3.5.18 Use Case # 18**

1. **Use Case ID:**

Ucno18

1. **Use Case Name:**

View category

1. **Description:**

Registered User can view all categories in detail.

**3.1 Use Case Diagram:**



1. **Actors:**
   1. **Primary Actor**

Registered User, Un- registered User

* 1. **Secondary Actor**

N\A

1. **Precondition:**

Invalid User cannot view category.

1. **Flow of Events:**
   1. **Primary Flow of Event**:
2. Search category
3. View
   1. **Secondary flow of Event**

User cancel the task

1. **System response/Exception:**

N\A

1. **Special Requirements:**

User must be registered.

1. **Post Condition:**

Registered User & Non-registered user view category successfully.

**Activity Diagram:**



**3.5.19 Use Case # 19**

1. **Use Case ID:**

Ucno19

1. **Use Case Name:**

Download

1. **Description**

User can download lectures, notes, presentation etc.

* 1. **Use Case Diagram** 

1. **Actors:**
   1. **Primary Actor:**

Registered User

* 1. **Secondary Actor:**

N\A

1. **Precondition:**

For downloading User must be login.

1. **Flow of Events:**
   1. **Primary Flow of Event:**
2. Enter User name
3. Enter password
4. Login
5. Download
   1. **Secondary flow of Event**:

N\A

1. **System response/Exception:**

If User is valid, System response will be that downloading is start.

1. **Special Requirements:**

For downloading User must be registered.

1. **Post Condition:**

Downloading process is completed.

**Activity Diagram**



**3.5.20 Use Case # 20**

**1. Use Case ID:**

Ucno20

**2. Use Case name**:

Post question

**3. Description:**

Registered User can post question on the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1 Primary actor:**

Registered user

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The user must be logged in

**6. Flow of event**:

* 1. **Primary flow of event:**

1. Type the question
2. Post

**6.2 Secondary flow of event:**

The registered user cancel the posting question from the system.

**7. System responses and exceptions:**

Question post on the system.

**7.1 Exception:**

**N/A**

**8. Special requirements:**

Admin can be able to delete the question of user.

**9. Post conditions:**

Question post successfully on the system.

**Activity Diagram:**



**3.5.21 Use Case #21**

**1. Use Case ID:**

Ucn021

**2. Use Case name**:

Post answers

**3. Description:**

Registered User can post answers of the questions that are asked by another User on the system.

**3.1 Use Case Diagram**



**4. Actor:**

**4.1** **Primary actor:**

Registered User

**4.2 Secondary actor:**

N/A

**5. Precondition**:

The User must be logged in.

**6. Flow of event**:

**Primary flow of event:**

1. Type the answer
2. Post

**6.2 Secondary flow of event:**

The registered User cancel the posting of the answers.

**7. System responses and exceptions:**

Post answer on the system.

8. **Special requirements:**

Admin can be able to delete all the question that are posted by user

1. **Post conditions:**

Post answer successfully on the system.

**Activity Diagram:**



**3.5.21 Use Case #22**

1. **Use Case ID:**

Unc022

1. **Use Case name:**

Reset Password

1. **Description:**

This Use Case describe the process of reset the password.

**3.1 Use Case Diagram**



1. **Actor:**
   1. **Primary Actor:**

Registered User

* 1. **Secondary Actor:**

N\A

1. **Precondition:**

User is registered for this purposes.

1. **Flow of events:**
   1. **Primary flow of events:**
2. Go login page.
3. Type Username.
4. Go to reset password
5. Verify by admin
6. Type new password.
7. Confirm new password
8. Submit.
   1. **Secondary Flow:**

N\A

**7.** **System Response/Exception:**

When User type new password and submit, system response that password is reset.

**8.** **Special Requirement:**

N\A

**9. Post Condition:**

User successfully reset password.

**Activity Diagram:**



**3.5.22 Use Case #23**

1. **Use Case ID:**

Unc023

1. **Use Case name:**

Verify

1. **Description:**

Administrator verify the User account.

**3.1 Use Case Diagram:**



1. **Actor:**
   1. **Primary Actor:**

Administrator

* 1. **Secondary Actor:**

N\A

1. **Precondition:**

User is registered for this purposes.

1. **Flow of events:**
   1. **Primary flow of events:**
2. Fill Signup form
3. Submit
4. Request send to the admin
5. Admin accept the request
6. Verify
   1. **Secondary Flow:**

N\A

**7.** **System Response/Exception:**

When User create account, system verify the User account.

**8.** **Special Requirement:**

For verification, User must have email account.

**9. Post Condition:**

Administrator successfully verify the User account.

**Activity Diagram**



**3.5.23 Use Case #24**

1. **Use Case ID:**

Unc024

1. **Use Case name:**

Feedback

1. **Description:**

Registered User can give feedback to administrator.

**3.1 Use Case Diagram**



1. **Actor:**
   1. **Primary Actor:**

Registered User

* 1. **Secondary Actor:**

N\A

1. **Precondition:**

For feedback User must be registered.

1. **Flow of events:**
   1. **Primary flow of events:**
2. Type User name
3. Type password
4. Type feedback
5. Submit
   1. **Secondary Flow:**

N\A

**7.** **System Response/Exception:**

Exception when un-Registered User give feedback.

**8.** **Special Requirement:**

User must be login.

**9. Post Condition:**

Feedback process is successfully completed.

**Activity Diagram:**



**3.5.24 Use Case #25**

1. **Use Case ID:**

Ucn025

1. **Use Case Name:**

Logout

1. **Description:**

Registered User logout after login.

**3.1 Use Case Diagram**



1. **Actors**:
   1. **Primary actor:**

Registered User

* 1. **Secondary actor**

N\A

1. **Precondition:**

For logout User must be login.

1. **Flow of events:**
   1. **Primary flow of event:**
2. Submit logout
   1. **Secondary flow of events**:

N/A

1. **system response/Exception**:

Exception when User enter wrong password.

1. **special requirements:**

For logout, User must be login.

1. **post condition:**

User successfully logout from the system.

**Activity Diagram:**





**3.6 Use Case Diagrams**

**3.6.1 Administrator Use Case Diagram:**

**3.6.2 Registered User Diagram:**



**3.6.3 Un-Registered User Diagram:**





**3.7 ER-Diagram**

**3.6 E-R Diagram :**