

# **Student Management System**

**Diploma in Software Engineering**

**Final Project Documentation**

**22.1F**



**School of Computing and Engineering  
National Institute of Business Management  
Colombo-7**

**Title of the Project** : Student Management System For “Splendid Way Higher Educational Institute”

**Authors** : CODSE22.1F-078 M.A.N. Costa  
CODSE22.1F-006 L.M.D.U. Liyanapathirana  
CODSE22.1F-021 A.K.T. Perera

**Name of the Program** : Diploma in Software Engineering 22.1F

**Supervisor** : Mr. Thusitha Rohan

**Signature** : .....

**Name of the Institution** : School of Computing and Engineering,  
National Institute of Business Management

**Date** : ...../...../2023

The project is submitted in partial fulfilment of the requirement of the Diploma of Software Engineering of National Institute of Business Management.

## **Declaration**

“I certify that this project does not incorporate without acknowledgment, any material previously submitted for a Diploma in any institution and to the best of my knowledge and belief, it does not contain any material previously published or written by another person or myself except where due reference is made in the text. I also hereby give consent for my project report, if accepted, to be made available for photocopying and for interlibrary loans, and for the title and summary to be made available to outside organizations.”

<b>Index number</b>	<b>Name with initials</b>	<b>Signature</b>	<b>Date</b>
CODSE22.1F-078	M.A.N. Costa		
CODSE22.1F-006	L.M.D.U. Liyanapathirana		
CODSE22.1F-021	A.K.T. Perera		

## **Preamble**

### **Abstract**

The Splendid higher education center has been provided quality education for students. At present, student-related activities of this institution are performed manually. The new system will streamline and automate various functions including admissions, enrollment, course management, grading etc. By implementing the new system, it will enhance the operational efficiency and improve student services.

## **List of Keywords**

- Student management system
- Student Records
- Enrollment
- Attendance
- Grading
- Courses
- Reporting

## List of Figures

Figure 1 Waterfall model .....	12
Figure 2 Visual studio code .....	13
Figure 3 Figma.....	13
Figure 4 PHP .....	14
Figure 5 MySQL .....	15
Figure 6 JavaScript .....	16
Figure 7 HTML & CSS.....	16
Figure 8 XAMPP .....	18
Figure 9 Website Home Page .....	63
Figure 10 Student System Registration Form.....	64
Figure 11 Login Page.....	65
Figure 12 Forgotten Password – Page 01 .....	66
Figure 13 Forgotten Password – Page 02 .....	67
Figure 14 Change Password Page.....	68
Figure 15 Student Dashboard.....	69
Figure 16 Student View Course Schedule Page .....	70
Figure 17 Student View Exam Schedule Page .....	71
Figure 18 Student View Exam results Page.....	72
Figure 19 Apply for Repeat Exam-Page 01 .....	73
Figure 20 Apply for Repeat Exam-Page 02 .....	74
Figure 21 Repeat Exam Payment – Page 01 .....	75
Figure 22 Repeat Exam Payment – Page 02 .....	76
Figure 23 Student View course Page 1 .....	77
Figure 24 Student view Course Page 2 .....	78
Figure 25 Coursework Page.....	79
Figure 26 Course Work Submission Page .....	80
Figure 27 Student View Attendance Page .....	81
Figure 28 Attendance Report Page .....	82
Figure 29 Results Report Page.....	83
Figure 30 Send Feedback Page .....	84
Figure 31 View Profile Page.....	85

Figure 32 Teacher Dashboard .....	86
Figure 33 Teacher View Course Schedule Page .....	87
Figure 34 Teacher Update Course Schedule Page .....	88
Figure 35 Teacher View All Exam Schedule Page.....	89
Figure 36 Teacher View Course Page .....	90
Figure 37 Upload Notes & Past Paper Page .....	91
Figure 38 Upload Course Work Page .....	92
Figure 39 All the Submitted Coursework Page .....	93
Figure 40 Graded Status Page.....	94
Figure 41 View Students' Attendance Page .....	95
Figure 42 View Schedule Report Page .....	96
Figure 43 Teacher View Students' Results Page .....	97
Figure 44 Students' Results Report Generate Page for teacher.....	98
Figure 45 Update Profile Page .....	99
Figure 46 Admin Dashboard.....	100
Figure 47 Student Registration Page.....	101
Figure 48 Teacher Registration Page.....	102
Figure 49 Admin Registration Page.....	103
Figure 50 Student Registration for the Course .....	104
Figure 51 Add New Courses.....	105
Figure 52 Update Details of the Existing courses.....	106
Figure 53 Add New Batches .....	107
Figure 54 Update Details of the Existing Batches .....	108
Figure 55 Student Profile Update Page.....	109
Figure 56 Teacher Profile Update Page .....	110
Figure 57 Admin Profile Update Page.....	111
Figure 58 Add Exam Schedule .....	112
Figure 59 Update Details of the Exam Schedule .....	113
Figure 60 Add Repeat Exam Schedule .....	114
Figure 61 Update Details of the Repeat Exam Schedule.....	115
Figure 62 View Student Attendance Page by Admin .....	116

Figure 63 Add New Exam .....	117
Figure 64 Update Details of the Exam.....	118
Figure 65 Add New Message Page .....	119
Figure 66 View Feedback Page .....	120
Figure 67 Add New Course Schedule.....	121
Figure 68 Update Details of the Course Schedule .....	122
Figure 69 Student Data Report Generate Page 1 .....	123
Figure 70 Student Data Report Generate Page 2 .....	124
Figure 71 Exam result report Generate Page .....	125
Figure 72 Exam Schedule report Generate Page .....	126
Figure 73 Student Attendance report Generate Page.....	127
Figure 74 Income report Generate Page .....	128
Figure 75 Individual Student's Attendance summary report.....	141
Figure 76 Individual Student's Results summary report .....	142
Figure 77 Repeat Exam Payment Receipt .....	143
Figure 78 Teacher's Course Schedule report.....	144
Figure 79 Students' Results report.....	145
Figure 80 Exam Schedules report .....	146
Figure 81 Student Attendance report .....	147
Figure 82 Students Results report .....	148
Figure 83 Income report.....	149
Figure 84 Course Fees Payment Receipt .....	150
Figure 85 Student Data Report .....	151
Figure 86 Letter issued by the organization.....	154

## List of Tables

Table 1 User .....	129
Table 2 Admin .....	129
Table 3 Student .....	130
Table 4 Teacher.....	130
Table 5 Student_Course.....	131
Table 6 Course .....	131
Table 7 Payment .....	132
Table 8 Student_Course_Payment.....	132
Table 9 Student_Batch.....	133
Table 10 Batch .....	133
Table 11 Student_ExamSchedule .....	134
Table 12 Exam .....	134
Table 13 RepeatExamPayment.....	135
Table 14 Student_ExamSchedule_RepeatExamPayment.....	135
Table 15 Exam_Schedule .....	136
Table 16 Course_Schedule .....	136
Table 17 Student_CourseSchedule .....	137
Table 18 Feedback .....	137
Table 19 Message .....	138
Table 20 CourseWork .....	138
Table 21 Student_CourseWork.....	139
Table 22 UserMobile .....	139
Table 23 Student Guardian Mobile .....	140
Table 24 ExamSchedule Location .....	140

## **List of Acronyms and Abbreviations**

- UI – User Interface
- UML – Unified Modelling Language gratitude
- ER – Entity Relationship
- PK - Primary Key
- FK – Foreign Key

## **Acknowledgement**

We would like to express our deep gratitude to our project supervisor Mr. Thusitha for his patient guidance, enthusiastic encouragement, and helpful criticisms on this project. Also, we would like to express our sincere thanks to our university, National Institute of Business Management, who gave us the physical and mental strength to carry out this project successfully. As well as that, we would like to express our thanks to the friends of our batch, parents and the members of the relevant institutions who provided information for the project.

Thank You!

## Table of Contents

<b>Chapter 01: Introduction .....</b>	<b>2</b>
1.1 Introduction of the organization.....	2
1.2 Organization Structure .....	3
1.3 Current Operations in Organization .....	4
1.4 Users and Responsibilities Organization .....	5
1.5 Problem Definition.....	6
1.6 Project Objectives .....	7
1.7 Proposed Solution .....	8
1.8 Chapter Summary.....	9
<b>Chapter 2: Methodology .....</b>	<b>10</b>
2.1 Introduction .....	10
2.2 Data Collection Methods.....	11
2.3 Software Process Model .....	12
2.4 Software Development Tools.....	13
2.5 Testing strategies.....	19
2.6 Implementation plan.....	21
2.7 Chapter Summary.....	22
<b>Chapter 03: Analysis .....</b>	<b>23</b>
3.1 Introduction .....	23
3.2 UML Diagrams .....	24
3.3 Proposed System ER Diagram .....	60
3.4 Chapter Summary.....	61
<b>Chapter 04: Solution Design .....</b>	<b>62</b>
4.1 Introduction .....	62
4.2 Interface Design .....	63
4.3 Database Design.....	129
4.4 Report Layout Design .....	141
<b>Chapter 05 : Conclusion.....</b>	<b>152</b>
5.1 References .....	153
5.2 Appendices .....	154

## **Chapter 01: Introduction**

### **1.1 Introduction of the organization**

Splendid way is a leading higher education center which is located at Katana, Gampaha since 2017. Its aim is to provide an efficient platform to manage student-related activities.

In this educational institute, they held classes for certificate in English, certificate in graphical design and IT courses. This educational Institute is an educational institute with the guidance of an expert panel of teachers who works hard day and night. It should also be said that this is in an environment suitable for educating students.

## **1.2 Organization Structure**

In 2017, Mr. Sriyan Samarasinghe, the founder of this institute, started splendid way higher Educational Institute. Also, this Institute has a teaching staff that imparts knowledge to the students using the latest learning methods in the world. Consisting of more than 15 teaching staff, more than 1000 students are studying there. On the other hand, there is a group of 10 employees in this Institute to do cleaning work and other tasks. Also, there is a group of admins of the institution who provide support to carry out many tasks in this educational institute. This is the Organization structure of the splendid way higher Educational Institute.

### **1.3 Current Operations in Organization**

Current operations in the organization are student enrolment, course management, attendance tracking, grading, timetable management and report analytics. They consist of different functionalities such as capturing essential information, managing course catalogs, recording student attendance, generating reports etc.

## **1.4 Users and Responsibilities Organization**

Users and responsible organizations are teachers, students, and administrations. Students are responsible for managing their coursework and submitting assignments etc. Managing user accounts, generating reports, and ensuring data are responsibilities of system administration. Teachers also communicate with students and administration through the system.

## **1.5 Problem Definition**

The current system is related to manual methods. In this current system during their data analysis, data collected on various files, and they commonly use data flow diagrams. To develop a system like this they need experience and common sense. In this manual system they need to keep a number of records related to students. Success of this kind of manual system depends on how clearly, they define the problem.

- 1) Time-consuming: A manual student management system involves a lot of paperwork, which can be time-consuming and tedious for teachers and administrative staff.
- 2) Inconsistent data: Manual systems can lead to inconsistent data due to differences in recording and tracking methods used by different teachers or staff members.
- 3) Difficulty in accessing information: Manual systems can make it difficult to access student information quickly, especially if the records are stored in different locations.
- 4) Limited storage capacity: Manual systems may have limited storage capacity, which can make it difficult to store large amounts of data or documents.
- 5) Inefficient reporting: Manual systems can make it difficult to generate reports quickly and efficiently, which can delay decision-making processes and hinder the ability to track student progress effectively.

## **1.6 Project Objectives**

The main objective of the proposed student management system is to offer a more efficient management system throughout an automated system.

Efficient data management is one objective which is to have a centralized and organized system for easy access and retrieval of information. Automating and digitizing enrollment procedures are objectives of streamlined enrollment process. Efficient course management is another objective. It helps to ensure proper planning and utilization of resources to provide a smooth academic experience for students. Data analysis and reporting supports informed decision making and track towards educational goals.

## **1.7 Proposed Solution**

The proposed solution is an automated system. There are several advantages of using this system. It has a user-friendly interface so that it is very easy to edit details. Also, it has fast access to databases, less errors, and more storage capacities. All the manual difficulties in managing the details have been rectified by implementing computerization.

## **1.8 Chapter Summary**

Student management system is software which is helpful for students as well as the institution. Their existing student management system is a manual system, and it is a varying time consuming one. The proposed system is an automated one designed to streamline and enhance the management of student related processes. It simplifies the workflow and reduces paperwork. It improves overall efficacy in managing student information.

## **Chapter 2: Methodology**

### **2.1 Introduction**

Methodology is the systematic technique or set of rules applied in each field or discipline to achieve a particular objective. It offers a structure or road map for completing tasks, selecting options, and getting the results you want. Software development, project management, research, and problem-solving are just a few of the areas where methodologies are frequently applied.

It focuses on the implementation and development process. Methodology involves different stages such as analysis, design, testing, maintenance etc.

When implementing the student management system we select the waterfall methodology, to provide effectiveness. By using the waterfall method, we can deliver value progressively.

## **2.2 Data Collection Methods**

Data collecting often happens early in a project, especially during the requirements gathering and analysis phase, according to the waterfall technique. In the waterfall methodology, there are typical data collection techniques employed.

Data collection in student management system's involves gathering data related to student, teachers, courses, grades etc. To collect data, we use different methods like manual data entry, barcode, surveys and questionnaires, interviews etc.

### **Interviews:**

To get their opinions, needs, and expectations for the student management system, conduct interviews with stakeholders, such as faculty members, administrators, and students. Specific information can be gathered through organized or semi-structured interviews.

### **Documentation Review:**

Examine current paperwork, including institutional rules, academic regulations, and administrative procedures, to comprehend the precise needs and limitations that the student management system must consider.

### **Observation:**

Examine current procedures and methods used by the higher education institution to spot problems, and places where the student management system might help. This approach enables the direct observation of how tasks are carried out and can produce insightful data.

## 2.3 Software Process Model

Different software models can be used to develop student management system processes. We selected the Waterfall model. In the waterfall methodology, data collection typically occurs during the initial stages of the project, particularly in the requirements gathering and analysis phase. Requirements collecting, design, implementation, testing, and deployment are several steps of waterfall method.

In the waterfall technique normally moves from one phase to the next after each one is finished, and once a phase is finished, modifications to requirements or design are typically not permitted. The need for large changes later in the development process can therefore be reduced through careful requirements analysis and gathering.

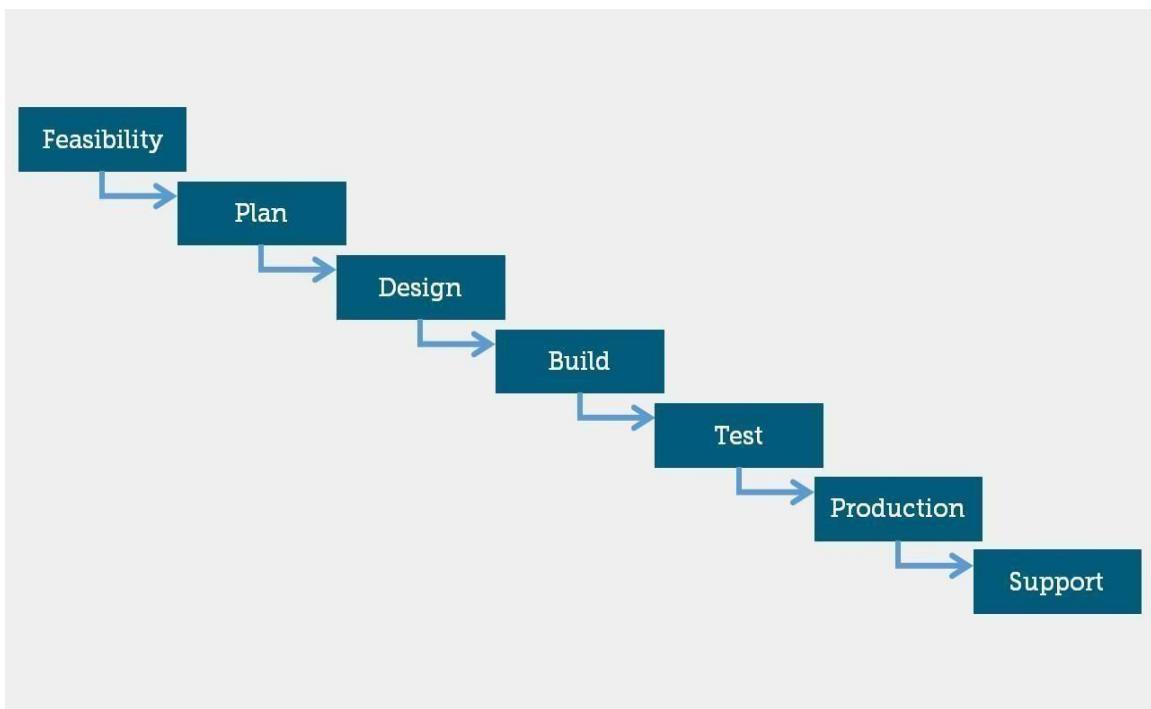
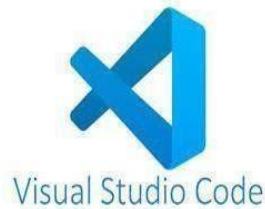


Figure 1 Waterfall model

## 2.4 Software Development Tools

Software development tools are used by developers to facilitate the process. In the waterfall methodology, various software tools can be used to support the different phases of the software development life cycle. Such as visual studio code, Figma, MySQL, PHP.

- **Visual Studio Code**



*Figure 2 Visual studio code*

Microsoft created Visual Studio Code (VS Code), a compact and functional source code editor. For authoring, modifying, and debugging code, it offers a user-friendly interface that is fully customizable. Many developers use VS Code across many platforms because of its support for numerous programming languages, robust features including IntelliSense, debugging tools, and a sizable extension ecosystem. It is a popular option for programming and software development activities because it strikes a compromise between a comprehensive Integrated Development Environment (IDE) and a straightforward code editor.

- **Figma**



*Figure 3 Figma*

Figma is a cloud-based design and prototyping tool that enables teams to collaborate in creating user interfaces and experiences for digital products.

It offers a robust set of features, including vector editing tools, prototyping capabilities, and design system management. With real-time collaboration, multiple users can work simultaneously on the same design file, allowing for efficient teamwork and iteration.

Figma's cloud-based nature eliminates the need for software installation and enables access to design files from anywhere with an internet connection. It simplifies the design-to-development process with features like developer handoff and integrations with other tools. Figma has gained popularity among designers and product teams for its user-friendly interface, powerful features, and ability to streamline collaboration and design workflows.

- **PHP**



*Figure 4 PHP*

PHP is a popular server-side scripting language made primarily for building websites. It offers a simple and adaptable method for developing dynamic websites and web apps. PHP is well-known among web developers for its ease of use, adaptability, and broad support.

PHP enables developers to quickly incorporate PHP code into HTML, enabling them to combine dynamic content with static parts. It includes a broad selection of features and capabilities, such as database connectivity, form handling, file processing, session management, and much more.

PHP is a popular server-side scripting language made primarily for building websites. It offers a simple and adaptable method for developing dynamic websites and web apps. PHP is well-known among web developers for its ease of use, adaptability, and broad support.

PHP is often used in combination with other technologies, such as the MySQL database, to create dynamic websites and web applications. PHP can be used to create a wide variety of web applications, including content management systems, e-commerce platforms, and forums. It has a simple syntax which makes it easy for beginners to learn.

- MySQL

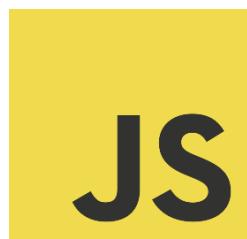


*Figure 5 MySQL*

MySQL uses the Structured Query Language (SQL) as its language for interacting with the database. It supports a wide range of SQL operations, including data manipulation, data definition, and data control, allowing developers to efficiently query and manipulate data stored in the database.

MySQL offers excellent performance, especially for read-intensive applications. It utilizes various optimization techniques, including caching, indexing, and query optimization, to deliver fast and efficient data retrieval.

- **Java Script**



*Figure 6 JavaScript*

JavaScript is widely used for web development. It enables website developers to add functionality, interactivity, and dynamic content. JavaScript offers a rich and interesting user experience by manipulating HTML components, managing user events, and interacting with servers. It is a universal language for client-side scripting and is supported by all current web browsers. JavaScript is a potent tool for creating dynamic web apps because of its adaptability, large libraries, and frameworks like React and Angular. JavaScript continues to lead web development thanks to its vibrant ecosystem and steady progress, which enables programmers to build cutting-edge, responsive websites.

- **HTML & CSS**



*Figure 7 HTML & CSS*

HTML5 is the latest version of Hypertext Markup Language (HTML), the standard markup language used to create web pages. It was released in 2014 and is now widely supported by web browsers, allowing developers to create more advanced web applications and user experiences.

HTML5 introduces several new elements and attributes that make it easier to create and structure the content of web pages. Some examples of new elements introduced in HTML5 include <header>, <nav>, <article>, <section>, <aside>, and <footer> which allow developers to clearly define the different parts of a web page, making it easier to create a consistent and accessible layout. Additionally, HTML5 includes new form controls, such as and, that make it easier to create user-friendly forms, and new multimedia elements, such as and, that allow developers to add multimedia content to web pages without needing to use third-party plugins. HTML5 also includes support for Offline Web Applications, that allows web pages to continue working even when the user is not connected to the internet, and improved Semantic support, allowing web pages to be more easily indexed by search engines and assistive technologies. It is backwards compatible with previous versions of HTML, making it easy for developers to update their existing web pages to take advantage of new features.

CSS, short for Cascading Style Sheets, is a fundamental technology used in web development to control the presentation and styling of web pages. It provides a set of rules and properties that define how HTML elements should be displayed on a website. CSS allows developers to customize the layout, colors, fonts, and other visual aspects of a webpage, enhancing its appearance and creating a consistent design across multiple pages.

CSS facilitates effective and modular web development by separating the presentation (CSS) from the content (HTML). It enables developers to produce reusable styles and use them on many parts, minimizing duplication and making it simpler to manage and update a website's design.

- XAMPP Server



*Figure 8 XAMPP*

XAMPP provides a convenient way for developers to create a local development environment on their computers. By installing XAMPP, developers can have a pre-configured web server setup without the need for individually installing and configuring each component separately.

With XAMPP, developers can test and debug their web applications locally before deploying them to a production server. It is widely used for PHP-based web development and is compatible with different operating systems, including Windows, macOS, and Linux.

## **2.5 Testing strategies**

A testing strategy is a plan that describes the overarching methodology and objectives for testing a software application. It outlines the testing's parameters as well as the methods and tools that will be employed. The strategy acts as a road map for the testing procedure, making sure that all relevant elements are addressed, including functional, performance, and security testing. Additionally, it lays out the standards for conducting tests, documenting defects, and determining when testing is finished. In general, a testing plan aids in making sure software is extensively tested and fulfills the required quality requirements prior to release.

Testing plays a crucial role in ensuring quality. There are some testing strategies like test driven development, acceptancy test, user acceptancy test etc. It is important to note the testing strategies. The aim of testing strategies is to satisfy the need of institution.

Testing method would start by determining the system's primary goals, such as accurately recording student data, controlling course enrolment, and producing accurate reports. It would specify the testing's parameters, such as the functionalities and modules that must be tested.

The plan would specify the testing procedures to be employed, such as functional testing to confirm that the system complies with specifications, usability testing to guarantee an intuitive user interface, and integration testing to confirm the seamless integration of various system components. Performance testing would also be considered to evaluate system responsiveness and user concurrency.

For various scenarios, such as student enrollment, course registration, and report, the testing strategy would decide the test data needed.

So, we can follow these steps to test our application.

**Requirements analysis** - Identify and review the requirements for the student management system, including functional and non-functional requirements.

**Test planning** - Define the scope of testing, including what will be tested, when testing will occur, and what resources will be required.

**Test Design** - Develop test cases, scripts, and scenarios that will be used to test the student management system. Focus on both functional and non-functional testing, such as usability, compatibility, performance, security, and integration testing.

**Test automation** - Automate functional testing where possible to increase efficiency and accuracy.

**Test execution** - Run both manual and automated tests and record the results, including any failures or errors that are found.

**Test evaluation** - Analyze the results of testing to identify areas for improvement and to determine if the LMS meets quality standards.

**User acceptance testing** - Involve actual users of the LMS in testing to get feedback on usability and user experience.

**Test closure** - Document the results of testing and close out the testing process.

**Test maintenance** - Keep the testing process up to date as the LMS evolves, including updating test cases and scripts as needed.

In general, a student management system's testing strategy would center on fully testing the system's functionality, usability, and performance to assure its dependability and correctness in maintaining student data and producing reports.

## **2.6 Implementation plan**

An implementation plan is a project management tool that facilitates the execution of a strategic plan for a company or a project by breaking down the implementation process into smaller steps while defining the timeline, the teams and the resources that will be needed.

Parallel Implementation: In a parallel implementation, the new student management system is set up in addition to the current system, and the two systems operate side by side for a while. Data and operations are carried out in both systems throughout this phase to guarantee a smooth changeover. This makes it possible to transition to the new system gradually while causing the fewest possible disruptions. The old system is phased out once it has proven to be trustworthy and stable, and the new system takes its place as the main platform for handling student data.

## **2.7 Chapter Summary**

The waterfall method is a traditional project management approach that follows a linear and sequential process. While it has its limitations, it also offers certain advantages. Through that process it ensures the student management system is aligned with the needs of the institute.

It's clear and structured approach provides a well-defined path for project execution, ensuring that tasks are carried out in a sequential manner. The emphasis on documentation facilitates better understanding, knowledge transfer, and control over the project. By thoroughly planning upfront, the waterfall method minimizes changes and scope creep, making it suitable for stable and well-understood projects. Additionally, its comprehensive documentation and sequential nature make it advantageous for projects with regulatory and compliance requirements. However, it's important to consider that the waterfall method may not be suitable for projects with evolving requirements or a need for frequent iteration and feedback.

We summarized the data collection techniques in this chapter. That is how we gather data, what are the ways, and how each method is described. Then we explained the approach we took to design the process for this project under the software process mode. Next, we discussed software development tools.

After all, we described the execution strategy and the step-by-step construction of this project.

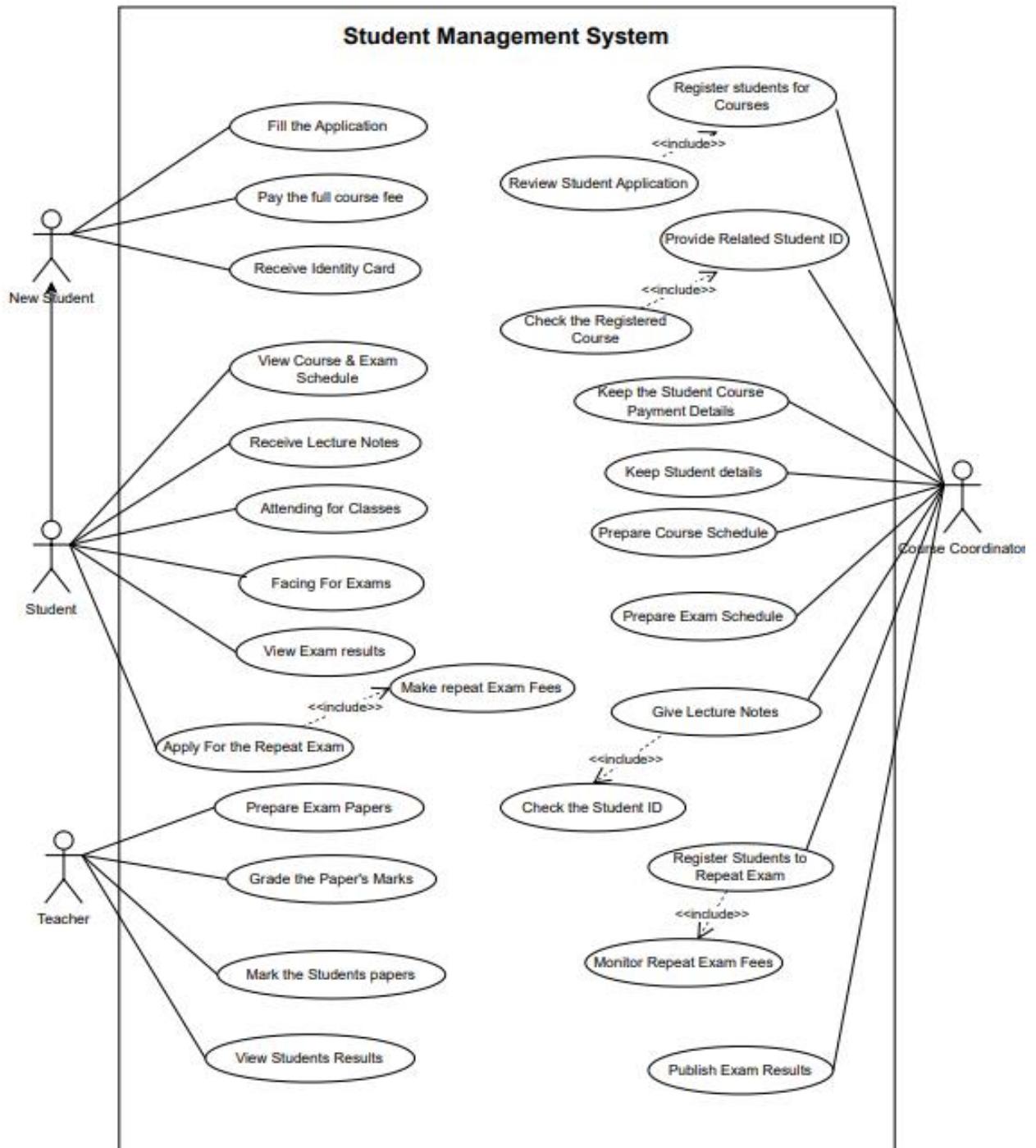
## **Chapter 03: Analysis**

### **3.1 Introduction**

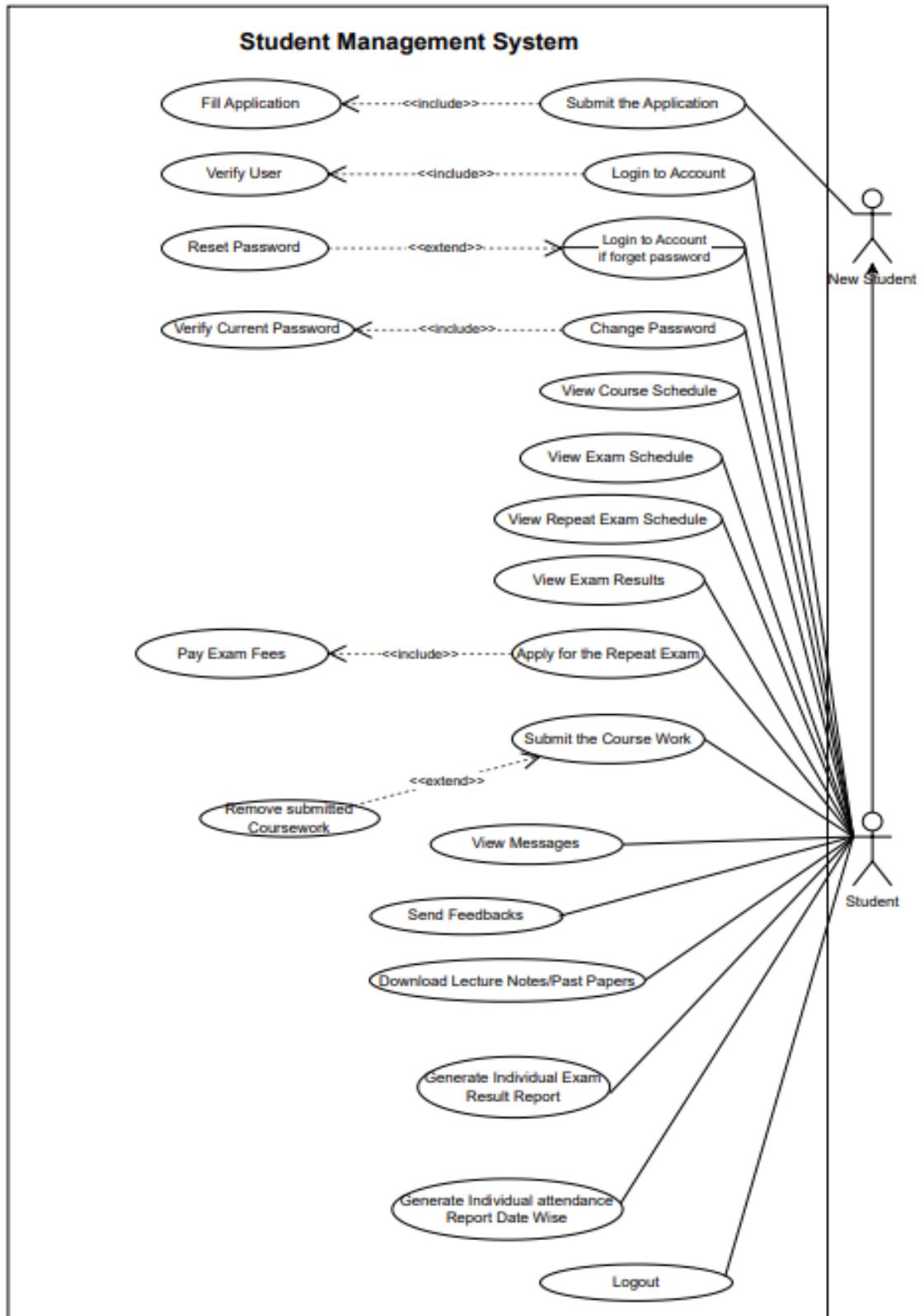
Analysis part is the most crucial part which is involved in understanding the requirements, process, and challenges. It provides an overview of the analysis process and challenges associated with managing activities in the institution. Also, it helps to identify areas to improve, improve productivity and streamline operations. This data analysis helps to define database design and data management procedures to ensure accurate and efficient data handling including UML diagrams, sequence diagrams, and class diagrams. UML is the first step in the development of the system. Sequence diagrams display the time sequence of the objects participating in the interaction. This consists of the vertical dimension and horizontal dimensions.

## 3.2 UML Diagrams

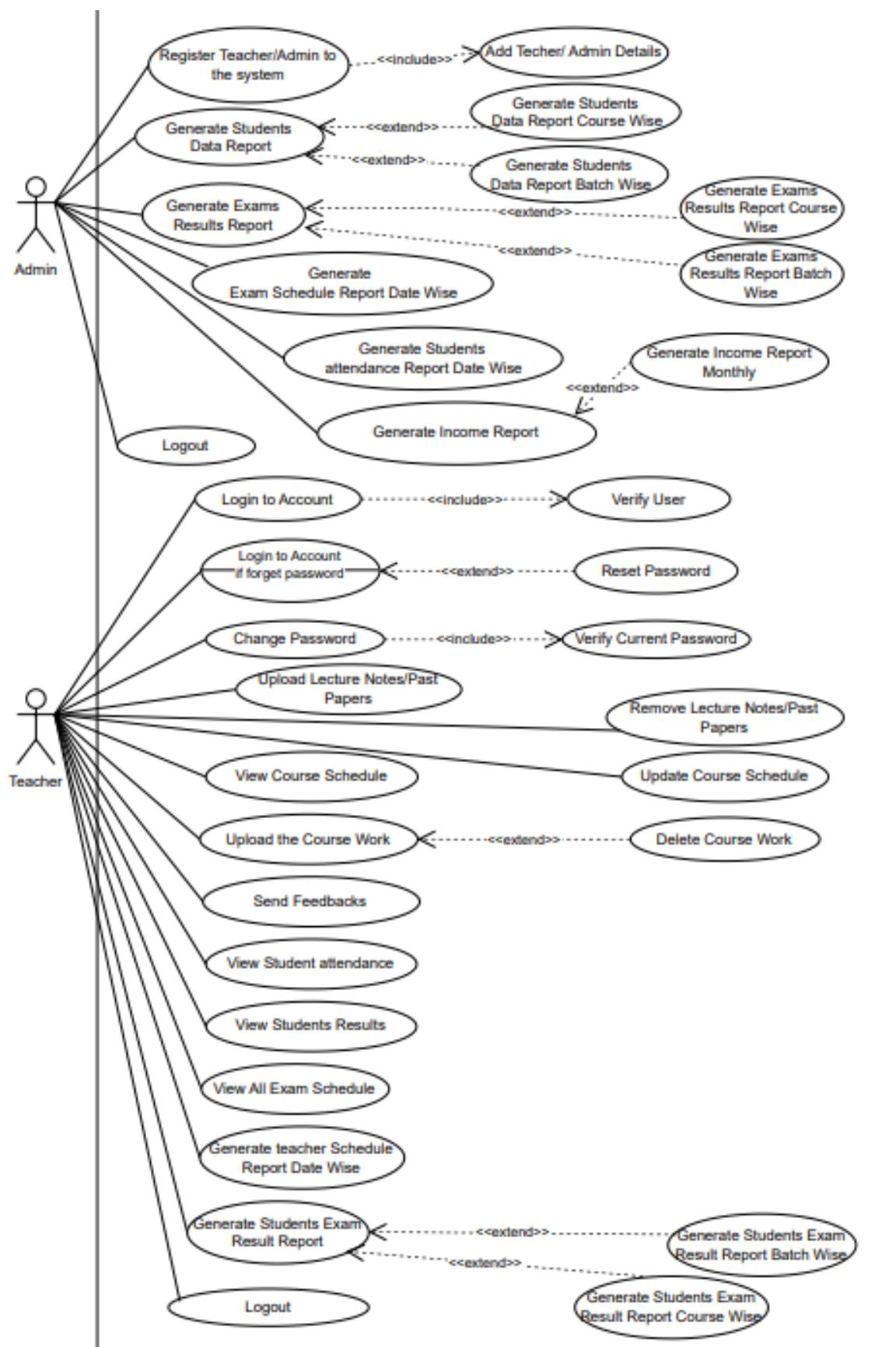
**Use Case Diagram of Current System**



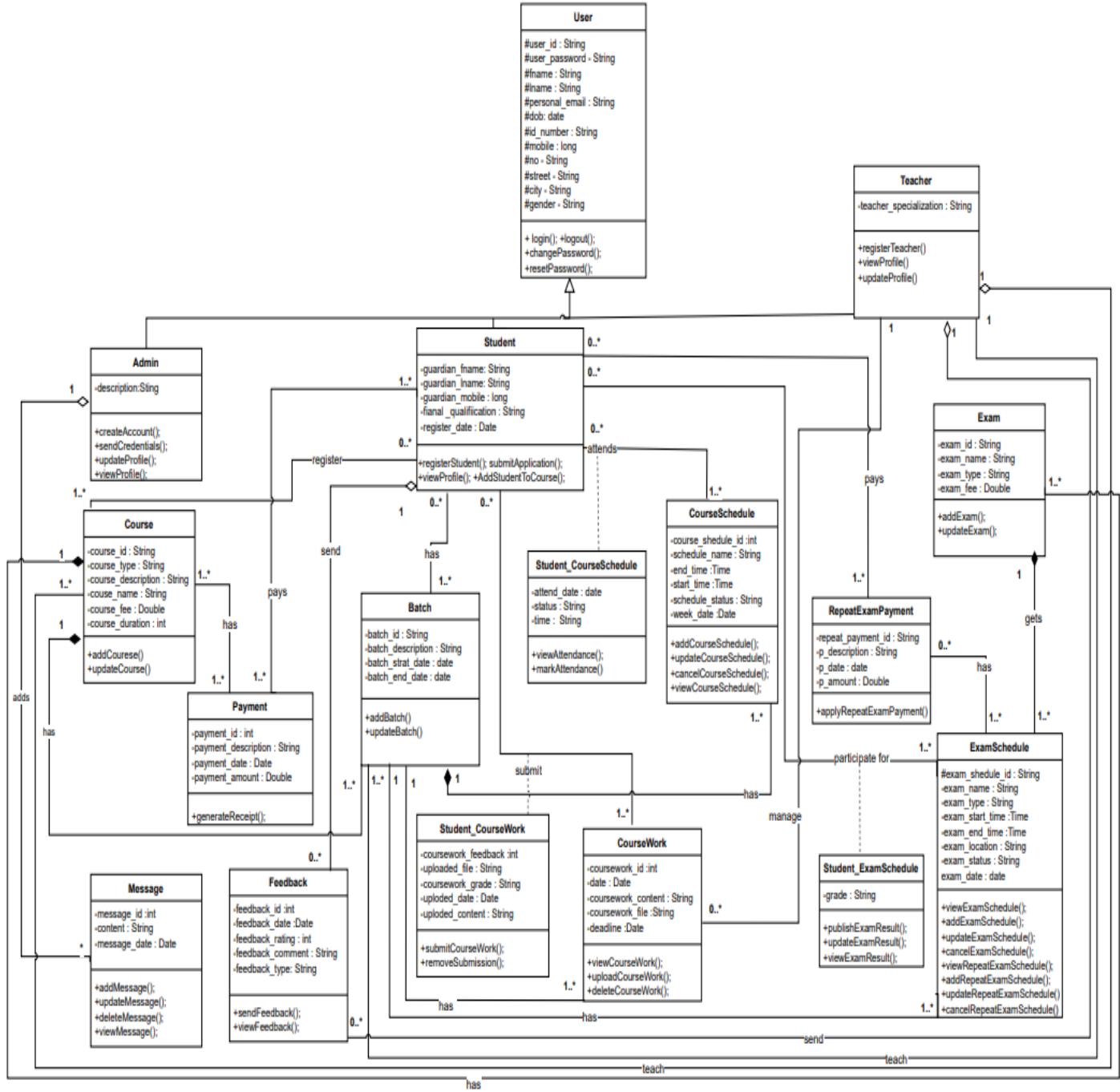
## Use Case Diagram of Proposed System





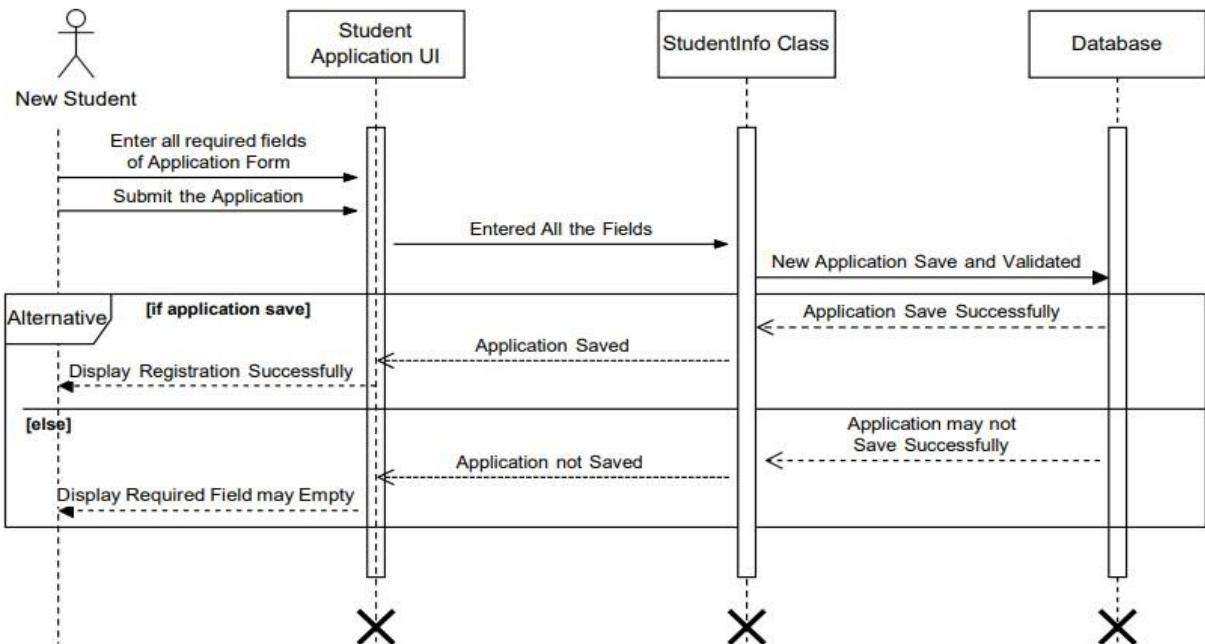


## Class Diagram of Proposed System

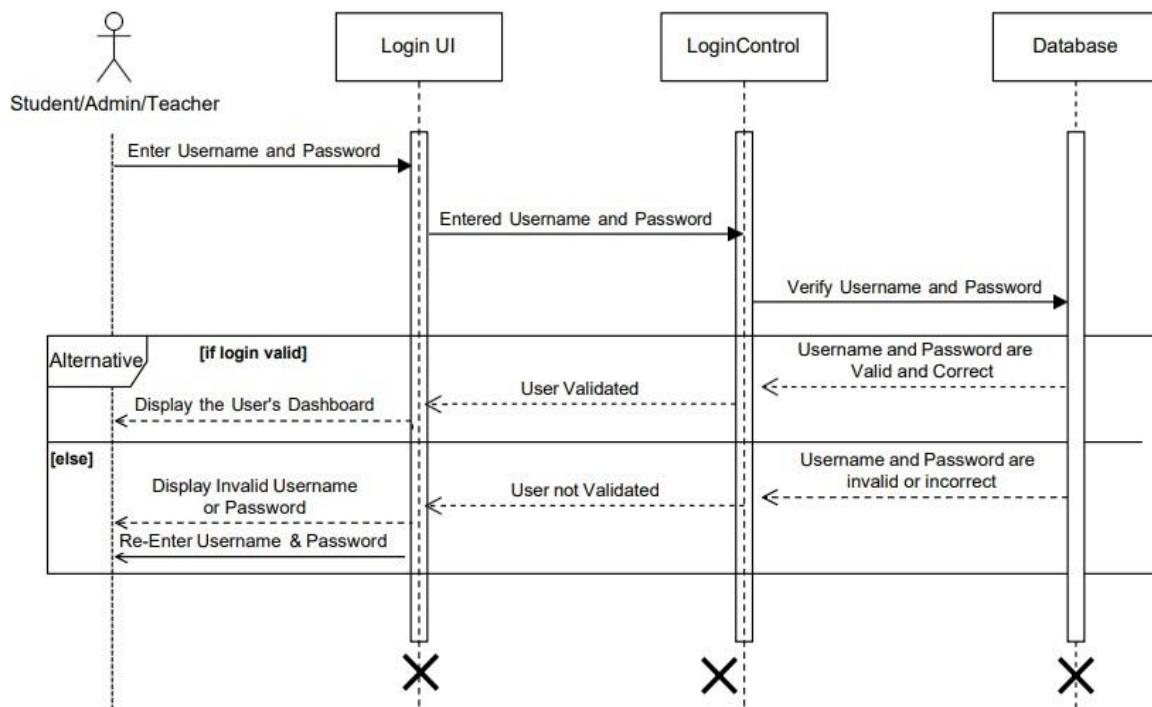


## Sequence Diagrams of Proposed System

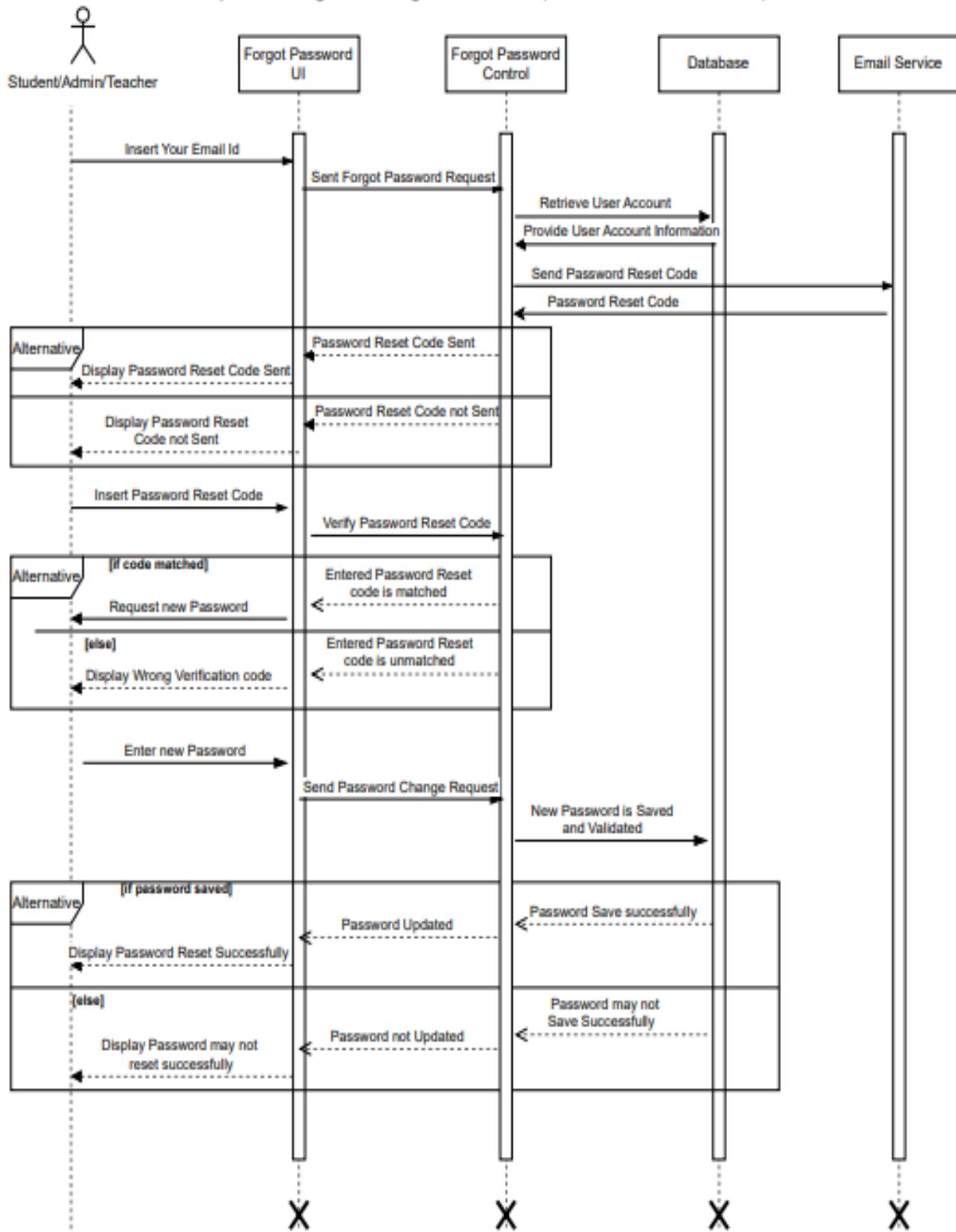
### Sequence Diagram - New Student's Digital Application Submission



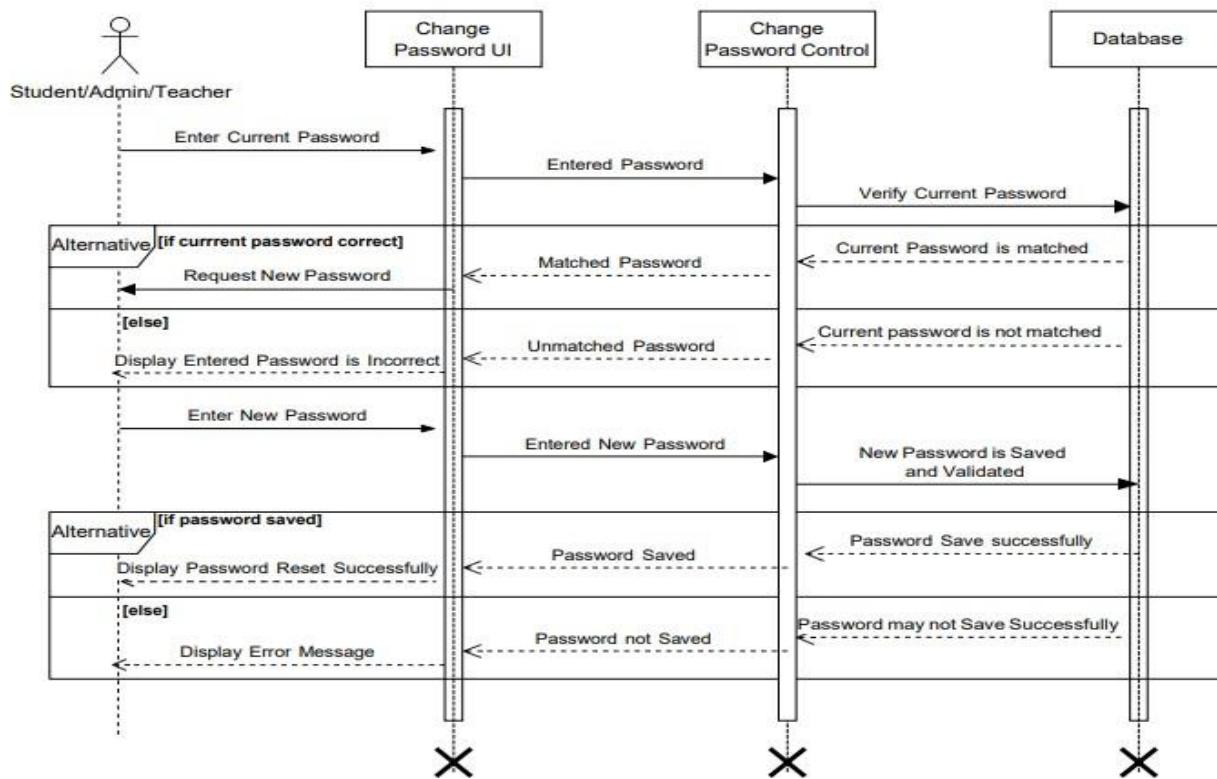
### Sequence Diagram - Login to the Website (Admin/Student/Teacher)



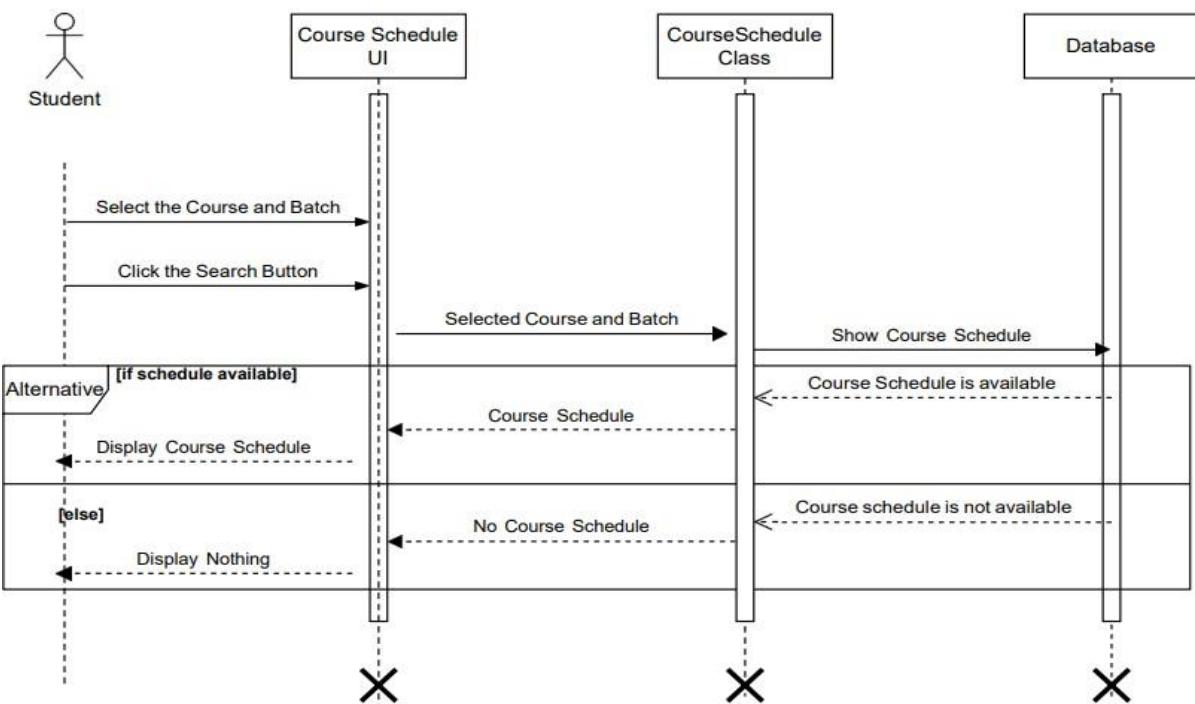
### Sequence Diagram - Forgot Password (Admin/Student/Teacher)



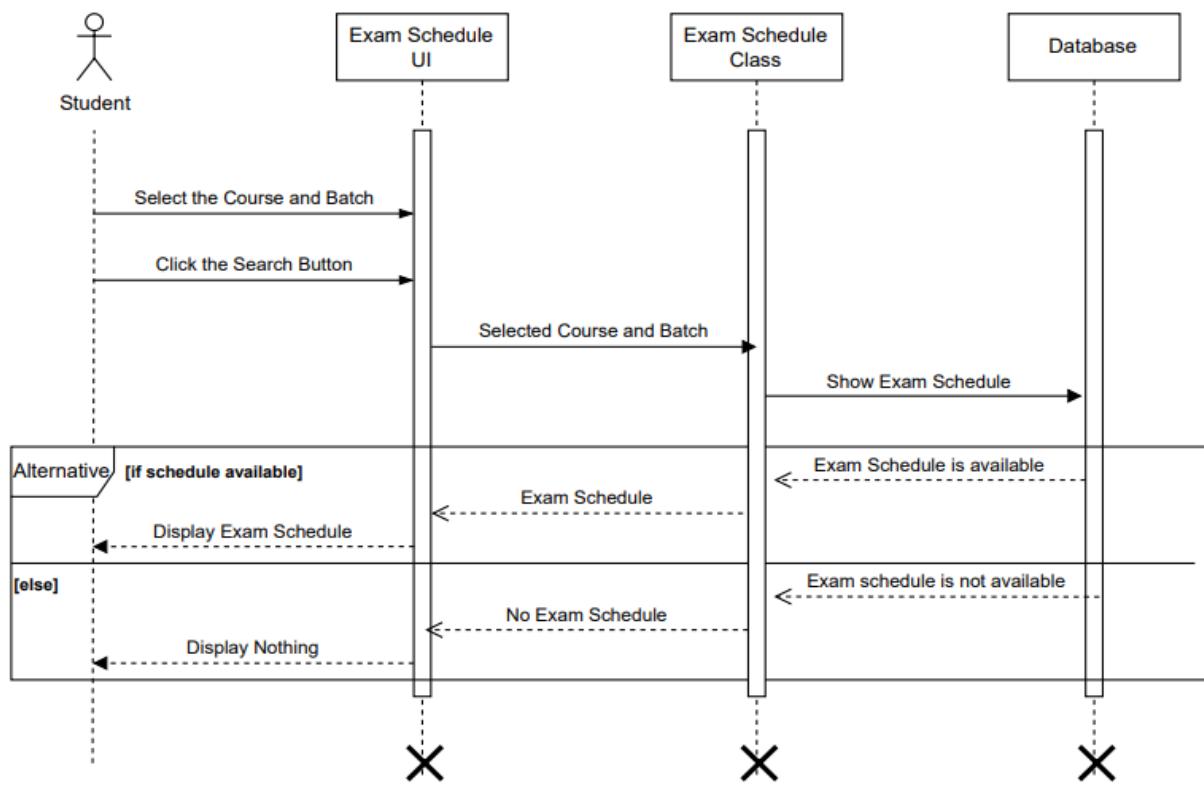
### Sequence Diagram - Change Password (Admin/Student/Teacher)



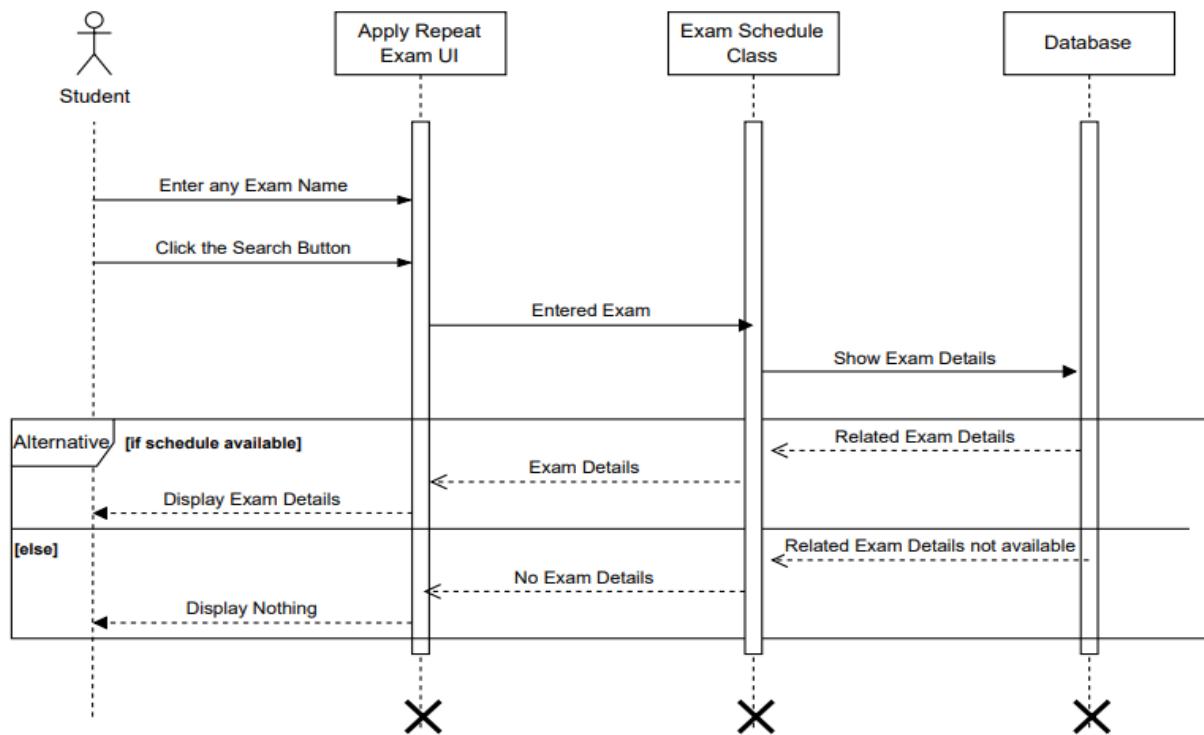
### Sequence Diagram - Student View Course Schedule



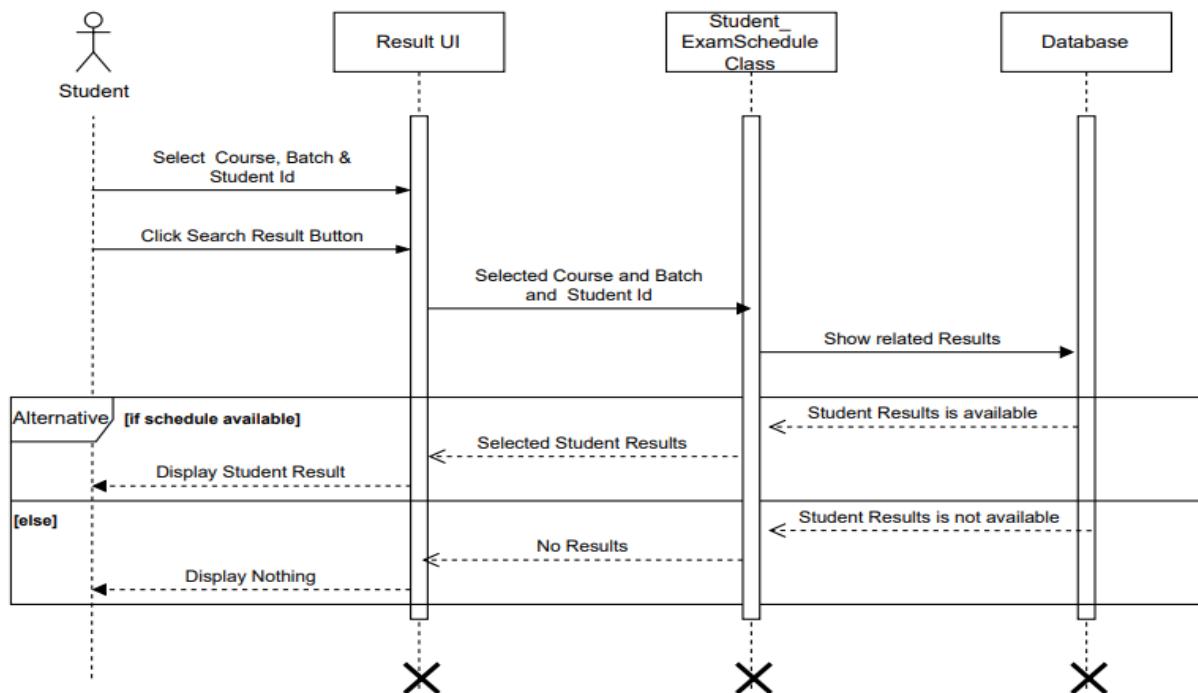
### Sequence Diagram - Student View Exam Schedule



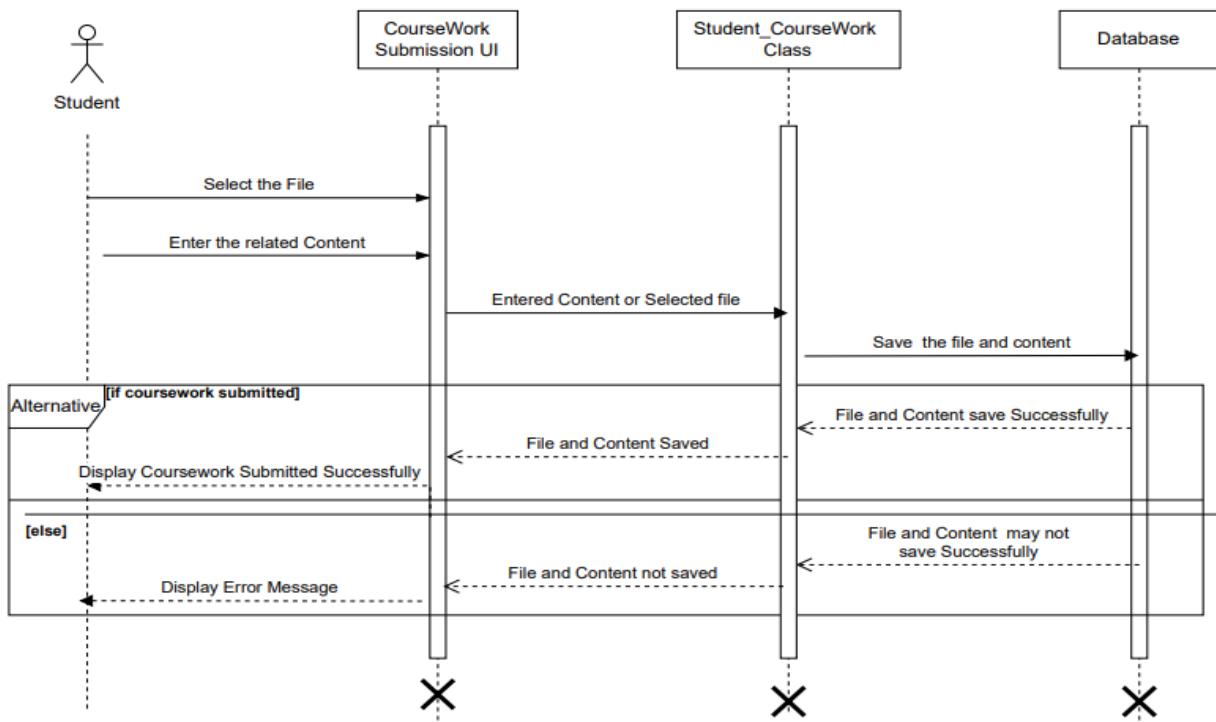
### Sequence Diagram - Student View Repeat Exam Schedule



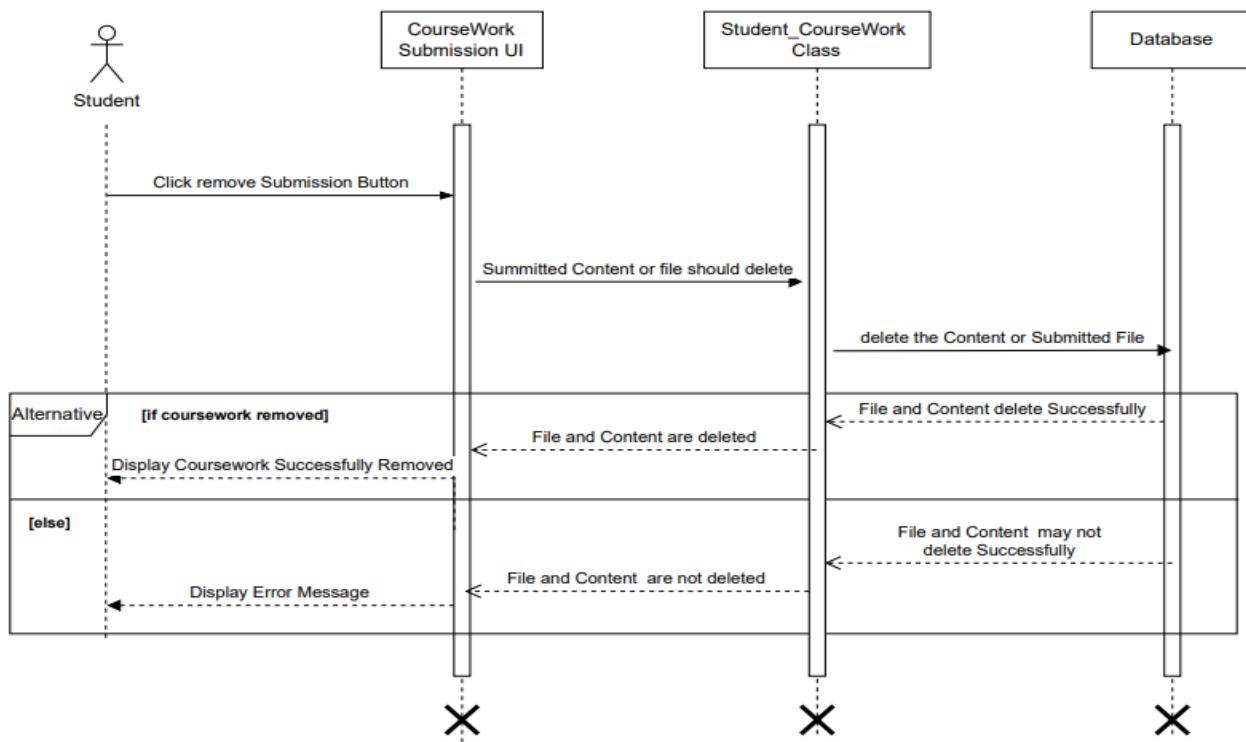
### Sequence Diagram - Student View their Result



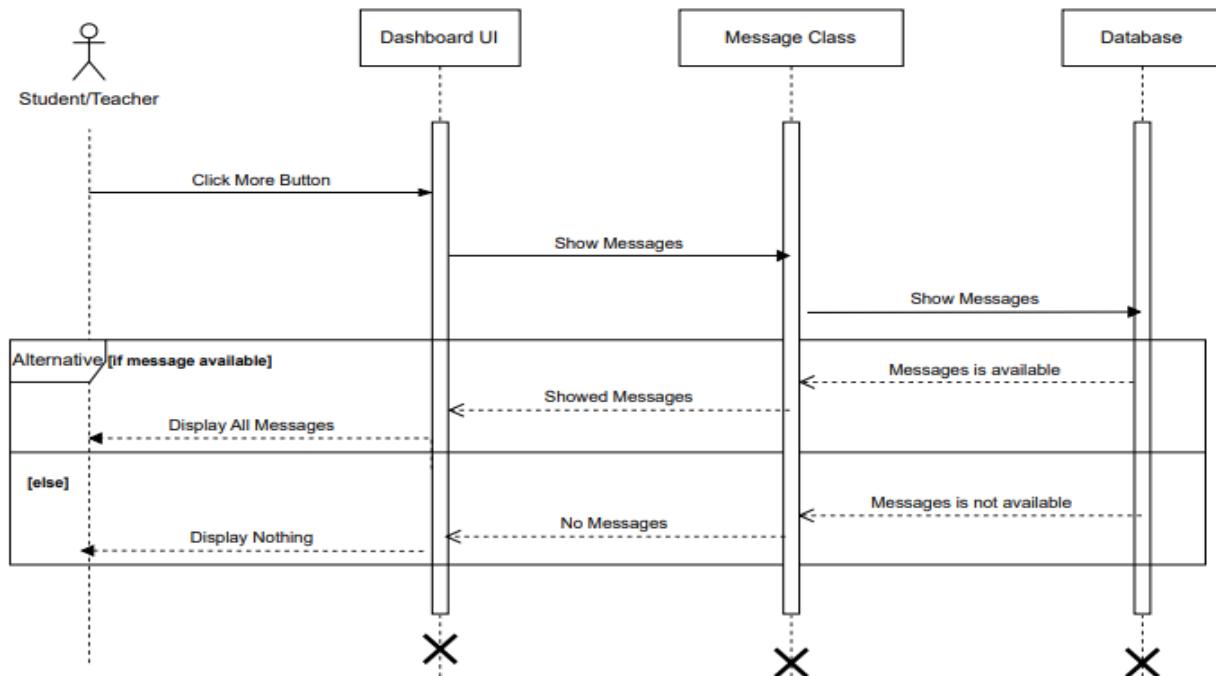
### Sequence Diagram - Student Submit the Coursework



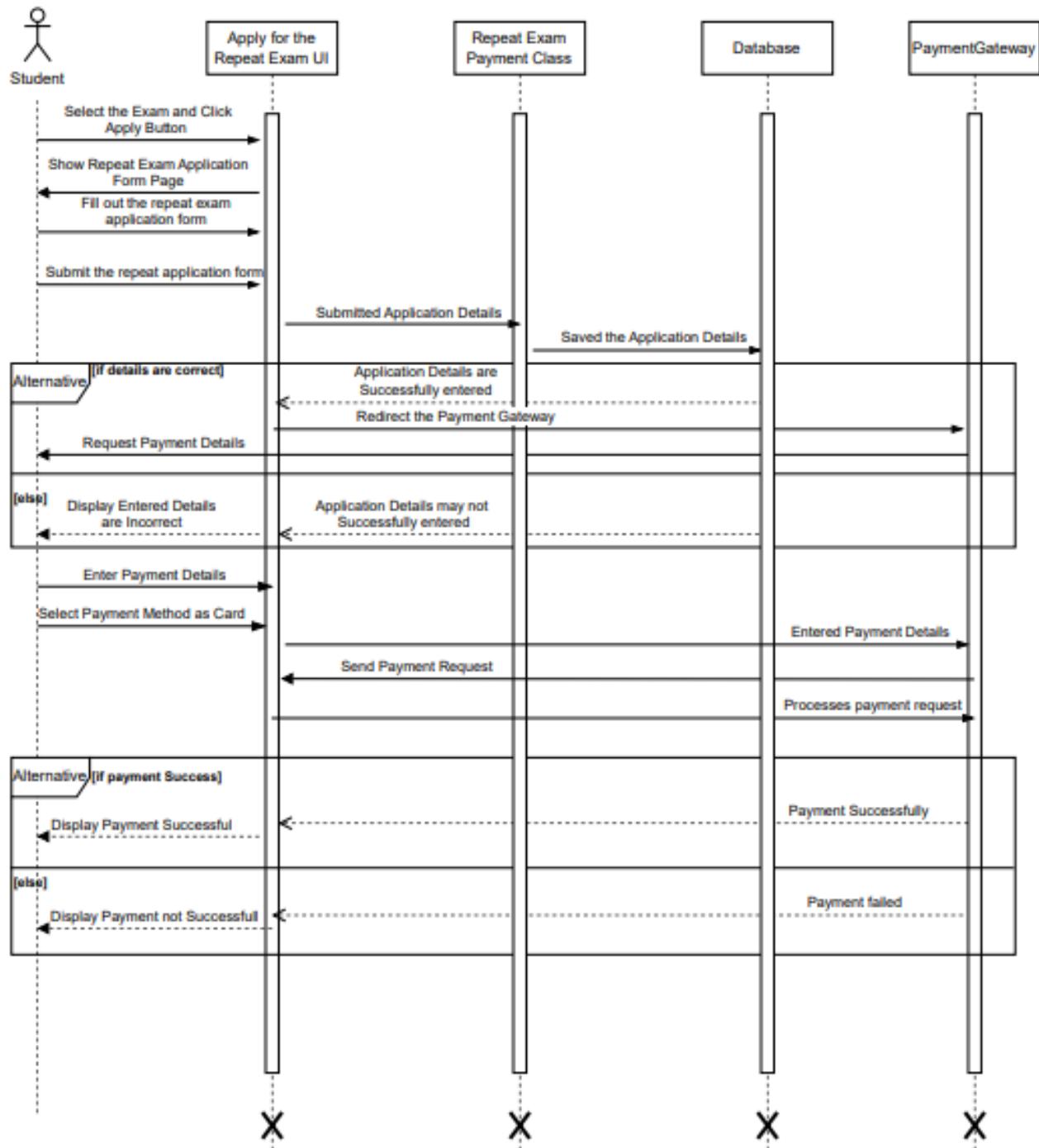
### Sequence Diagram - Student Remove the Submitted the Coursework



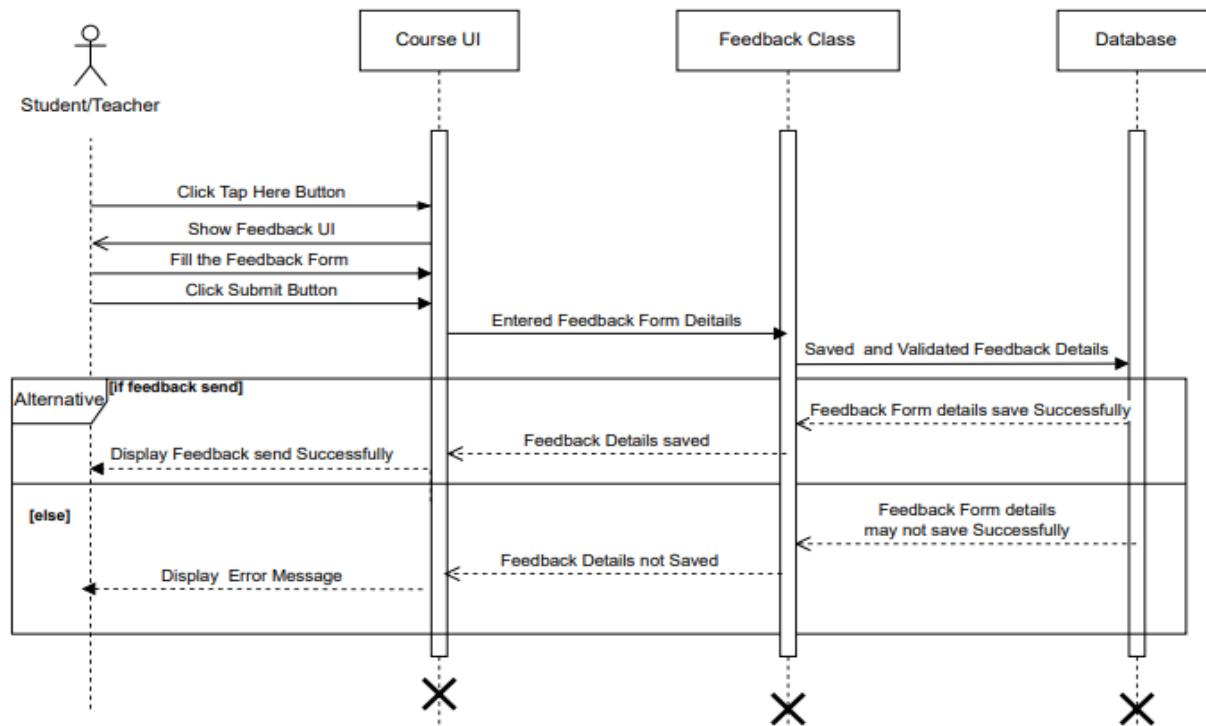
### Sequence Diagram - Student/Teacher View Messages



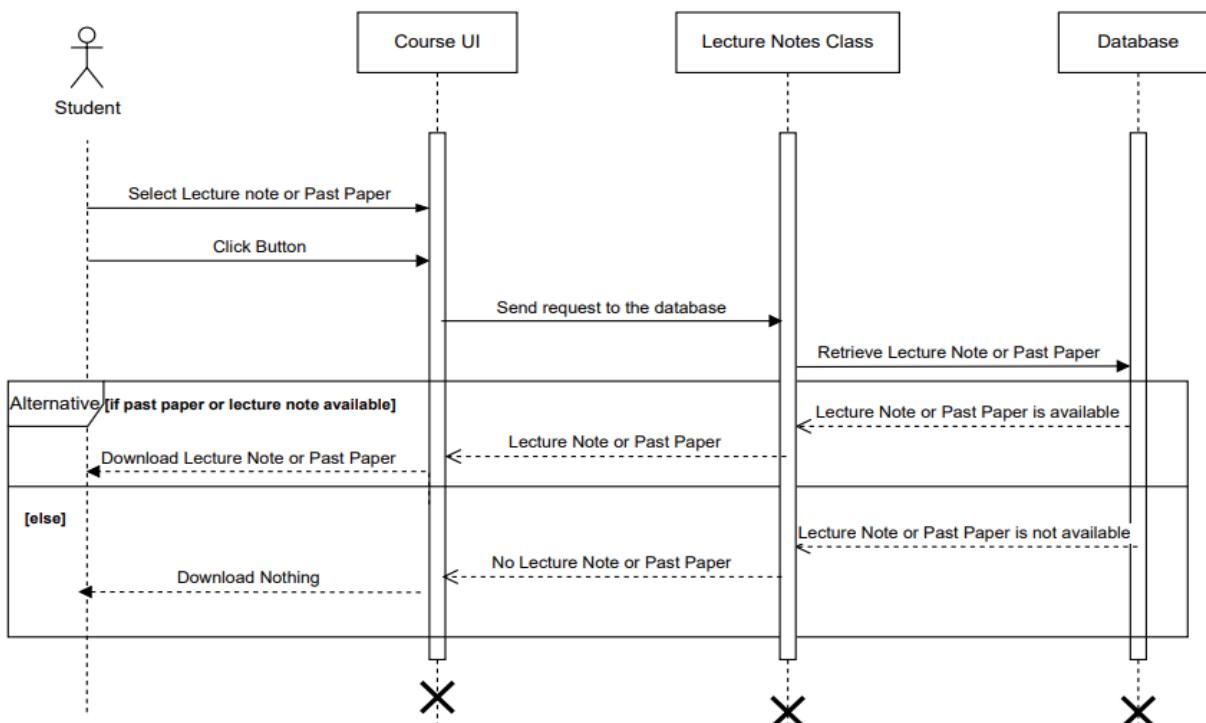
### Sequence Diagram - Student Apply for the Repeat Exam



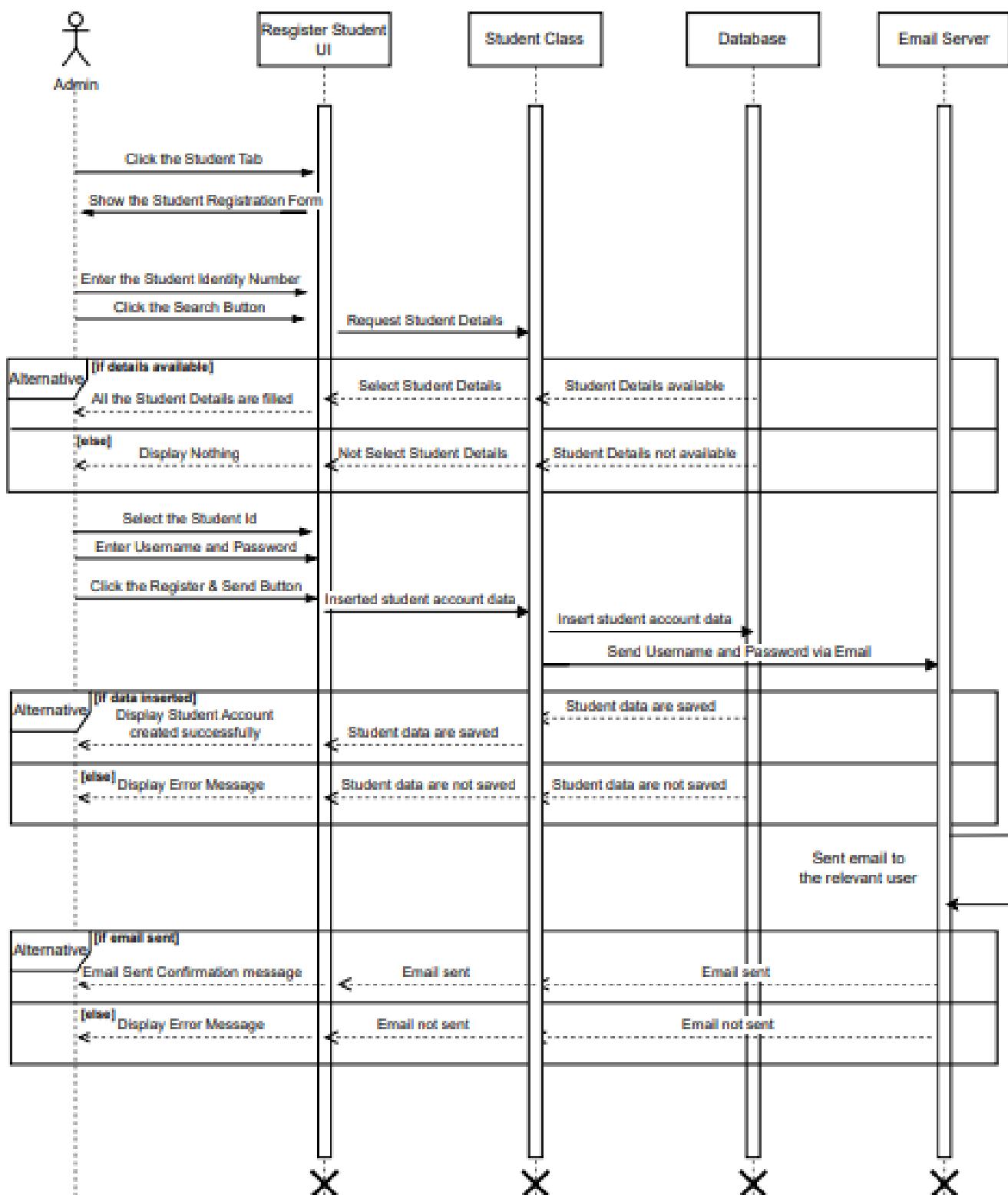
### Sequence Diagram - Student/Teacher Send Feedbacks



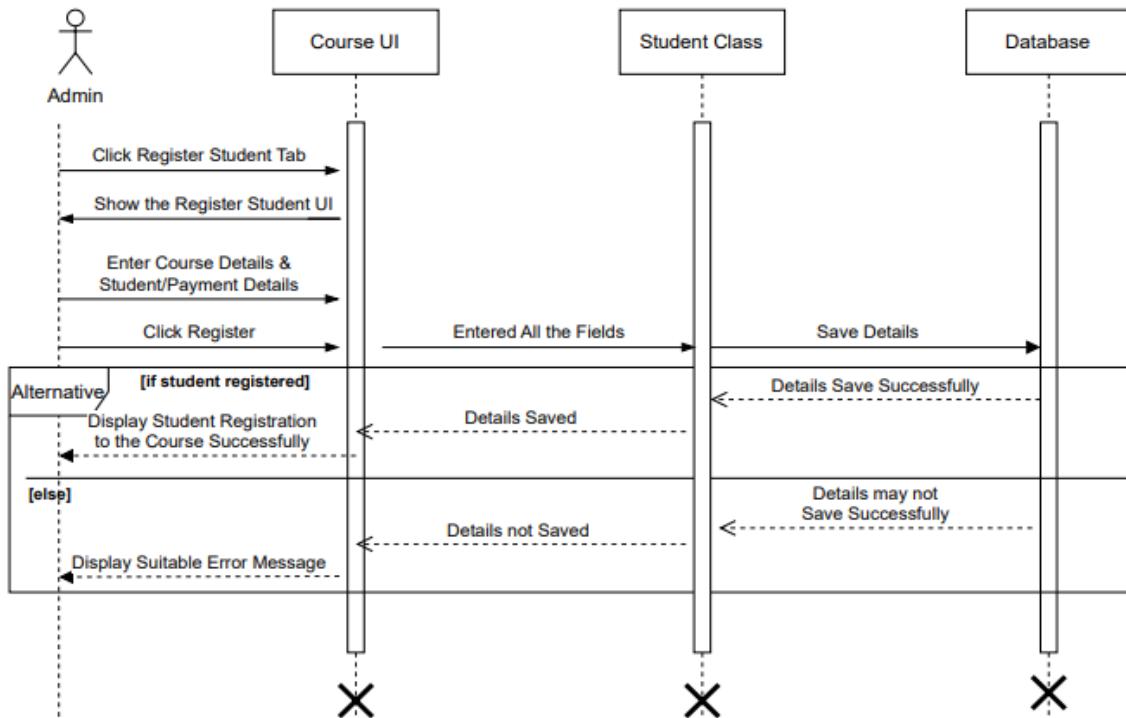
### Sequence Diagram - Student Download Lecture Notes/Past Papers



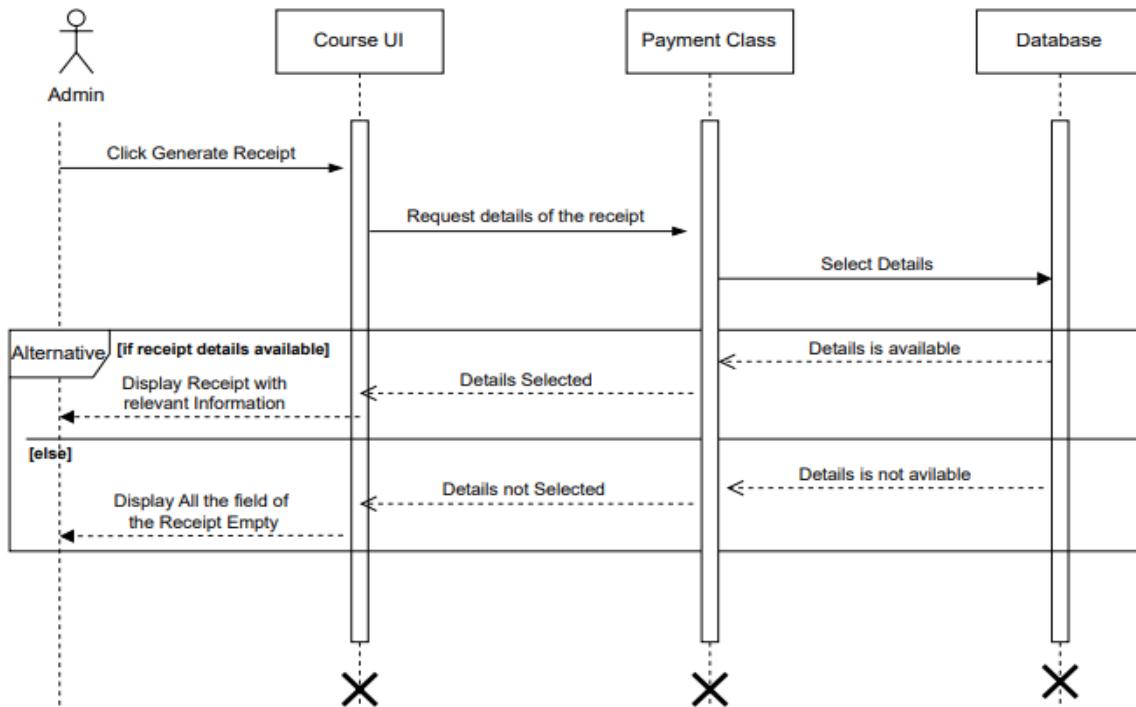
**Sequence Diagram - Admin Register Student to the System  
and Send System account's Credentials**



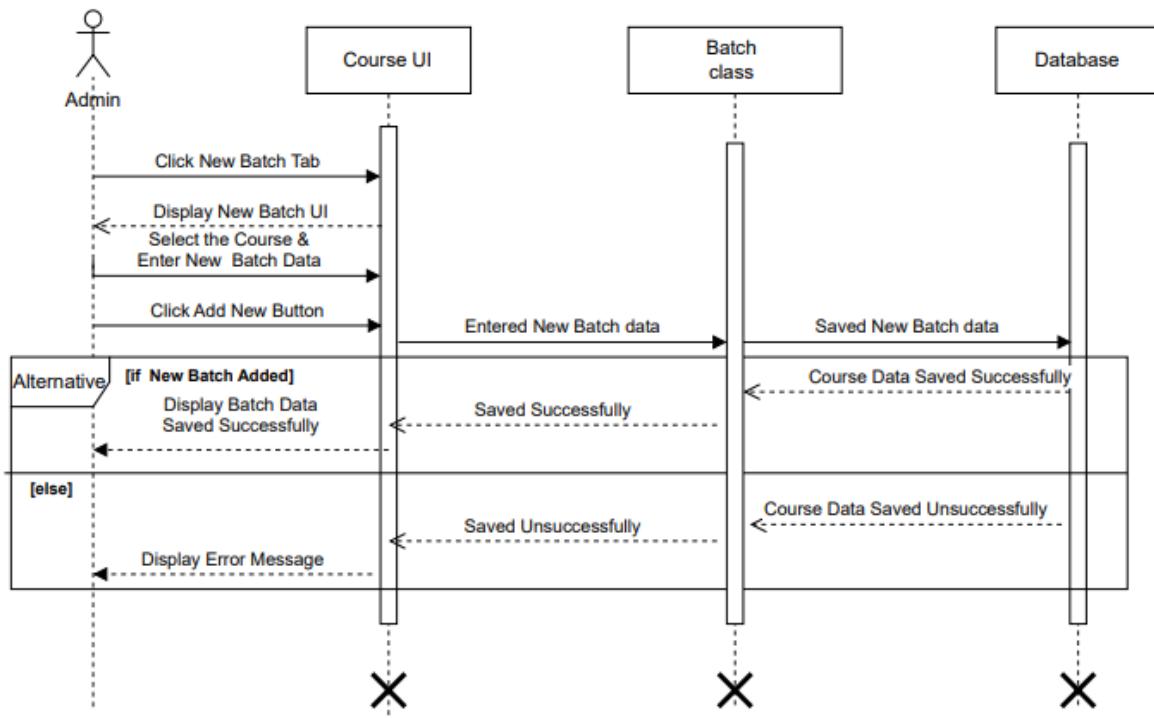
### Sequence Diagram - Admin Register Student to the Course



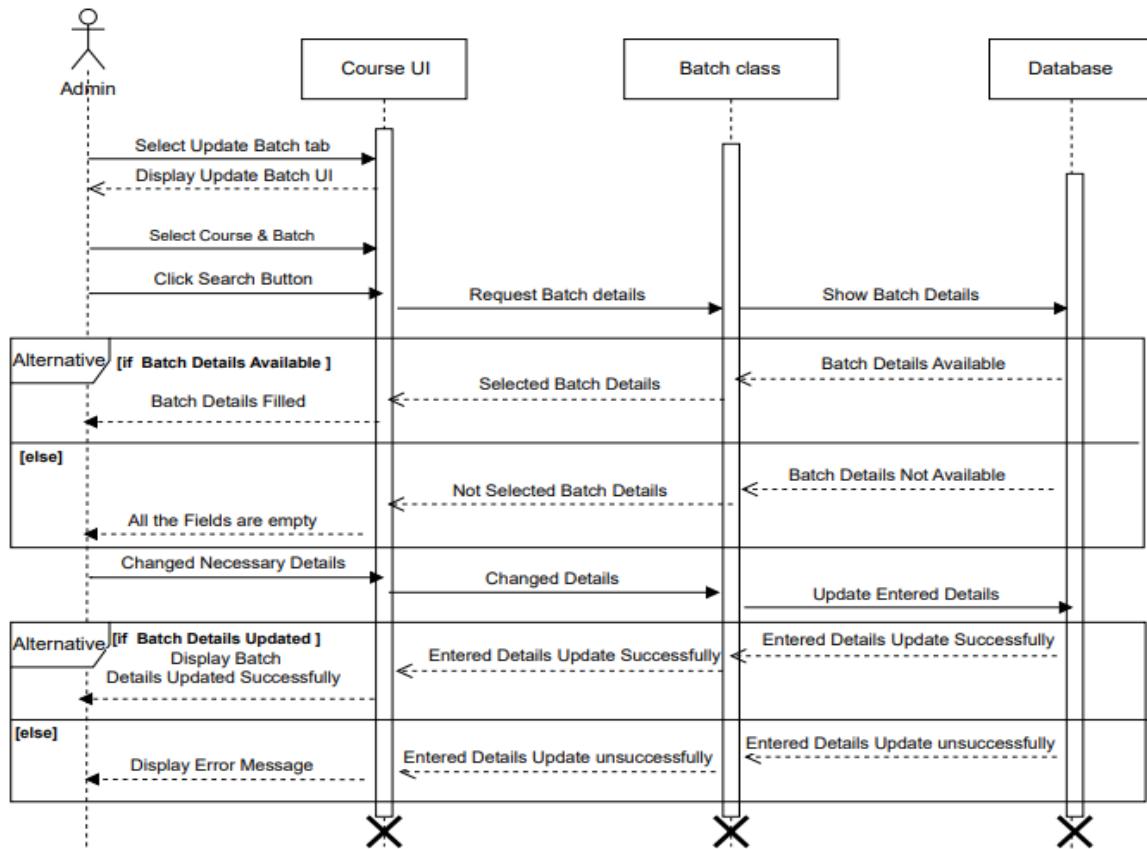
### Sequence Diagram - Admin Generate Payment Receipt



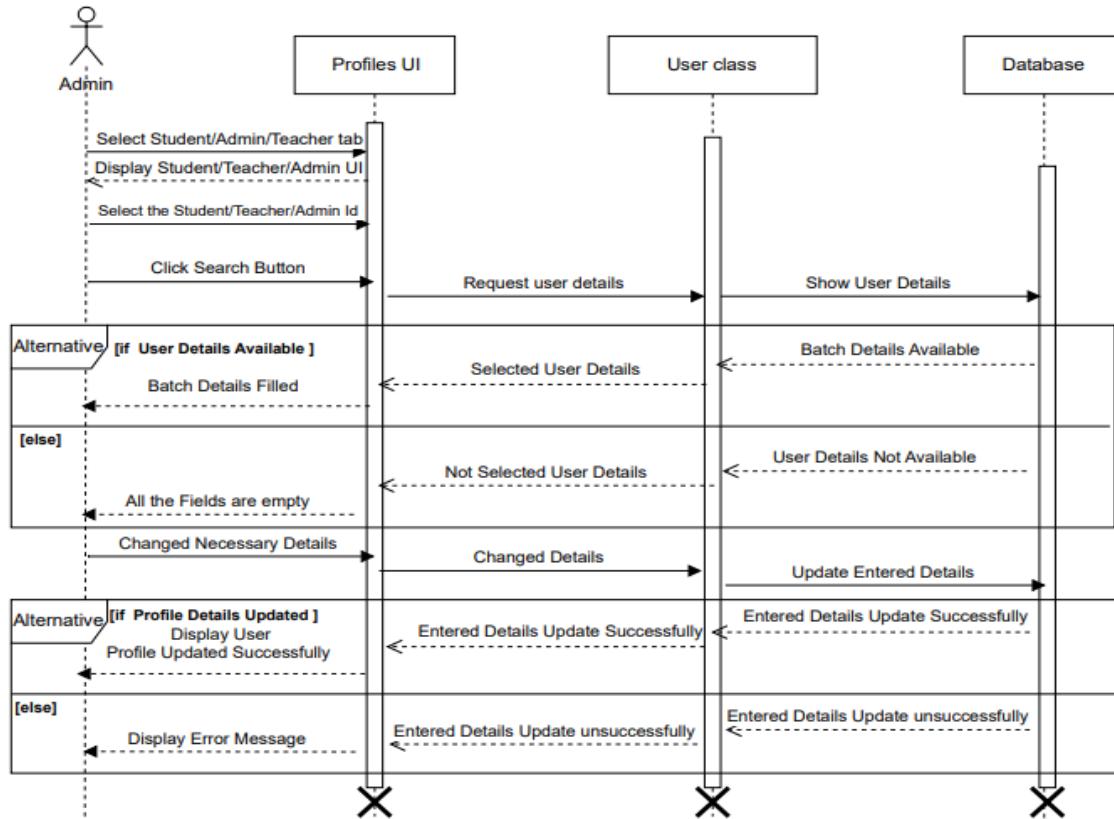
### Sequence Diagram - Admin Add New Batch



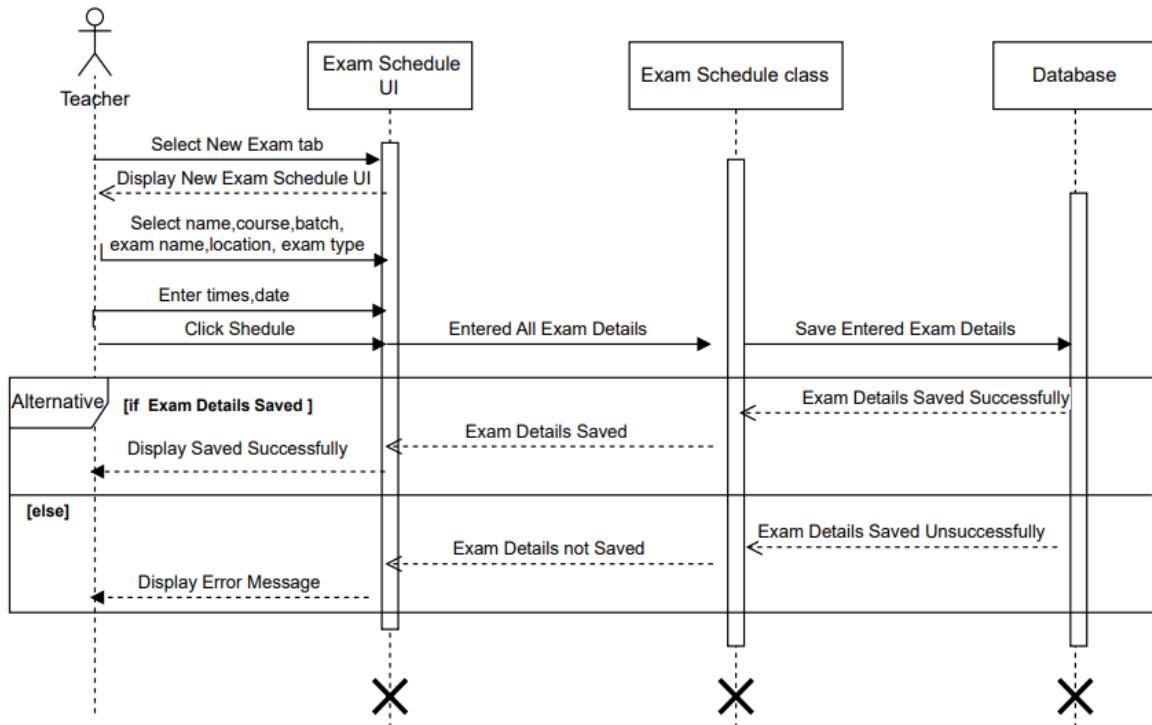
### Sequence Diagram - Admin Update Existing Batch



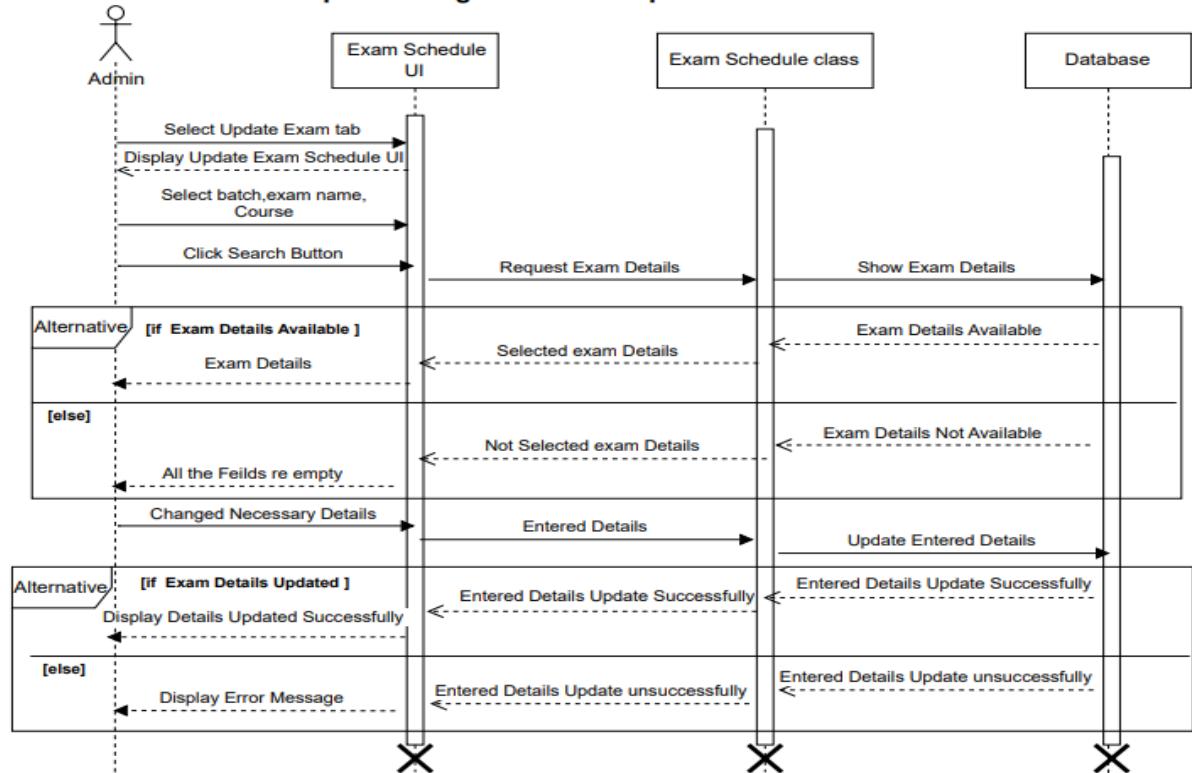
### Sequence Diagram - Admin Update Student/Teacher/Admin Profiles



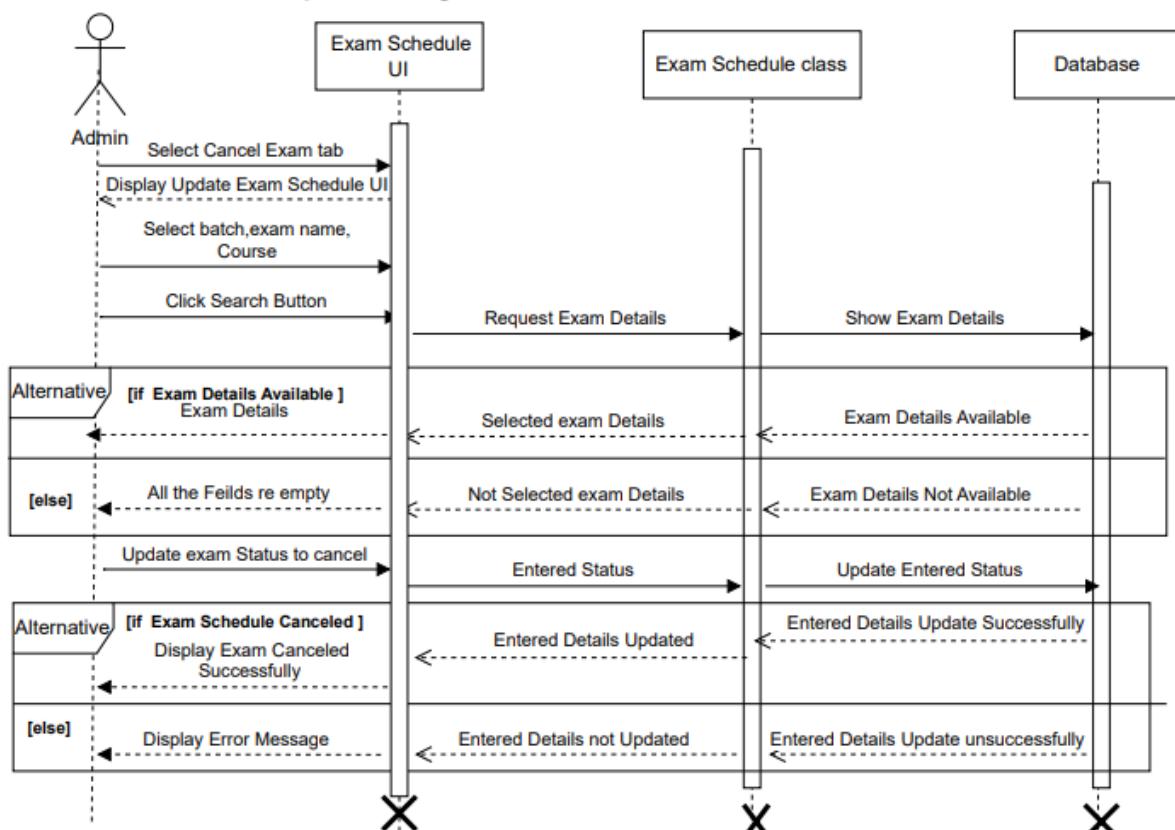
### Sequence Diagram - Admin Add Exam Schedule

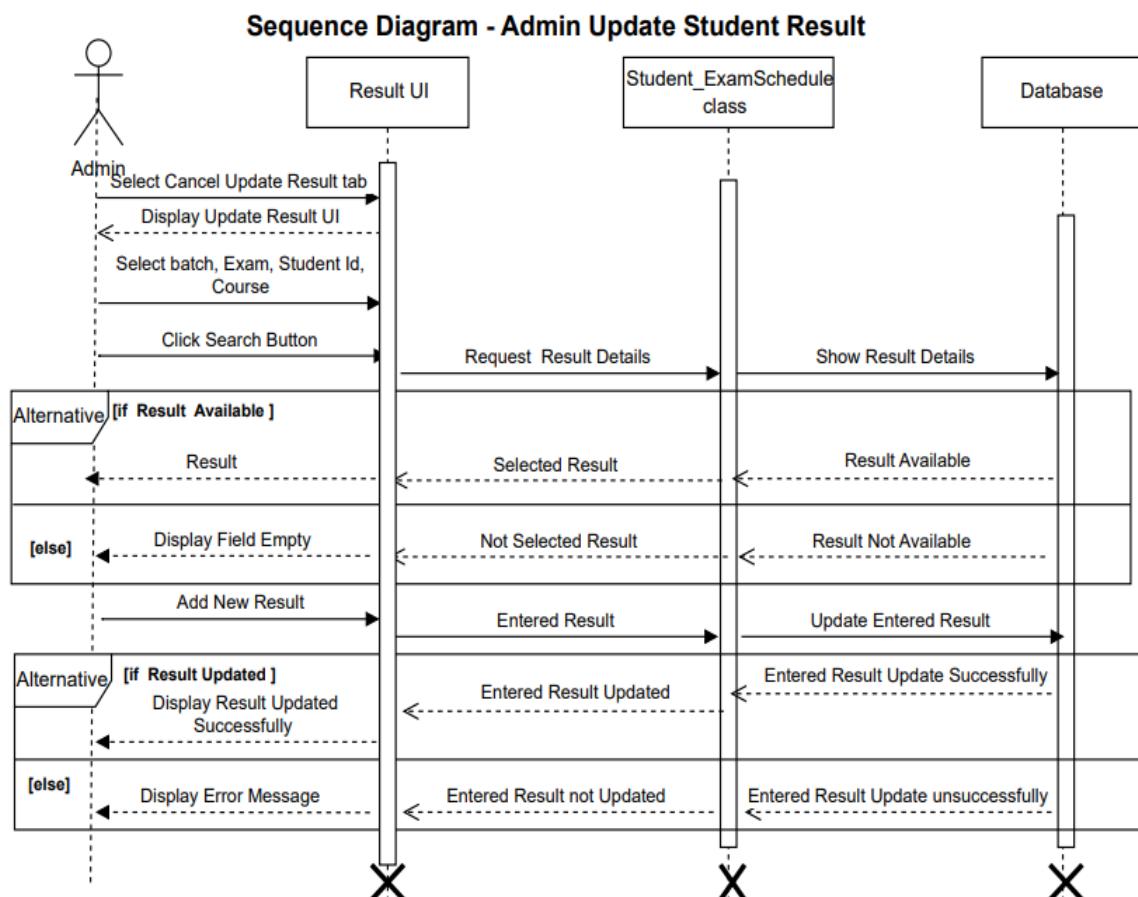
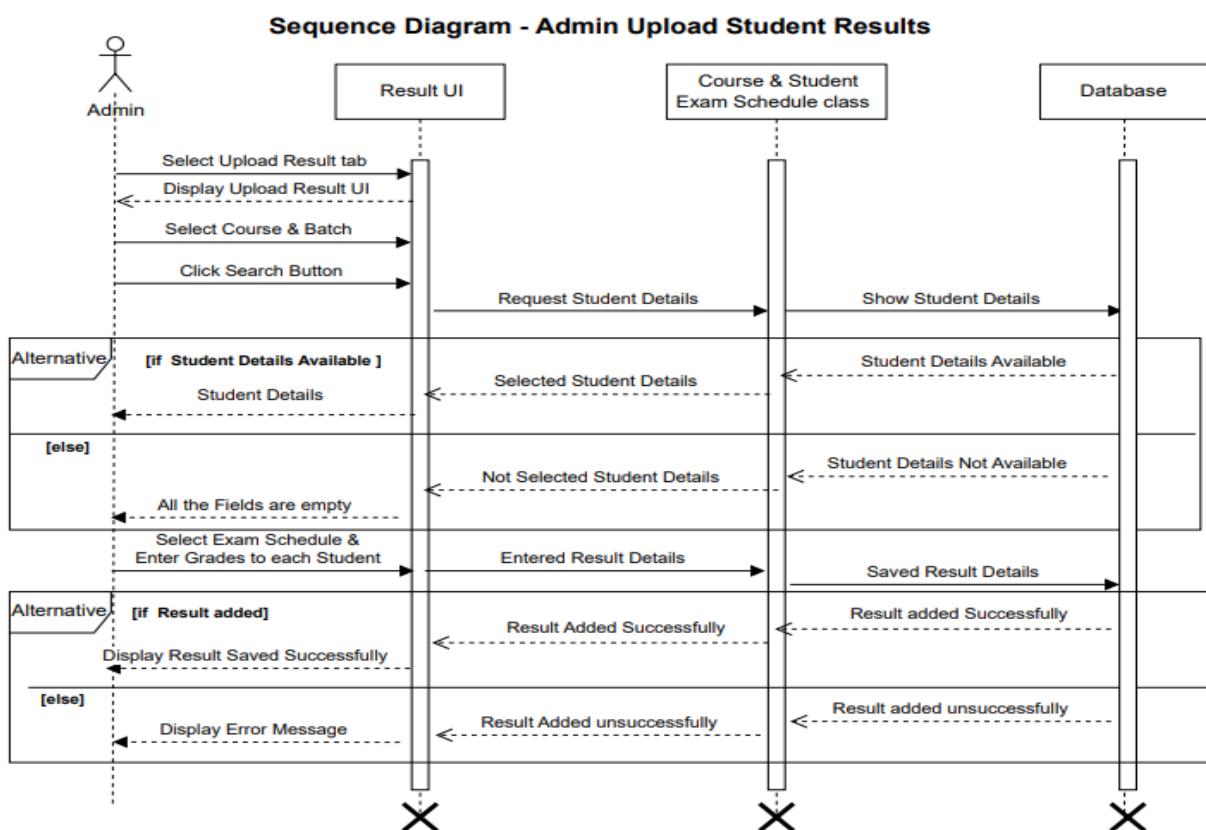


### Sequence Diagram - Admin update Exam Schedule

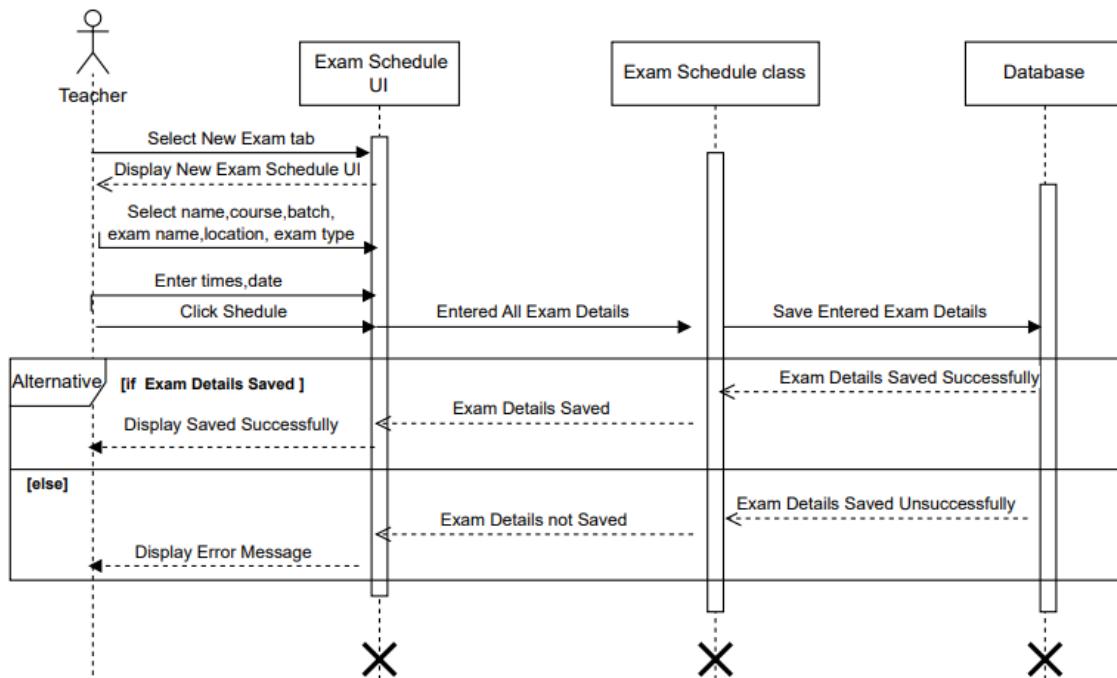


### Sequence Diagram - Admin Cancel Exam Schedule

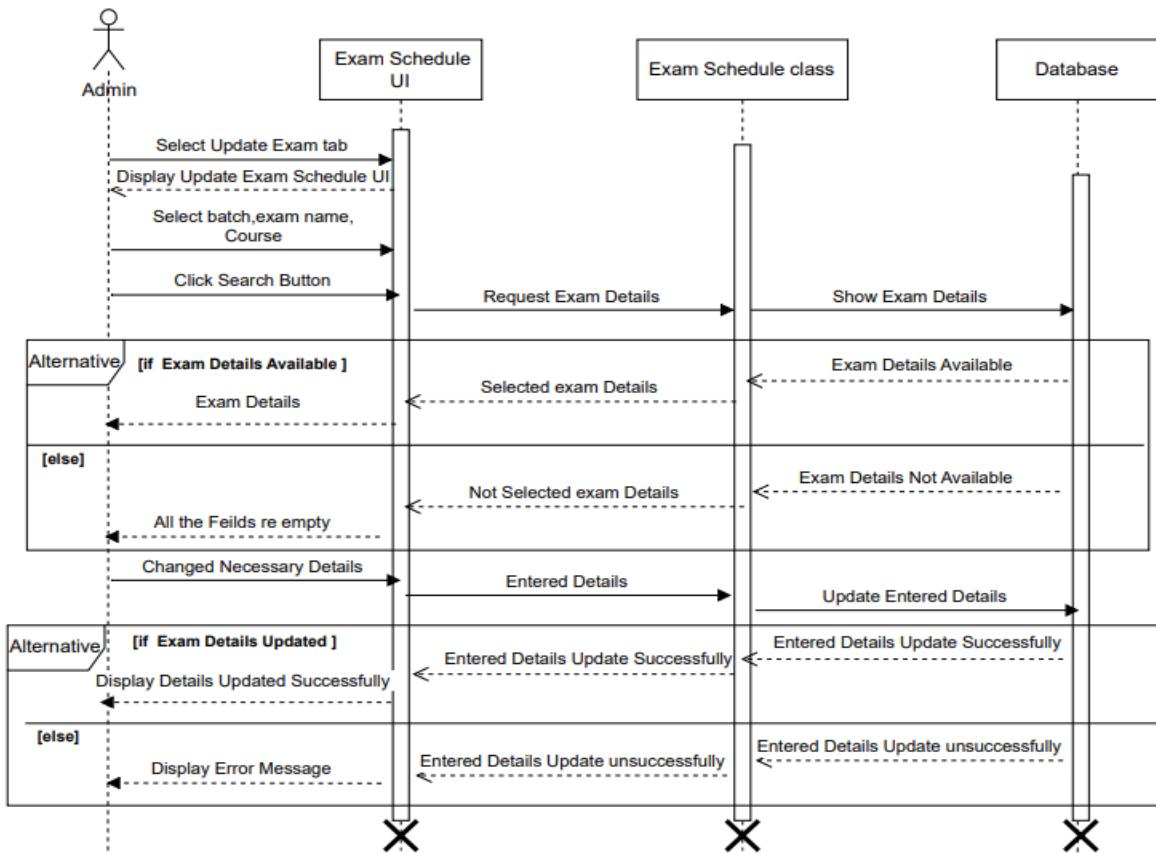




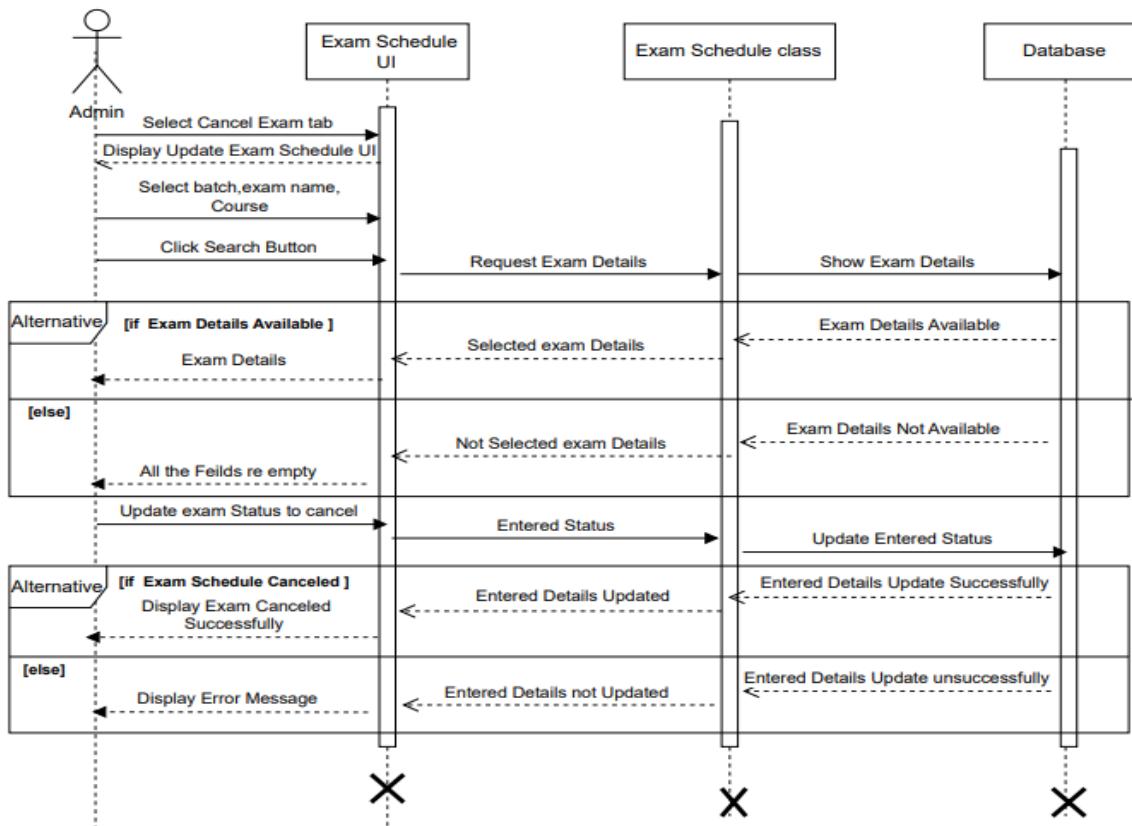
### Sequence Diagram - Admin Add Repeat Exam Schedule



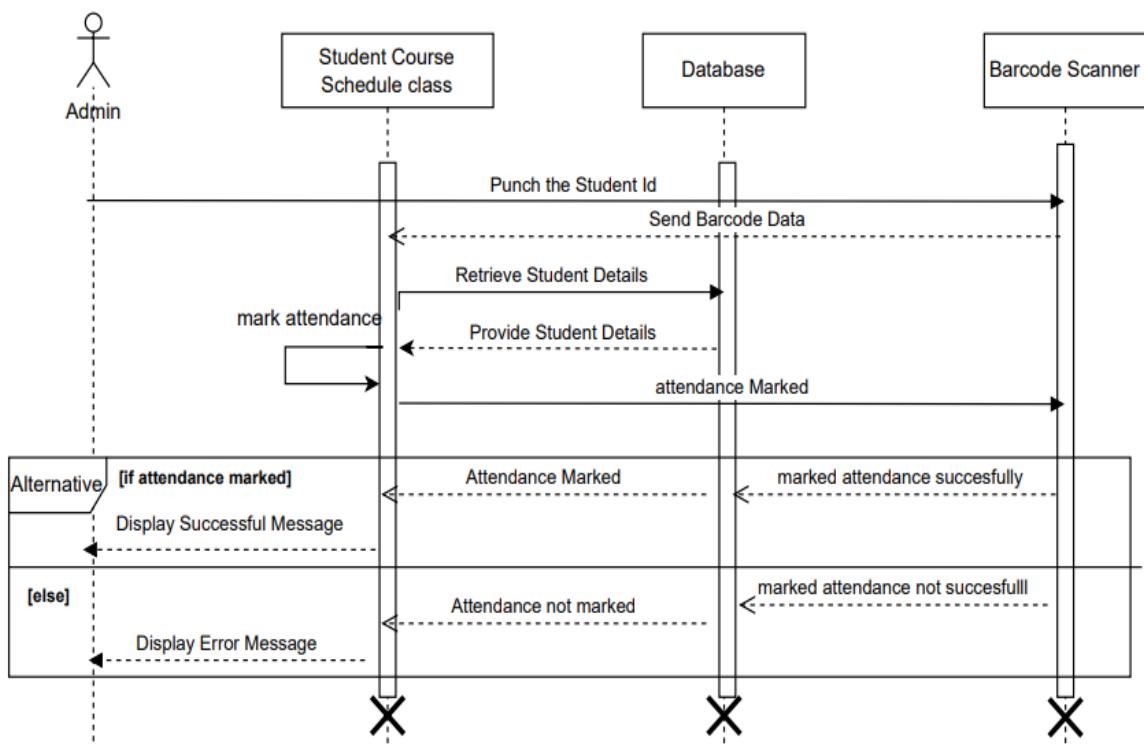
### Sequence Diagram - Admin update Repeat Exam Schedule



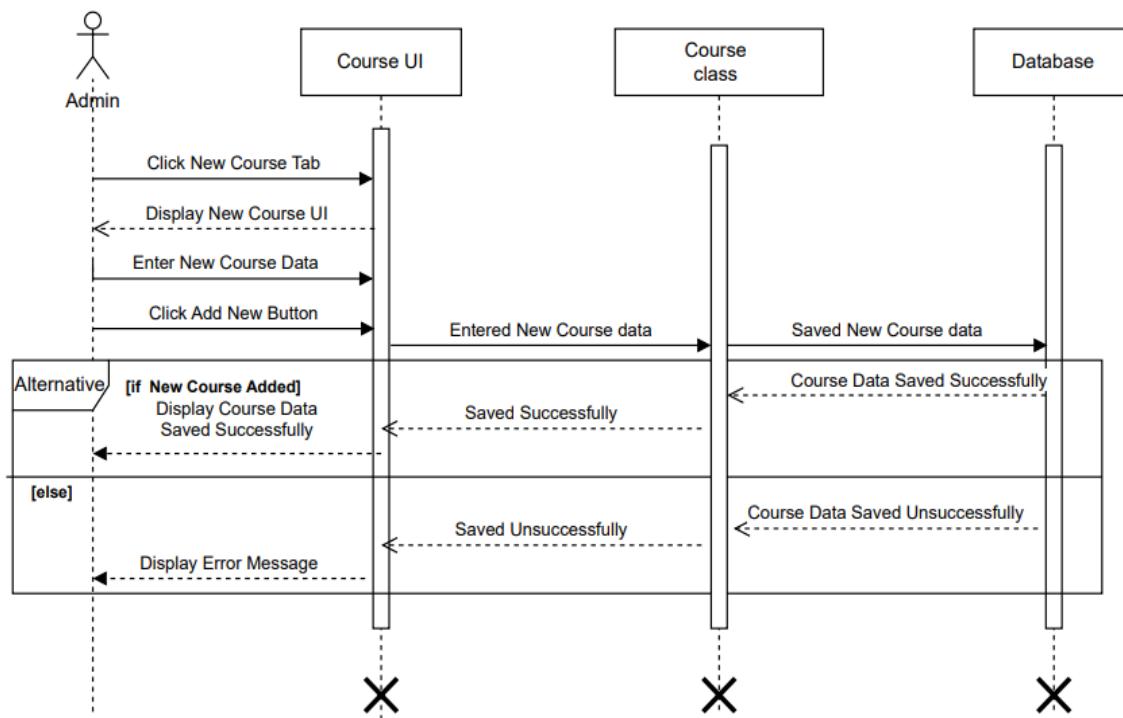
### Sequence Diagram - Admin Cancel Repeat Exam Schedule



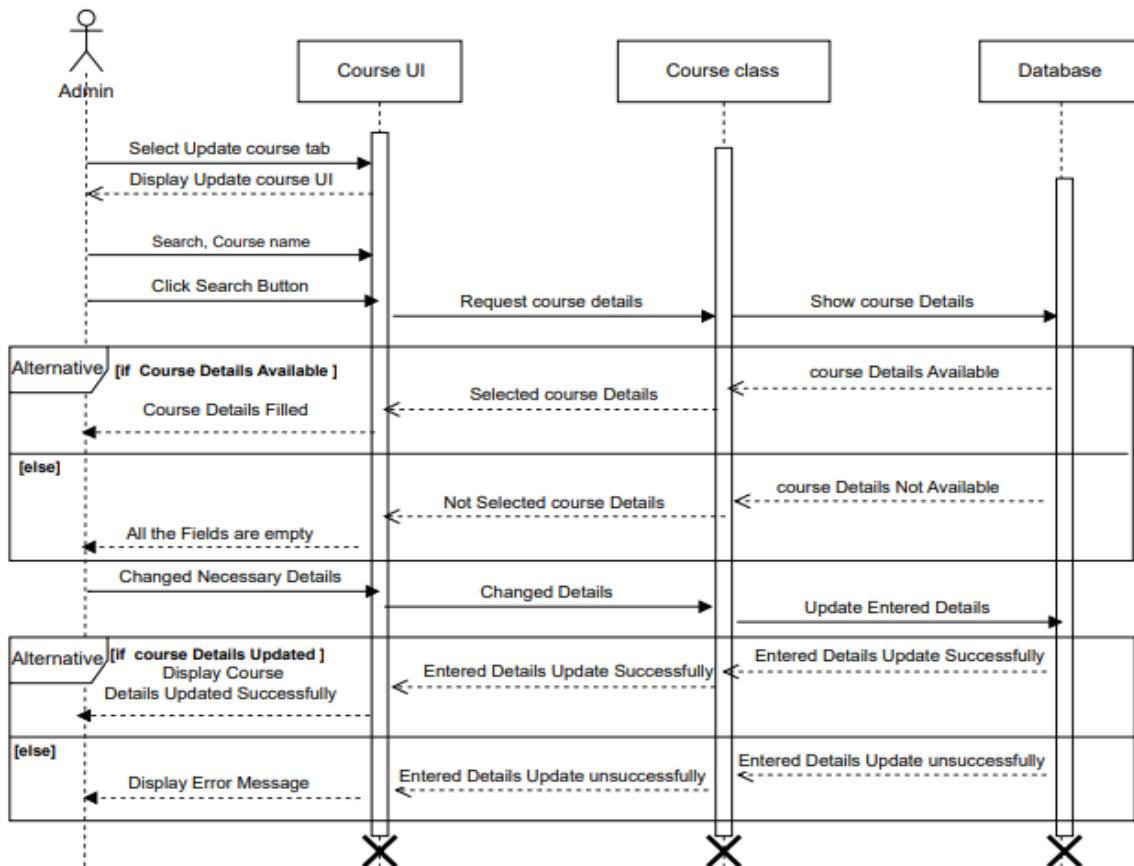
### Sequence Diagram - Admin mark the Students attendance



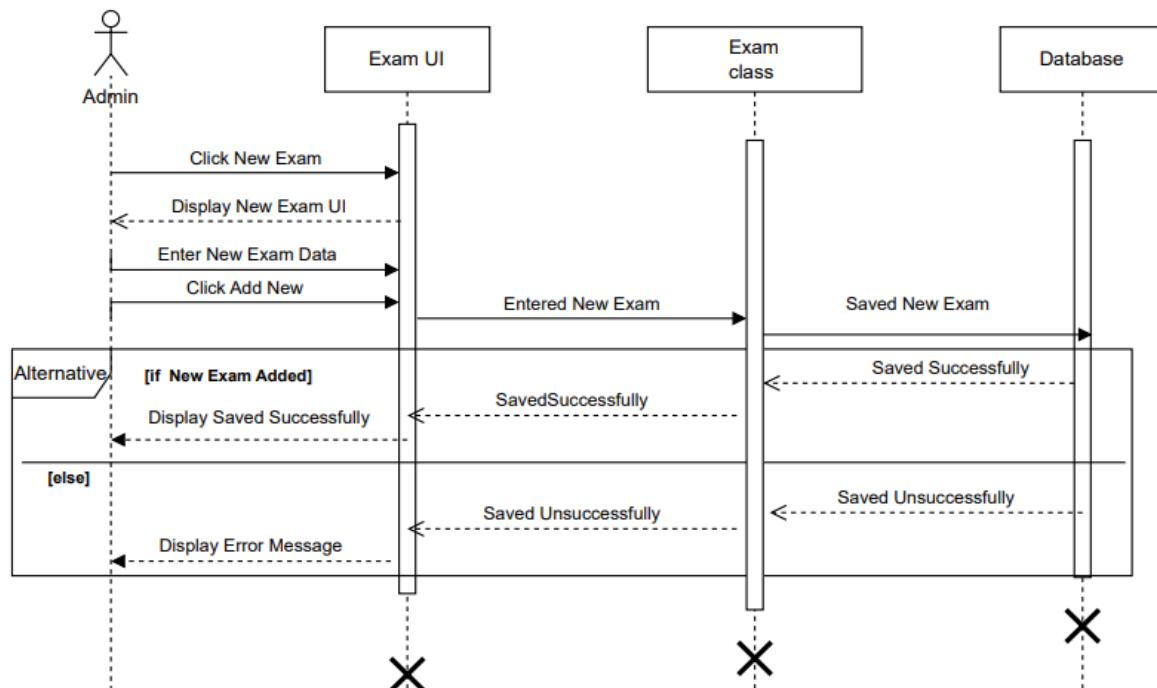
### Sequence Diagram - Admin Add New Course



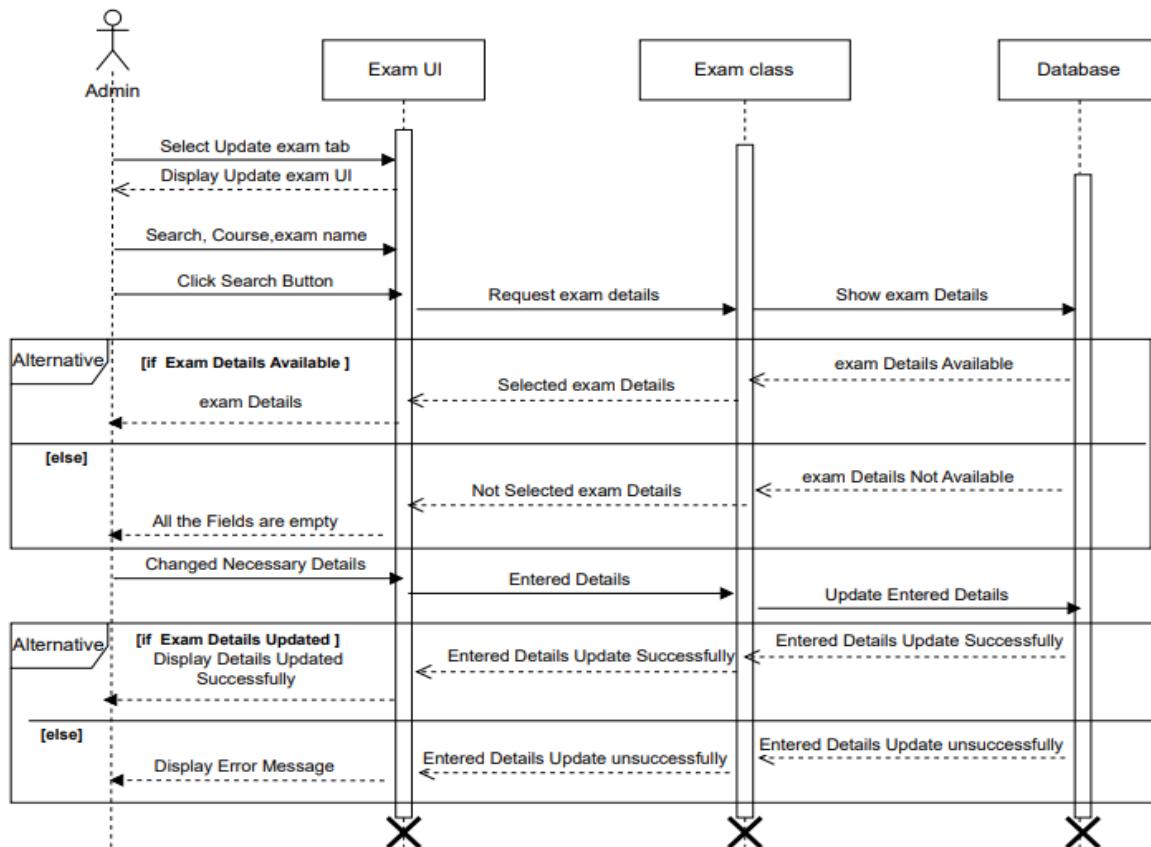
### Sequence Diagram - Admin Update Existing Course



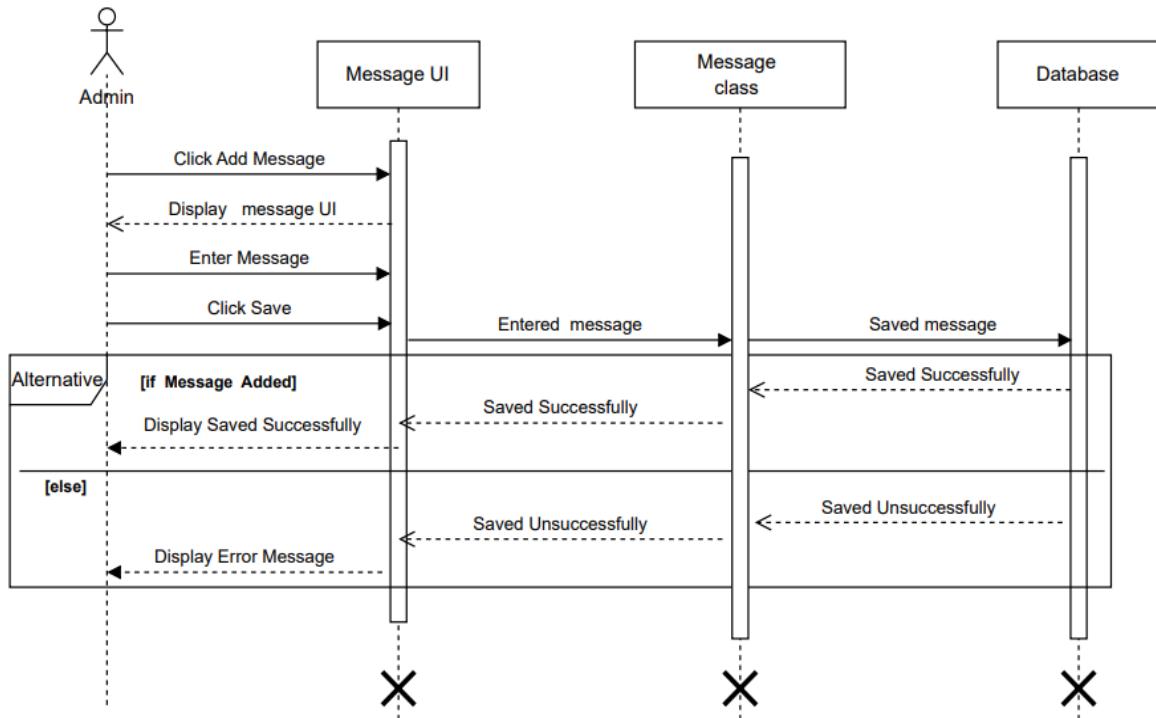
### Sequence Diagram - Admin add New Exam



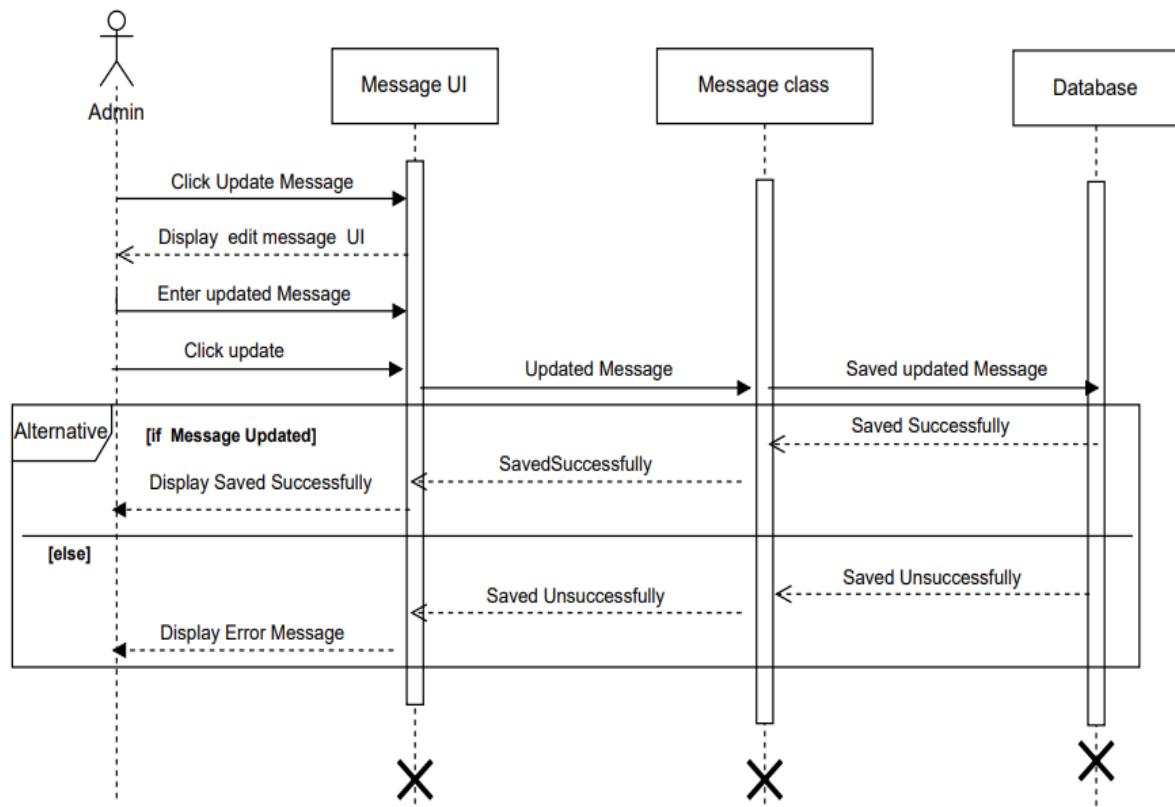
### Sequence Diagram - Admin update Existing Exam



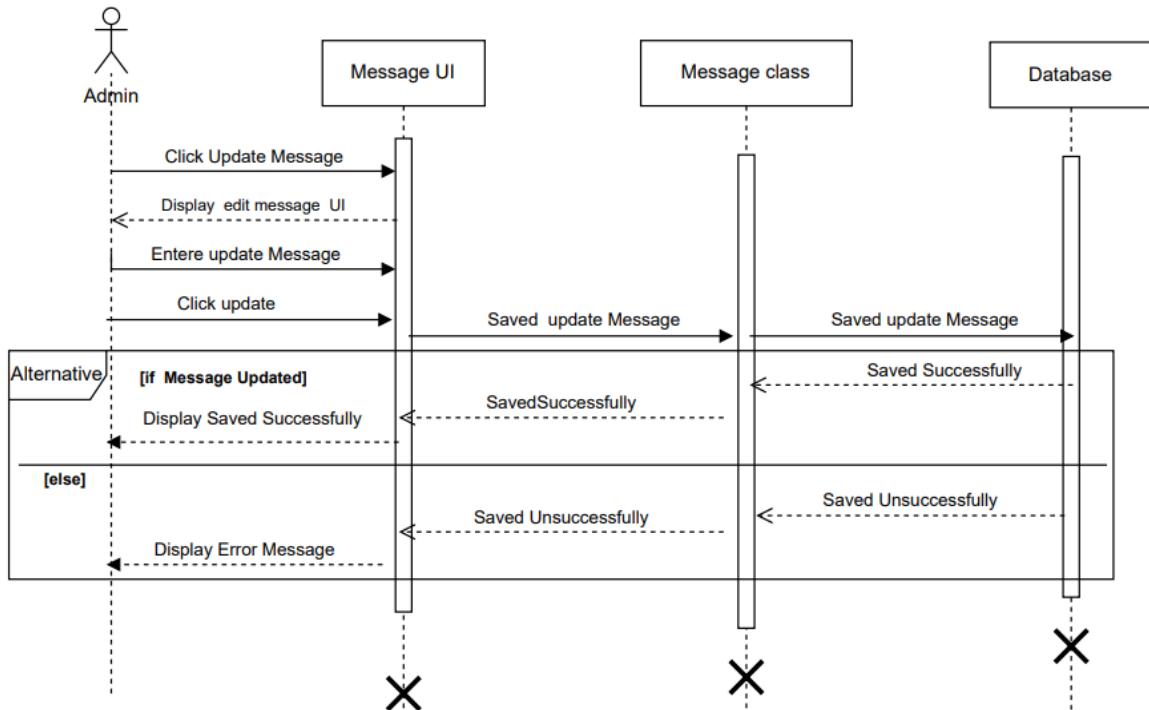
### Sequence Diagram - Admin add New Message



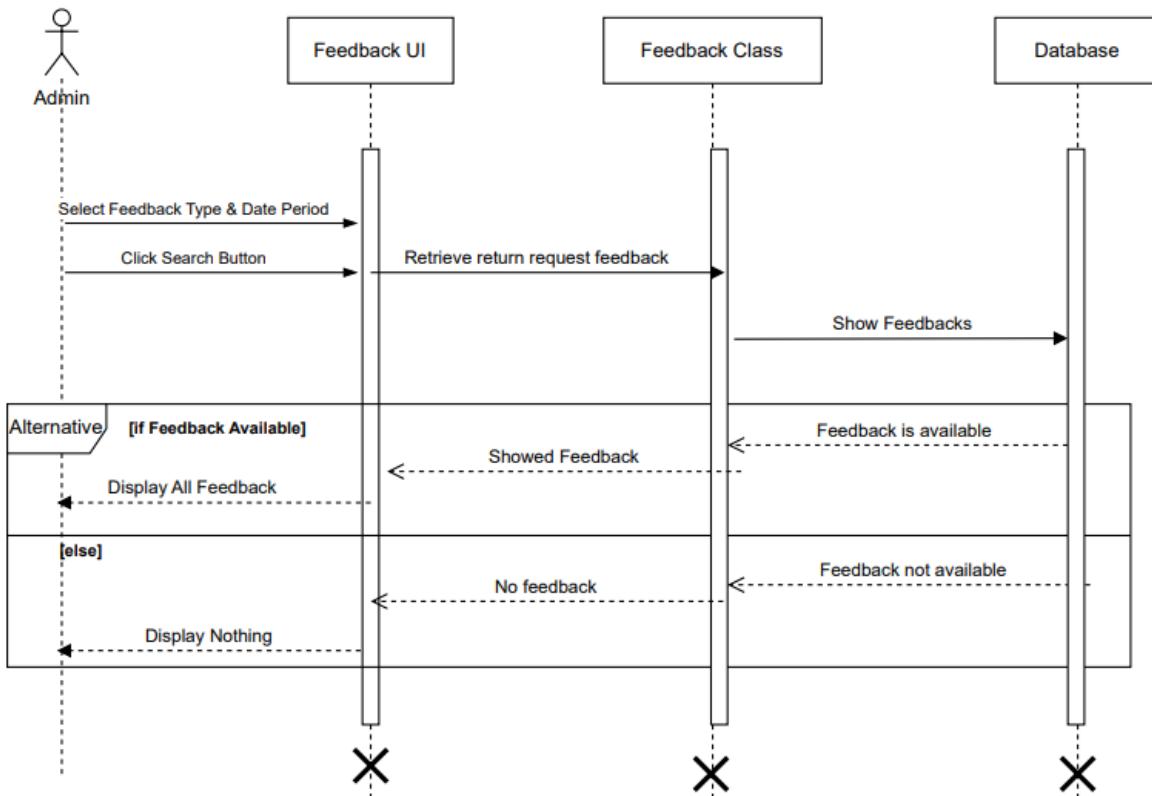
### Sequence Diagram - Admin update Existing Message



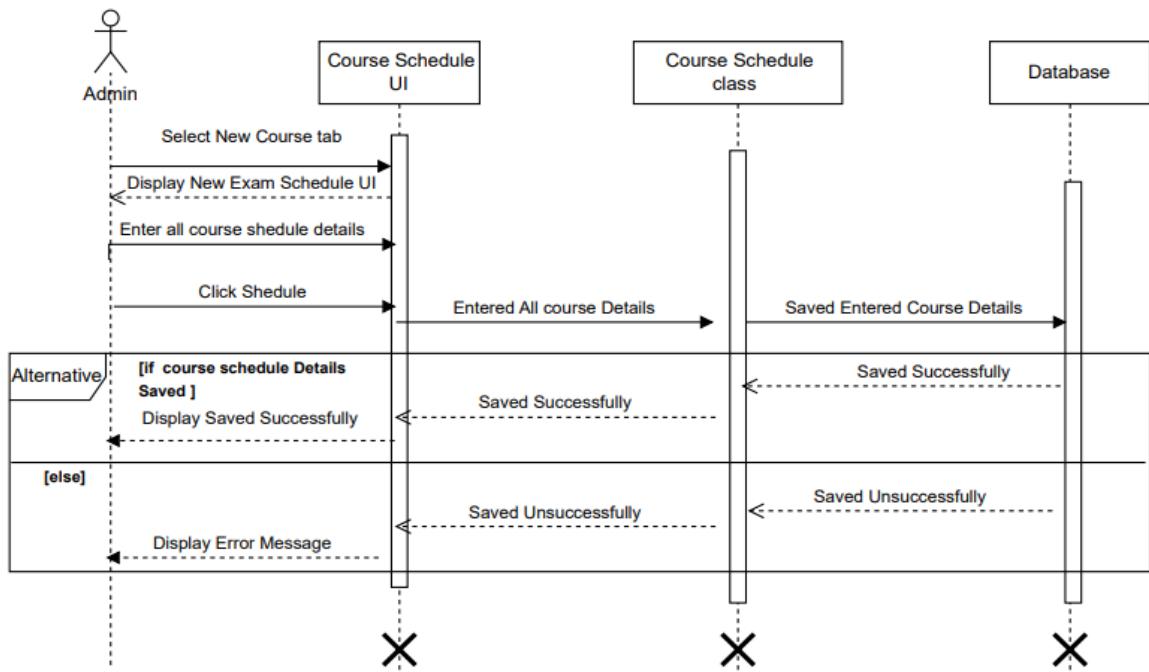
### Sequence Diagram - Admin delete Message



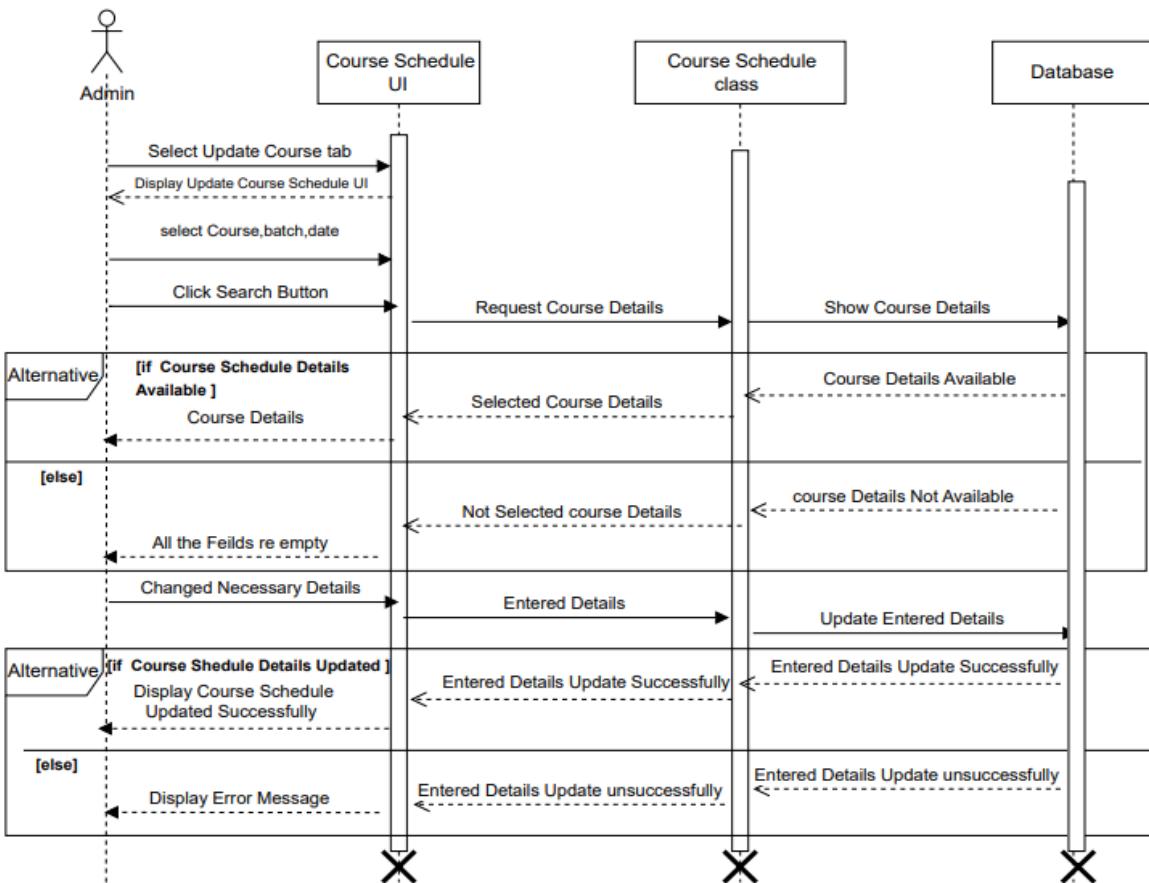
### Sequence Diagram - Admin View Feedbacks



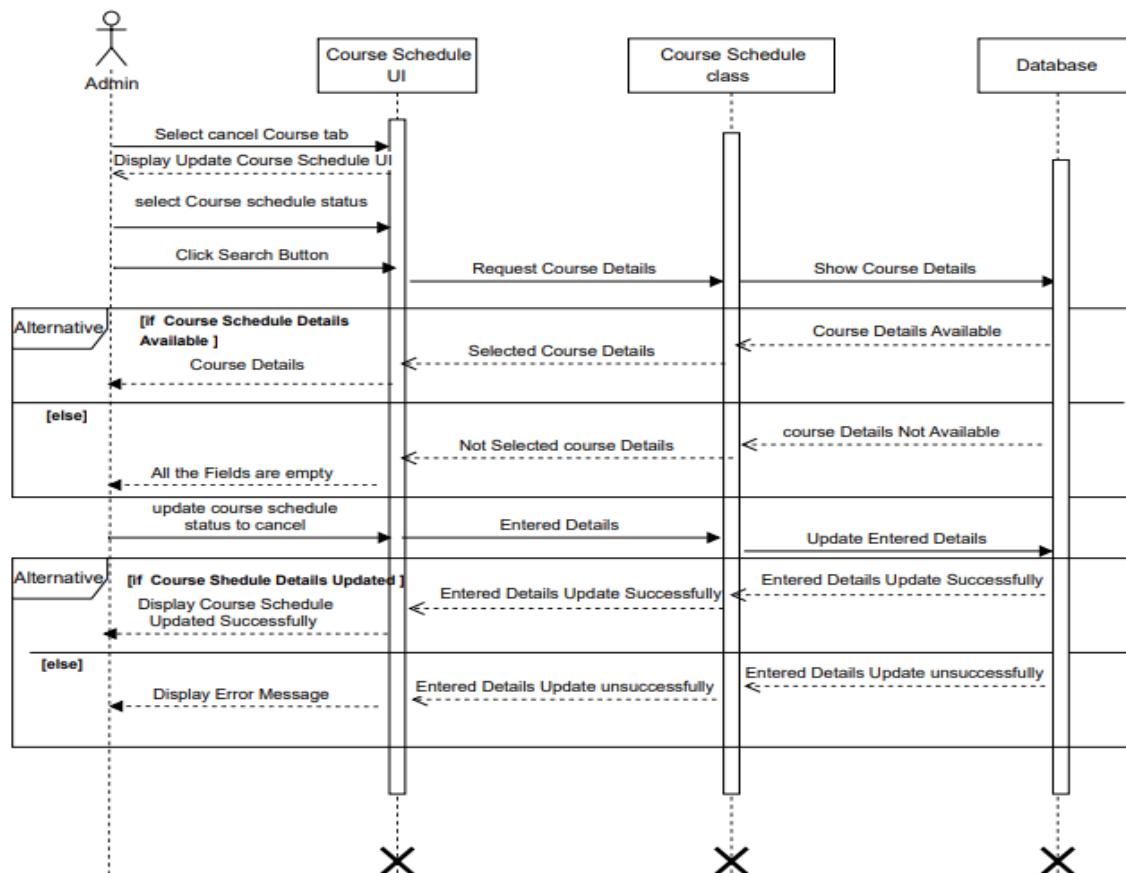
### Sequence Diagram - Admin add Course Schedule



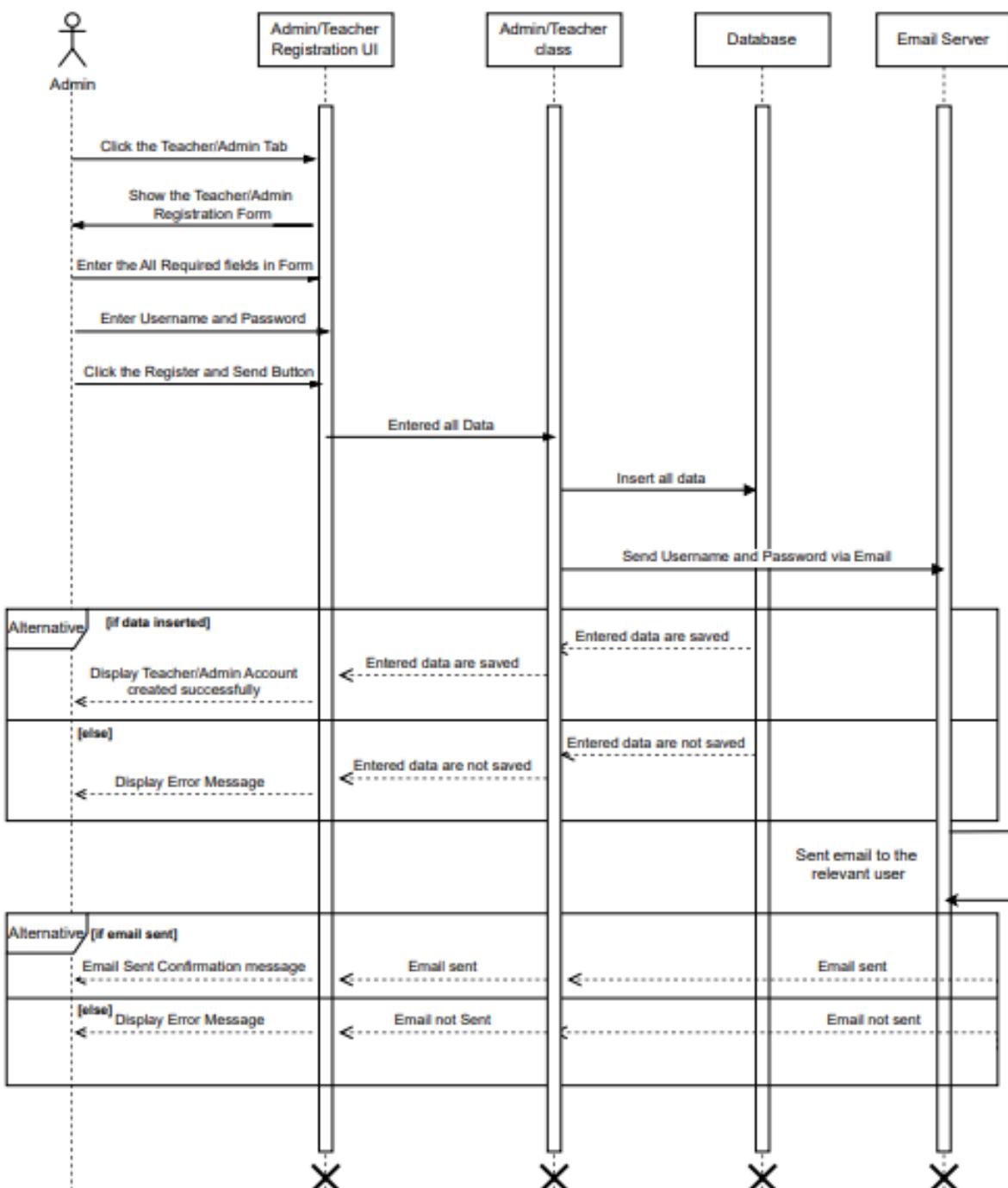
### Sequence Diagram - Admin Update Existing Course Schedule



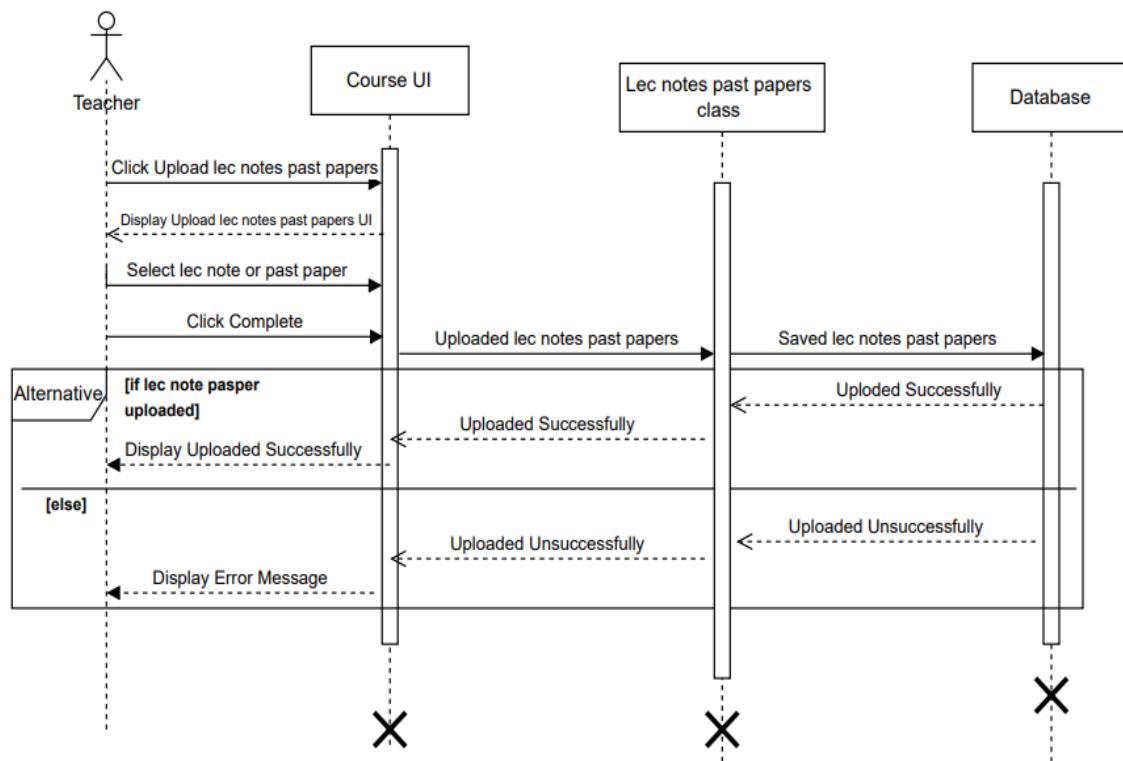
### Sequence Diagram - Admin Cancel Existing Course Schedule



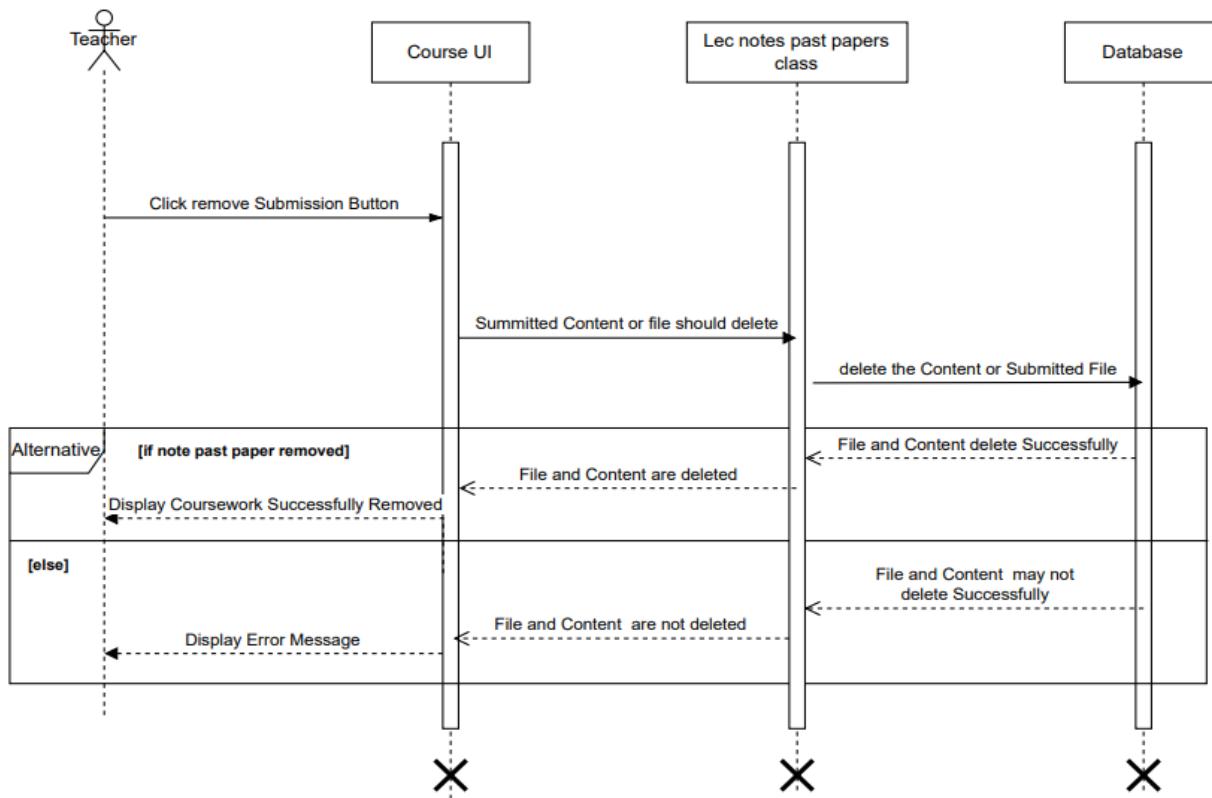
**Admin Register Teacher and another Admin to the System  
and Send System account's Credentials**



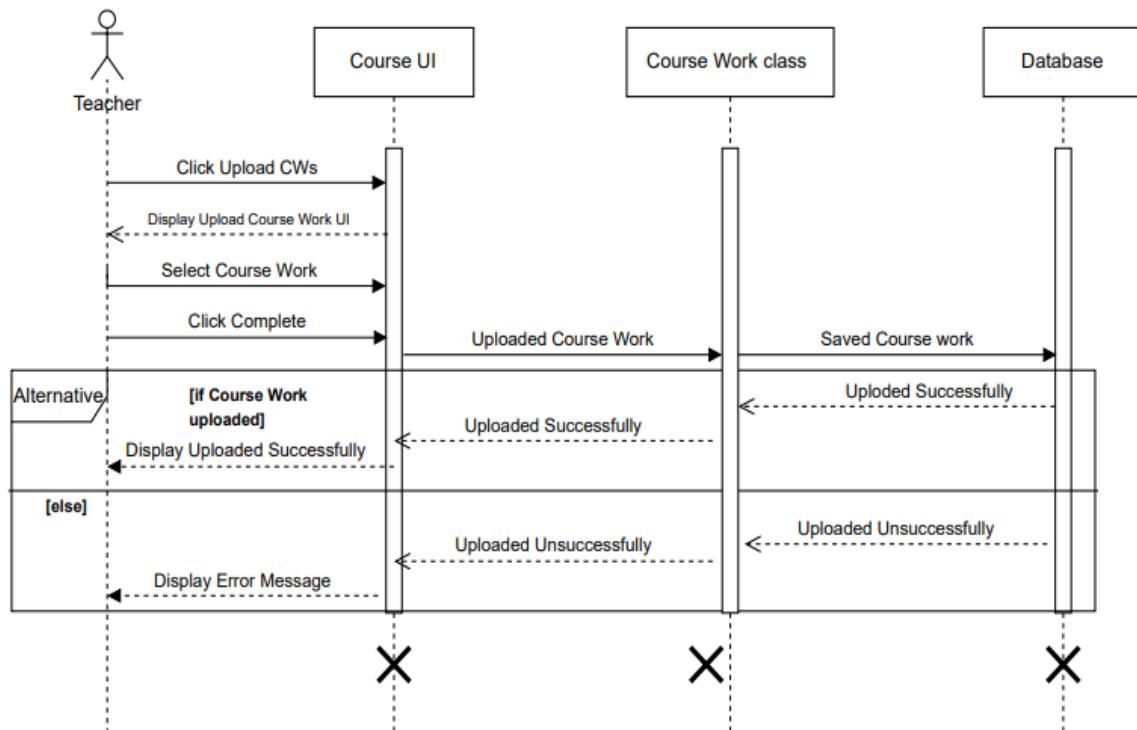
### Sequence Diagram - Teacher Upload Lecture Notes Past Papers



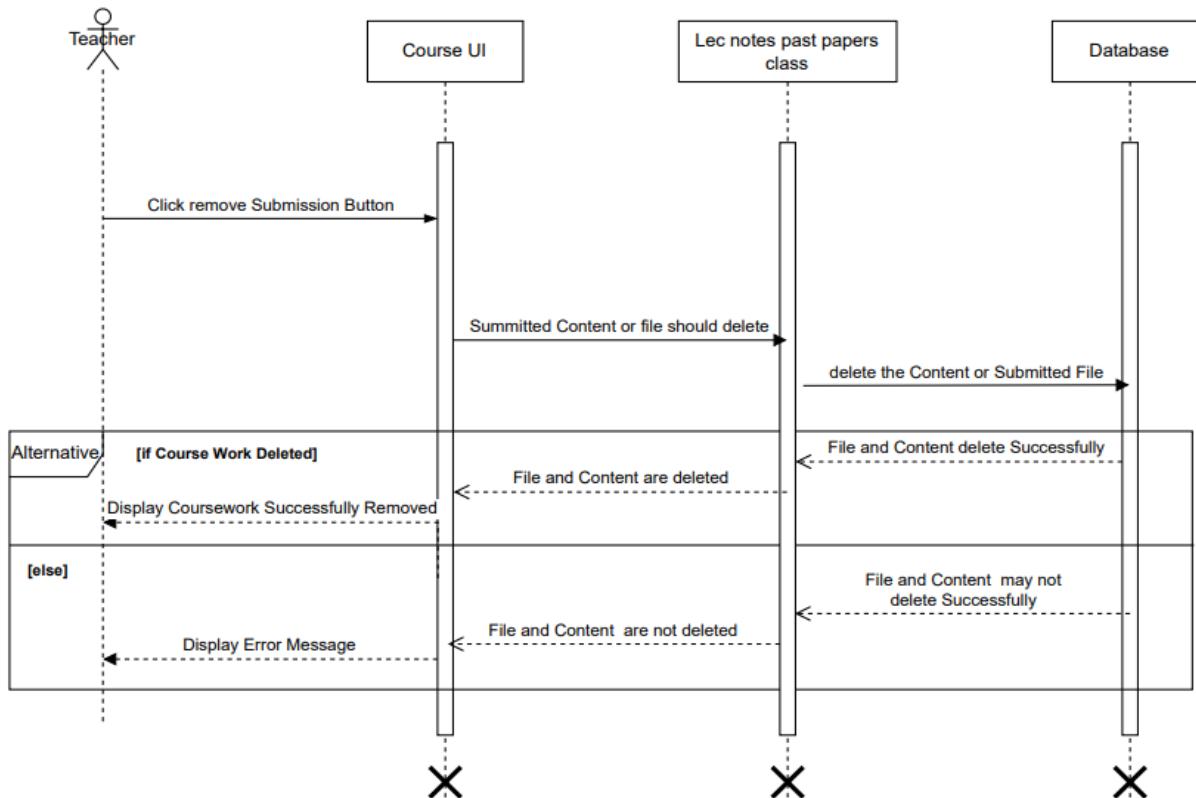
### Sequence Diagram - Teacher Remove Lecture Notes Past Papers



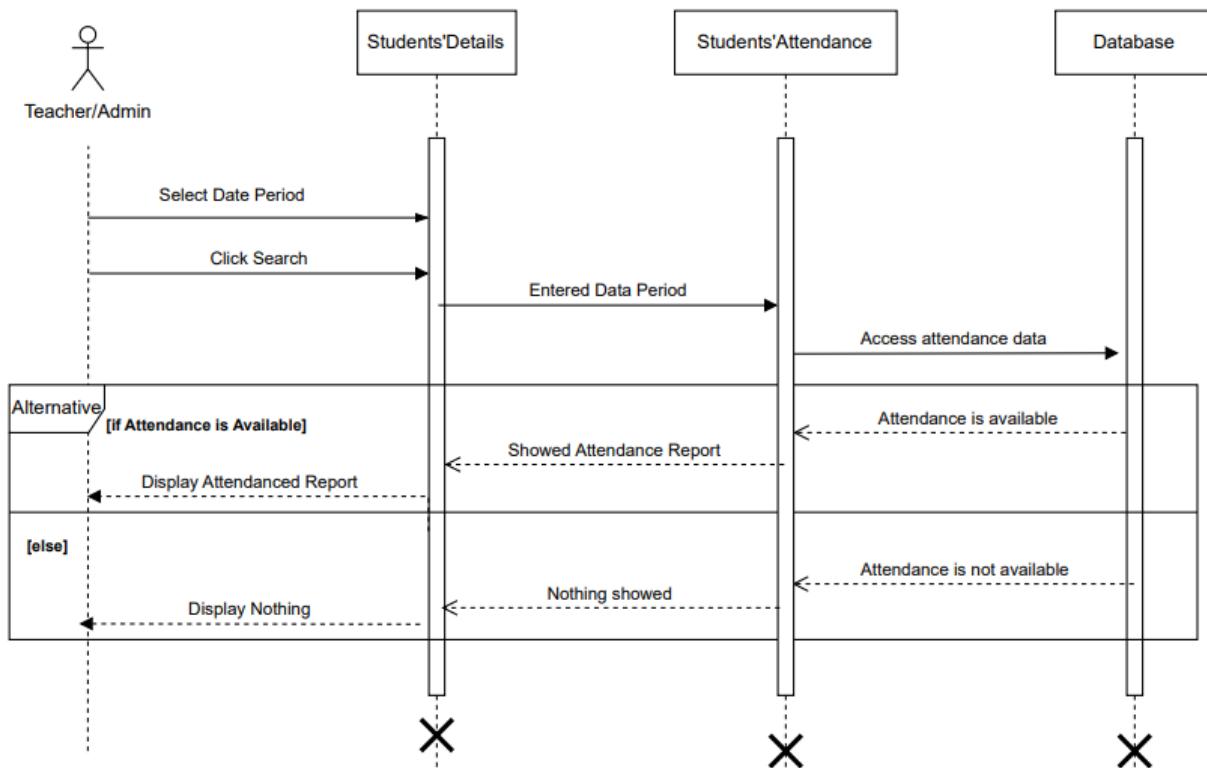
### Sequence Diagram - Teacher Upload Lecture Notes



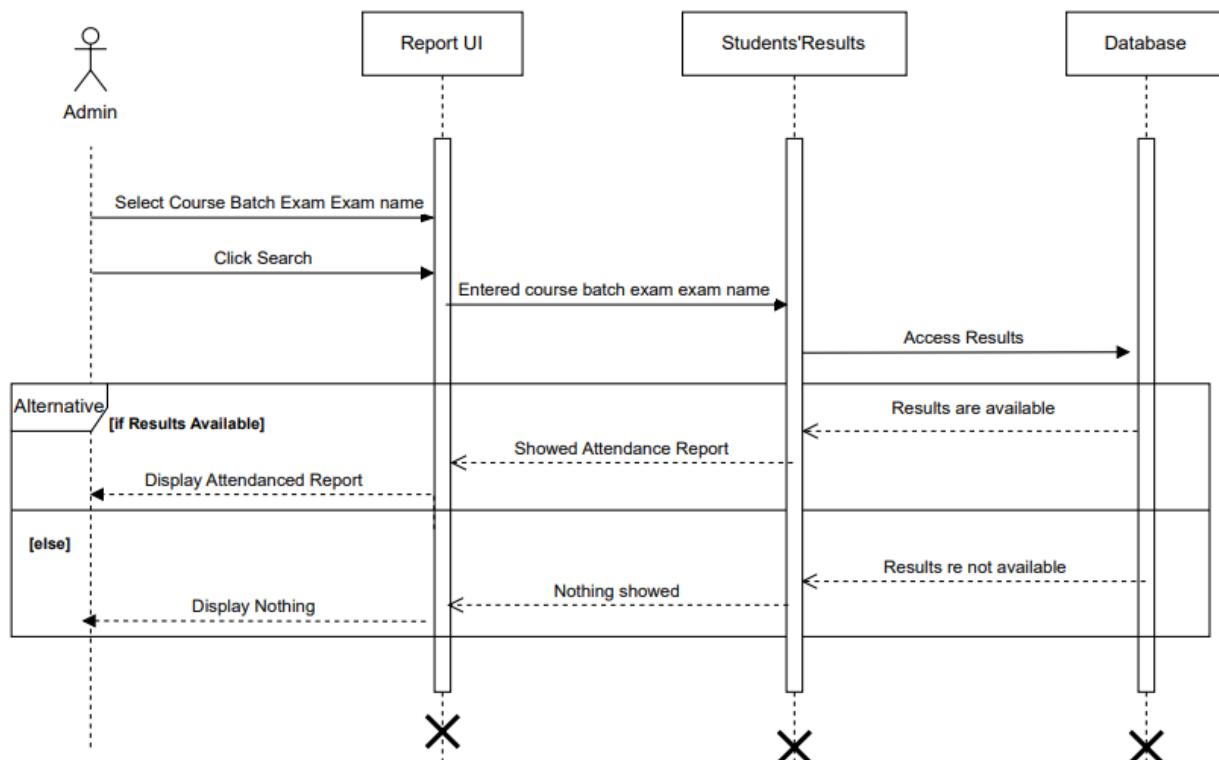
### Sequence Diagram - Teacher Delete Lecture Notes



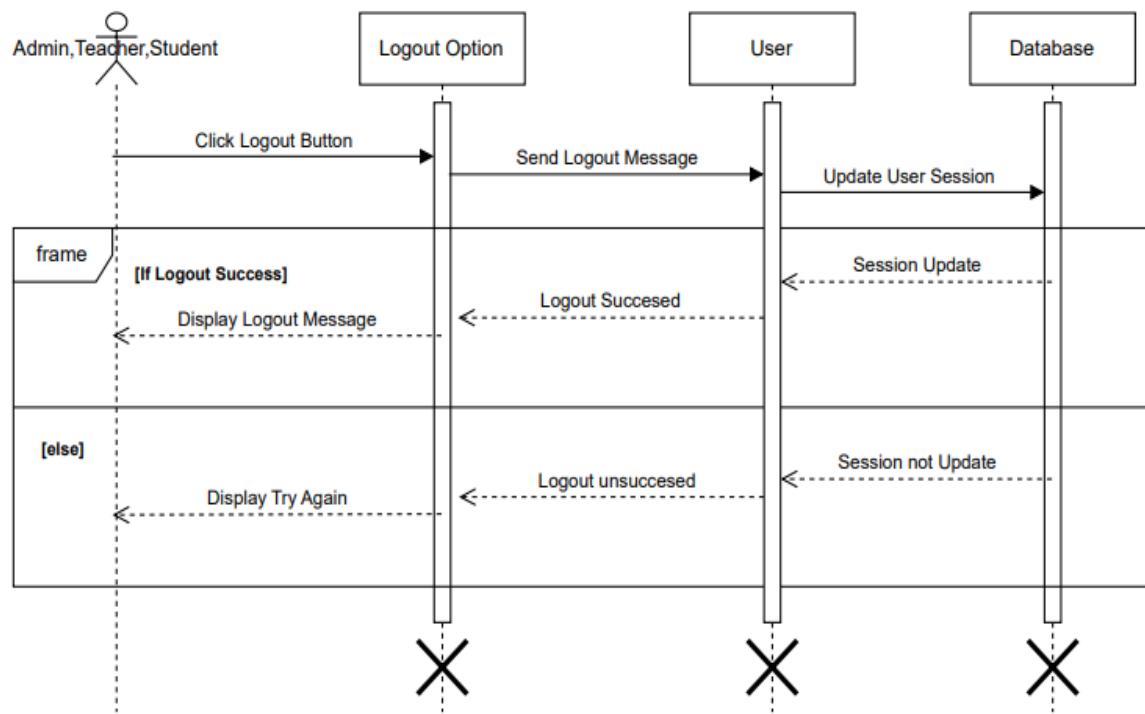
### Sequence Diagram - Admin/Teacher View Student's Attendance



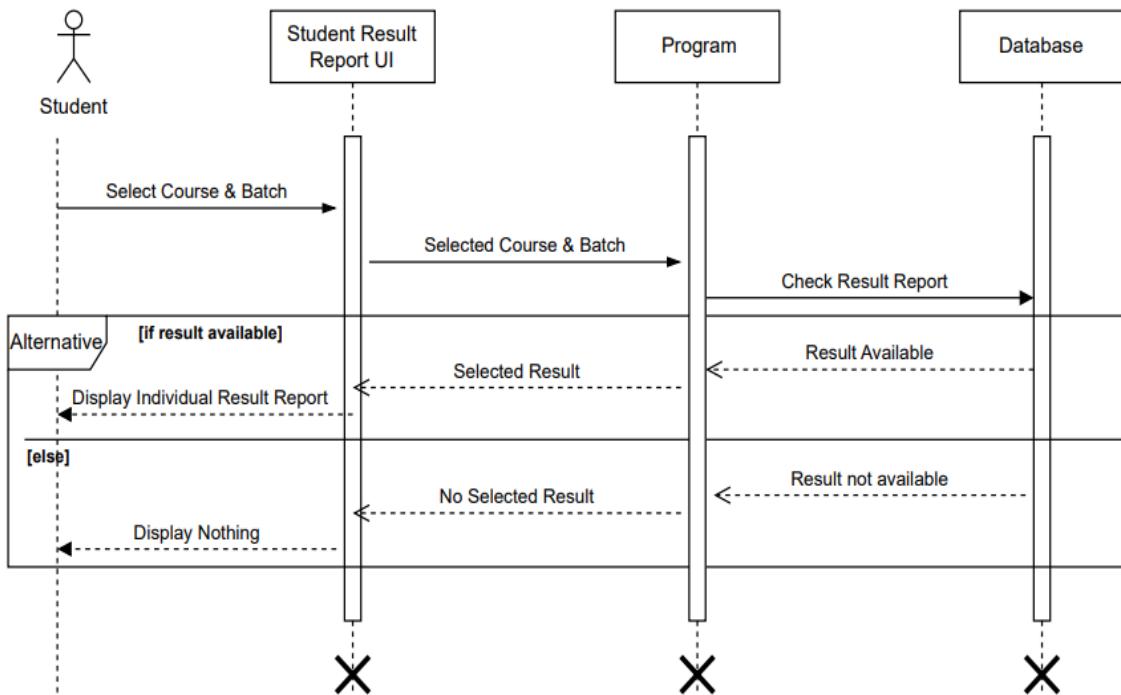
### Sequence Diagram - Admin/Teacher View Student's Results



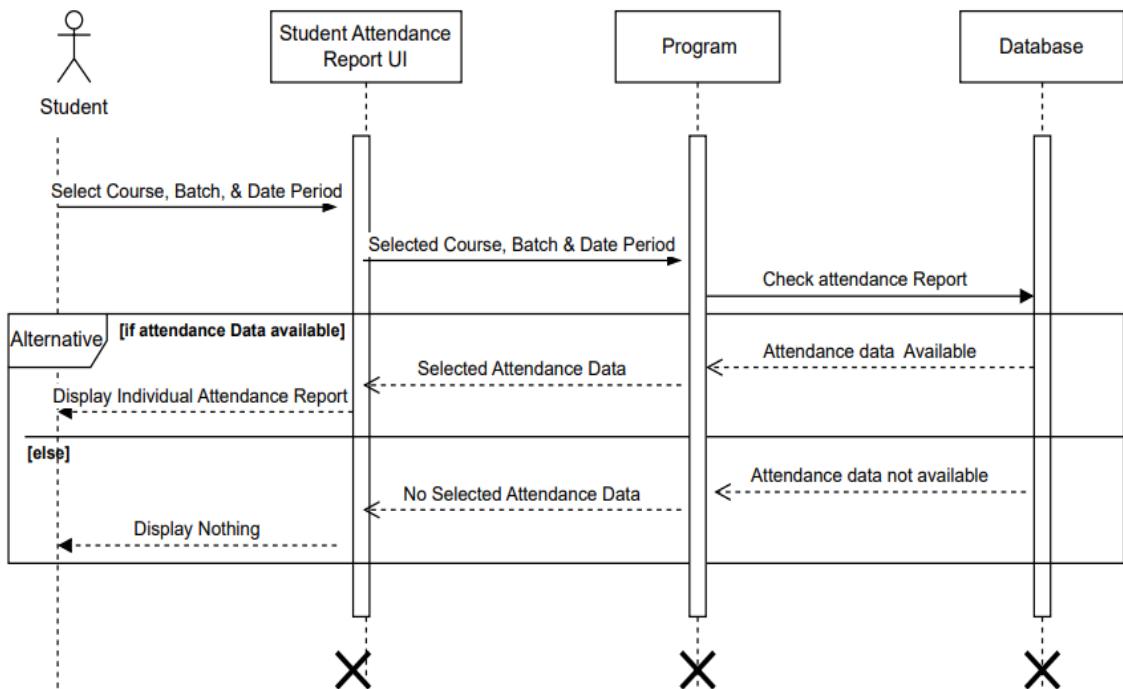
## Sequence Diagram - Admin/Teacher/Student Logout



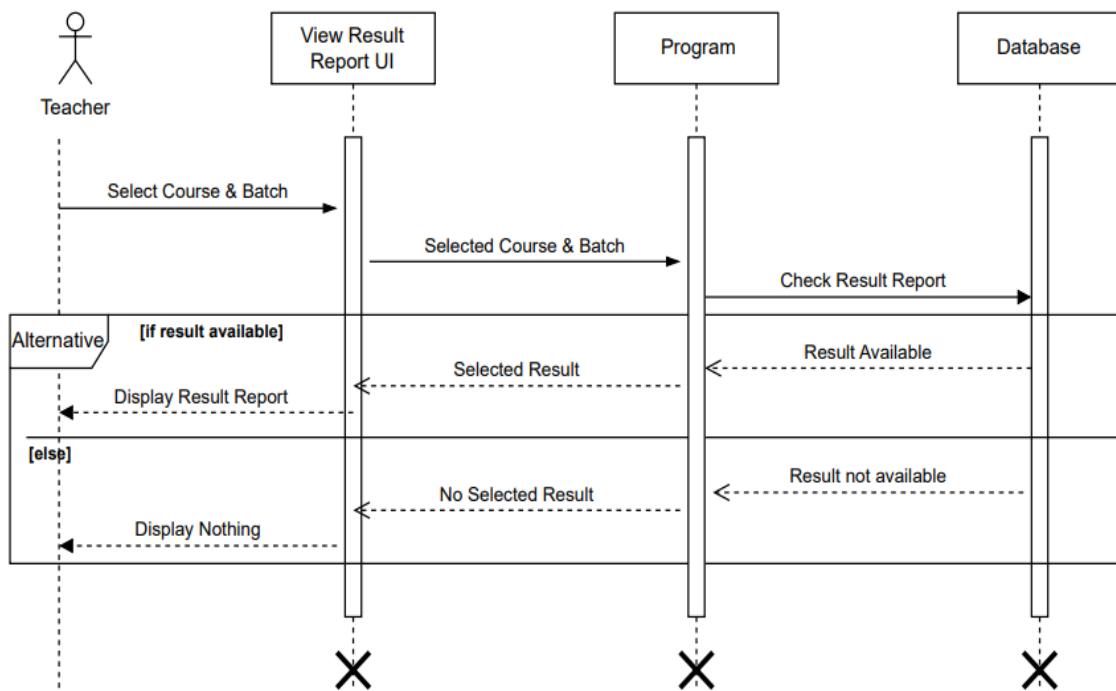
### Sequence Diagram - Student view individual Exam Result Report



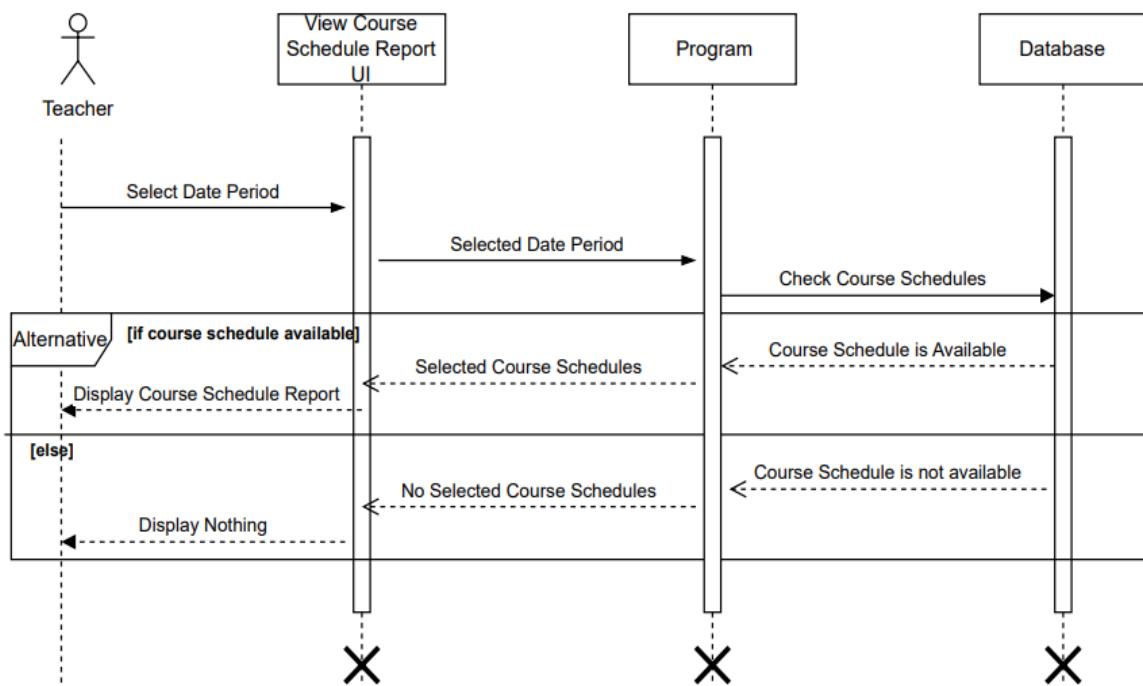
### Sequence Diagram - Student view individual attendance Report



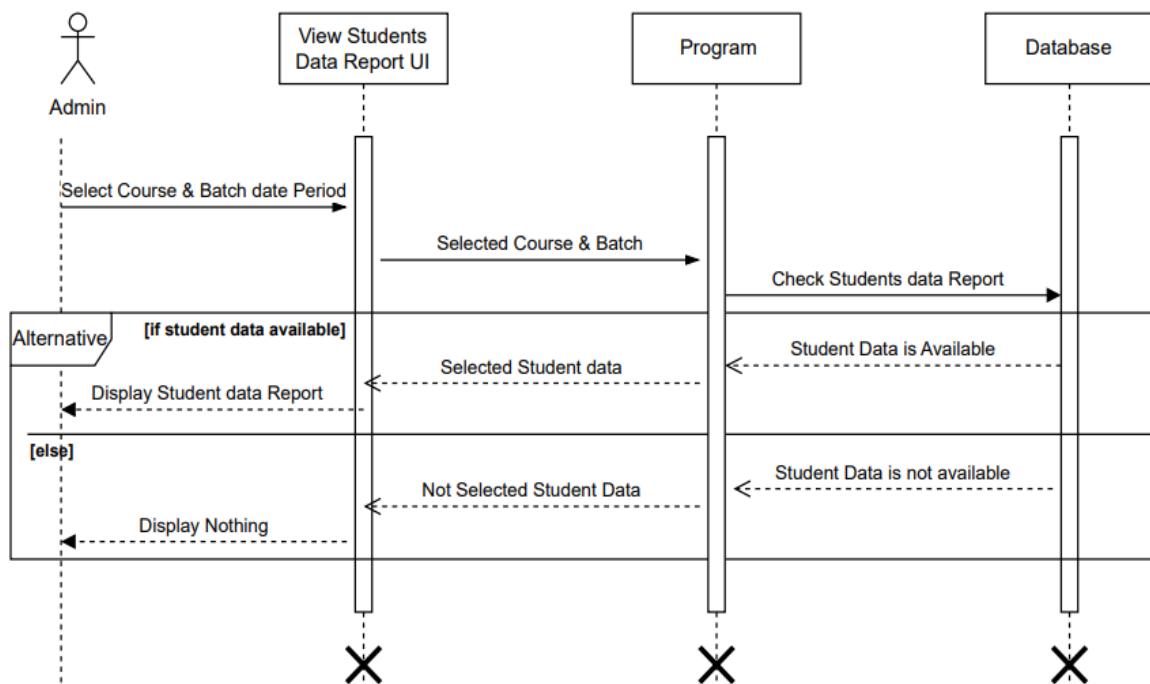
### Sequence Diagram - Teacher view Exam Result Report(Course/Batch)



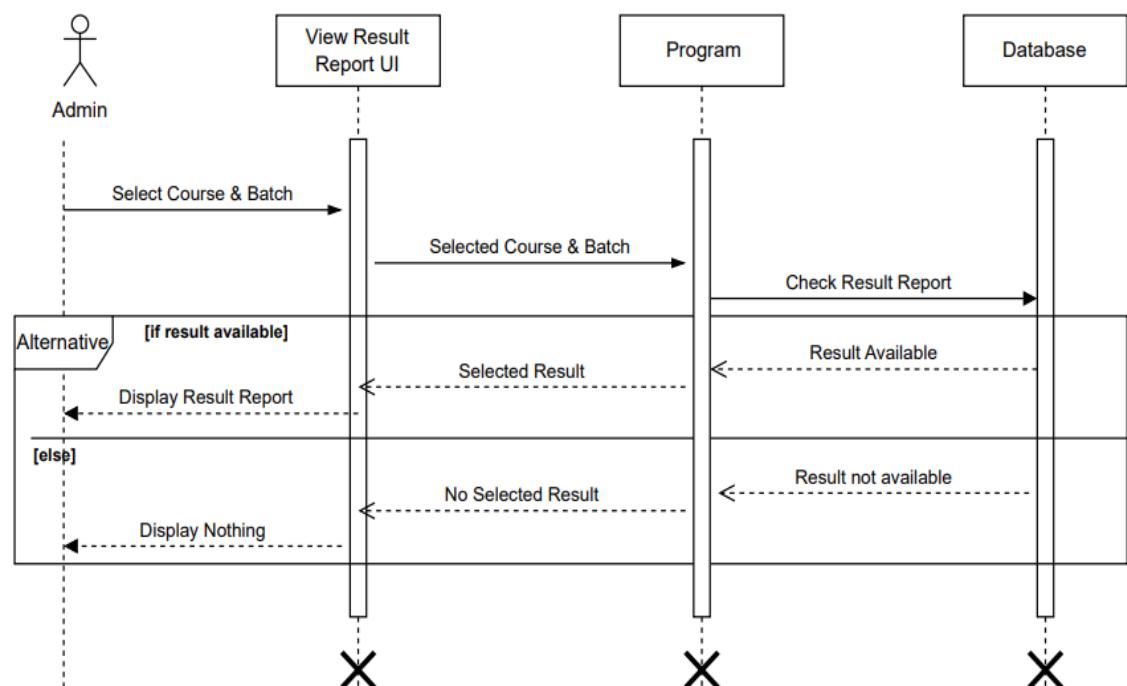
### Sequence Diagram - Teacher view teacher Schedule Report



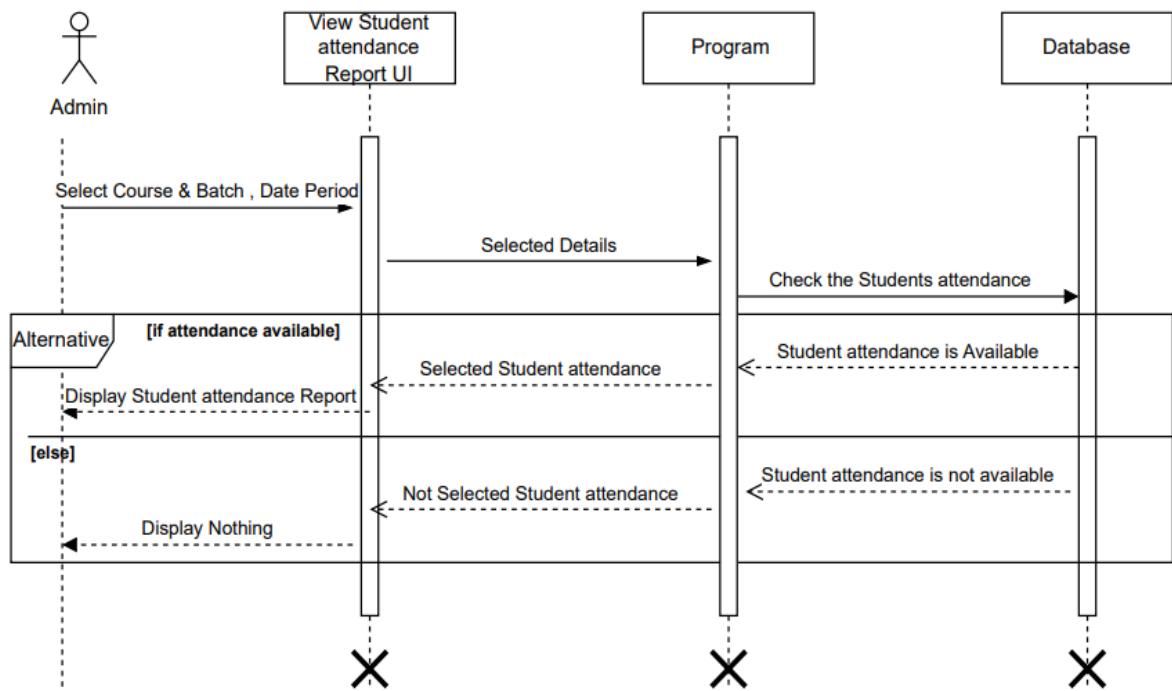
### Sequence Diagram - Admin View Student Data Report(Course/Batch)



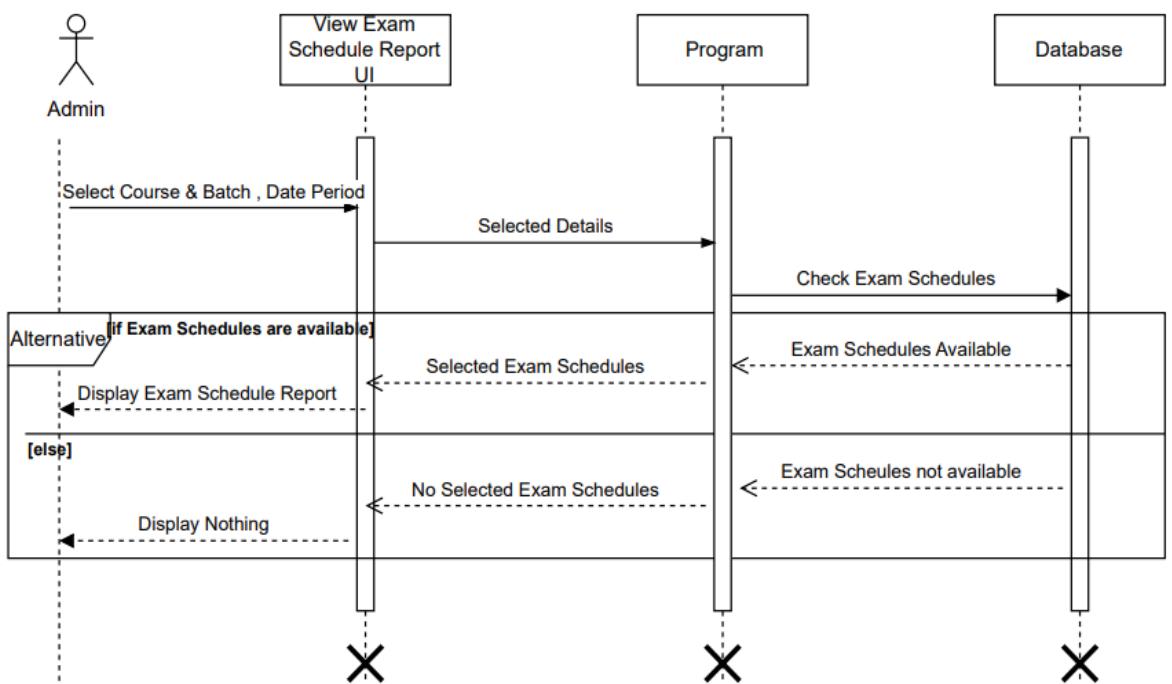
### Sequence Diagram - Admin view Exam Result Report(Course/Batch)



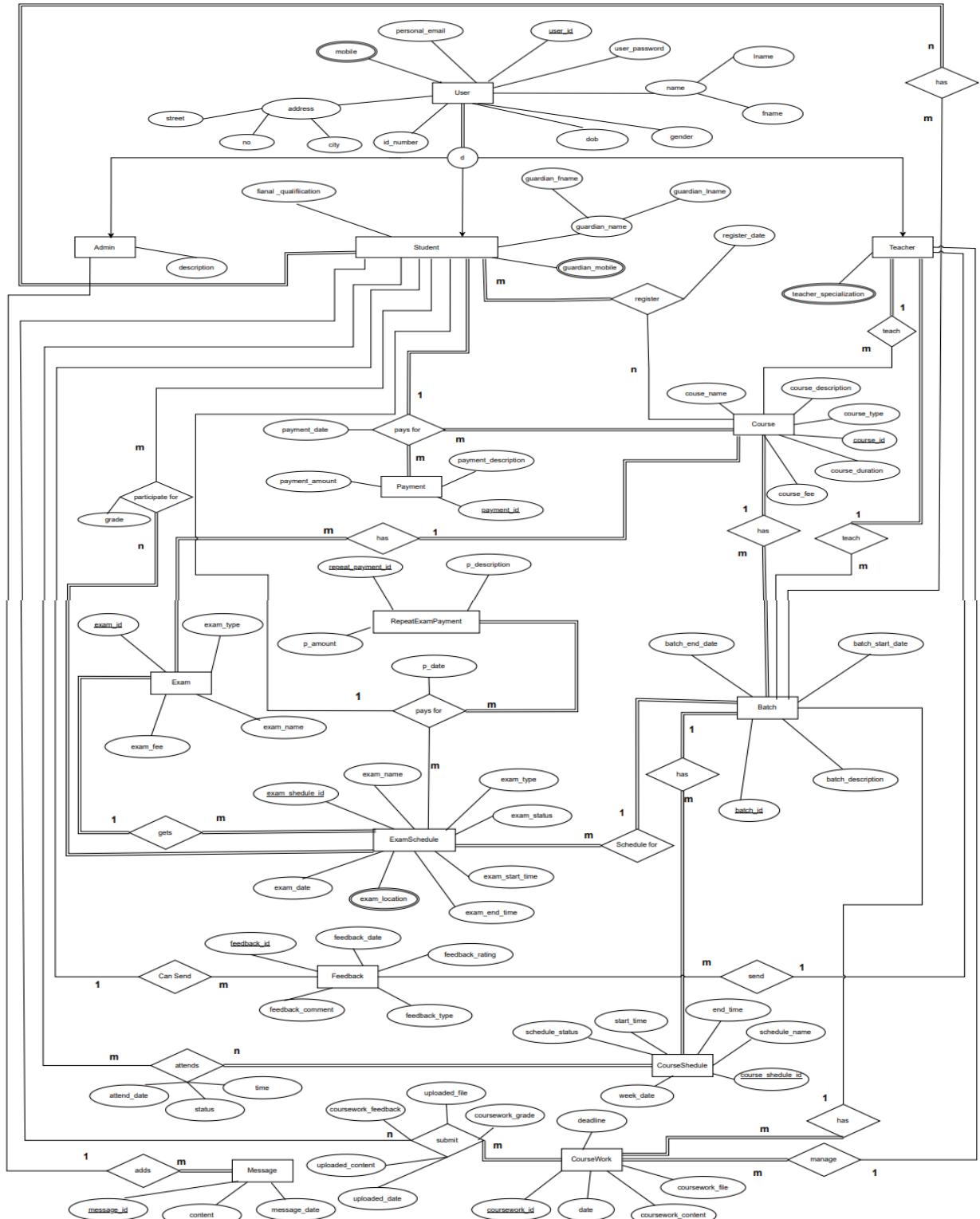
### Sequence Diagram - Admin View Student Attendance Report



### Sequence Diagram - Admin view Exam Schedule Report



### 3.3 Proposed System ER Diagram



### **3.4 Chapter Summary**

As described in the above chapter, Introduction about the analysis and the current system and the proposed system are analyzed with the help of diagrams.

In brief, UML stands for Unified Modelling Language. It is a standard visual language for describing modelling and documenting the components and structure of the software system. Under UML diagrams, several other main diagram types were used for our project.

They are.

- Class Diagrams
- Sequence Diagrams
- Use Case Diagrams
- ER Diagrams

By that diagrams represent the process of the system.

## **Chapter 04: Solution Design**

### **4.1 Introduction**

The design of the proposed solution can be seen in this chapter. That is, this chapter shows the interfaces of this system are designed in such a way that the individual can easily access them. Also, we have made sure to design these interfaces so that the user can easily understand them. Below you can see how these user interfaces were created using only the features found in a learning management system.

## 4.2 Interface Design

### No: 01 Interface

Name: Website Home Page

Description: This is the Home Page of the Website

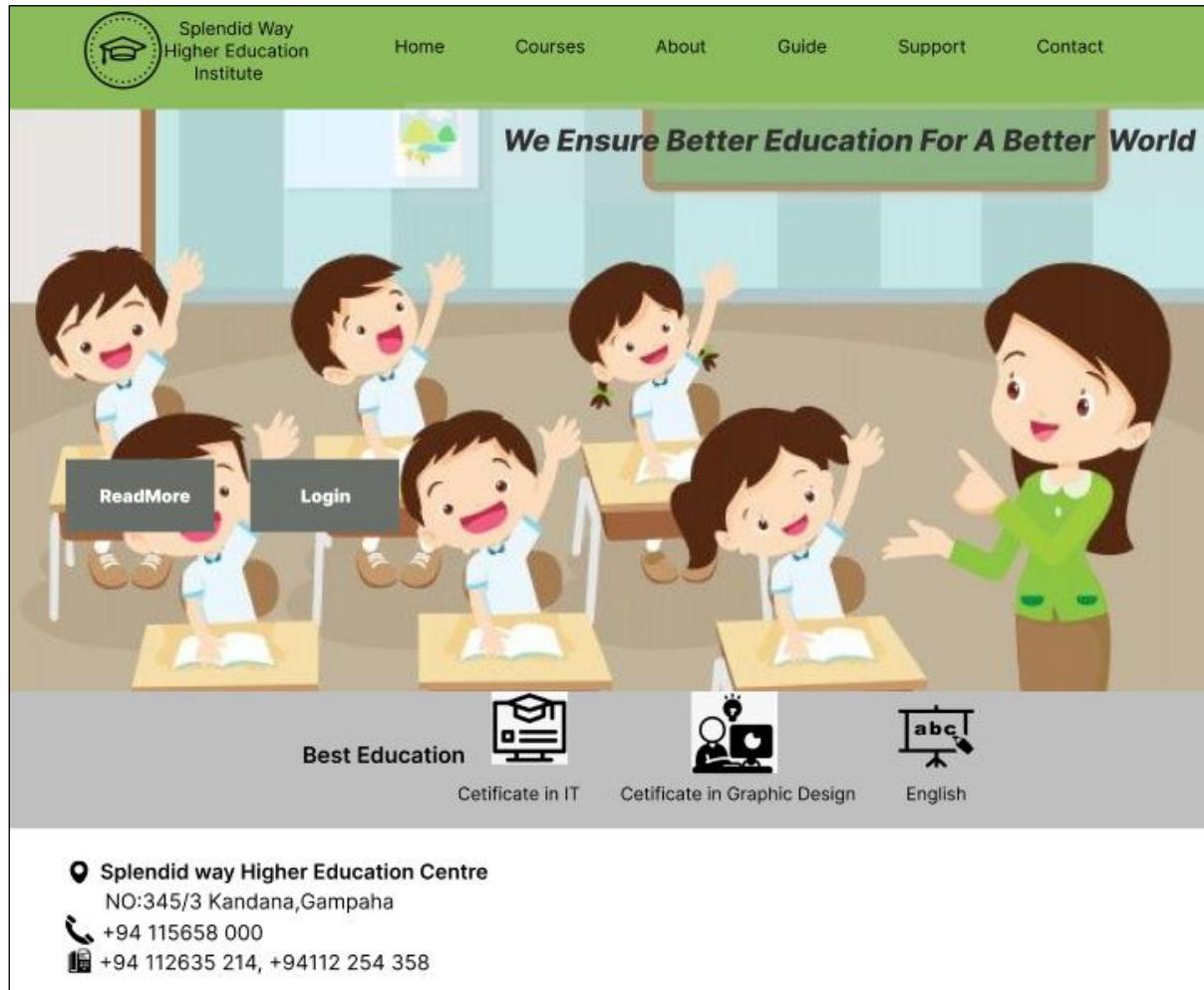


Figure 9 Website Home Page

## No: 02 Interface

Name: Student System Registration Form

Description: This is the Page that use to send the student details to admin

The screenshot shows a web-based registration form for a student system. The header features a logo of a graduation cap inside a circle, followed by the text "Splendid Way Higher Education Institute". Below the header, a navigation bar includes links for Home, Courses, About, Guide, Support, and Contact. The main content area is titled "Student Registration Form" and contains two sections: "Personal Details" and "Guardian Details".

**Personal Details**

First Name :	Supun	Last Name :	Perera
Date of Birth :	14/02/2003		
Address :	NO : 78	Street :	Colombo Road
Email :	supun@gmail.com	Identity Number :	9775489325
Mobile Number :	Personal : 0775489325	Home :	011-2768532
Final Qualification :	A/L	Gender :	Male

**Guardian Details**

First Name :	Malini	Last Name :	Perera
Mobile Number :	0775698742	Home :	0775647125

**Contact Information**

📍 Splendid way Higher Education Centre  
NO:345/3 Kandana,Gampaha  
📞 +94 115658 000  
📠 +94 112635 214, +94112 254 358

**Buttons**

Register

Figure 10 Student System Registration Form

### No: 03 Interface

Name: Login Page

Description: This is the login page for Students, Teachers, and Admins.

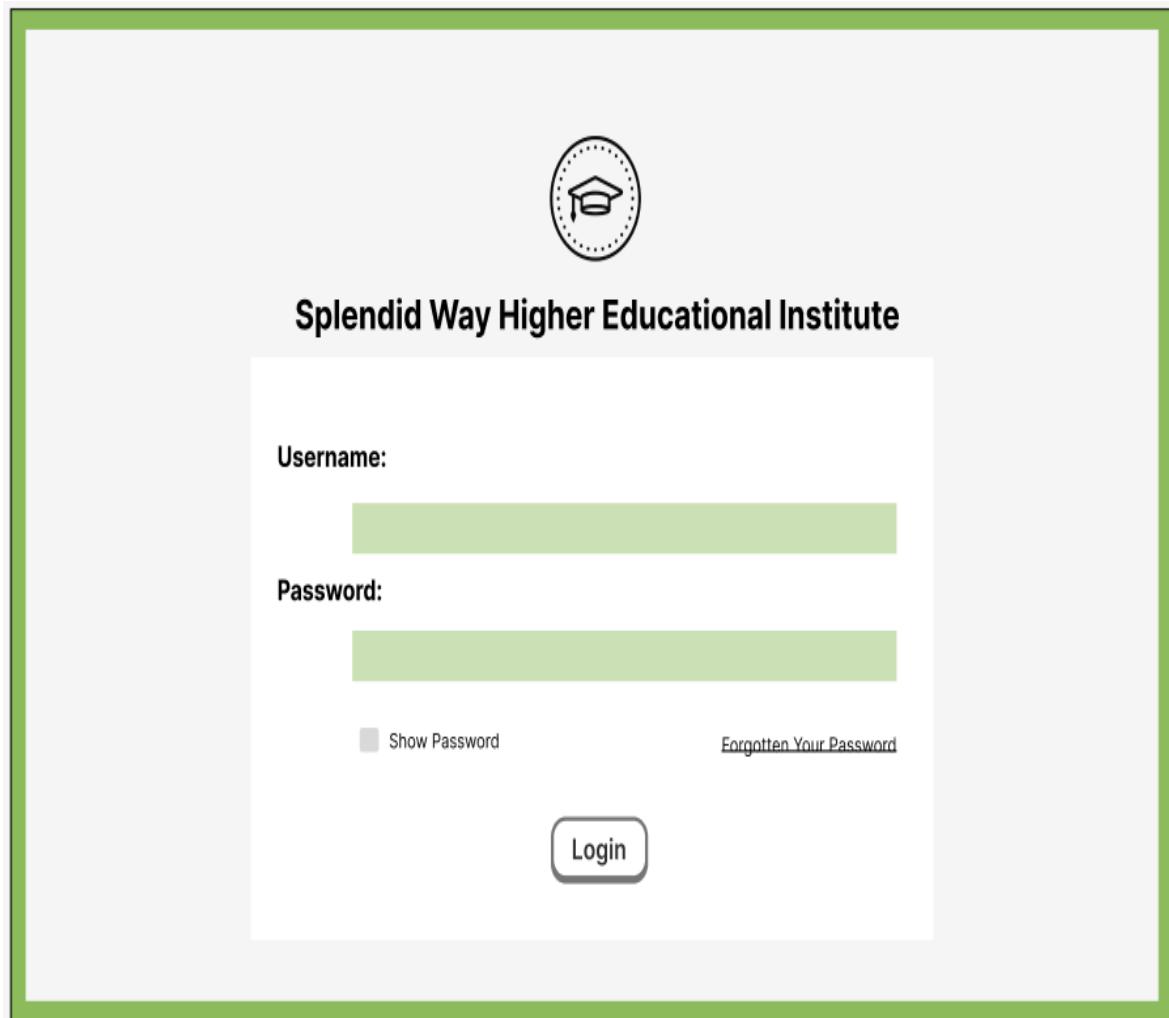


Figure 11 Login Page

## No: 04 Interface

Name: Forgotten Password – Page 01

Description: This is the Forgotten password Page for Change password if user forgot password

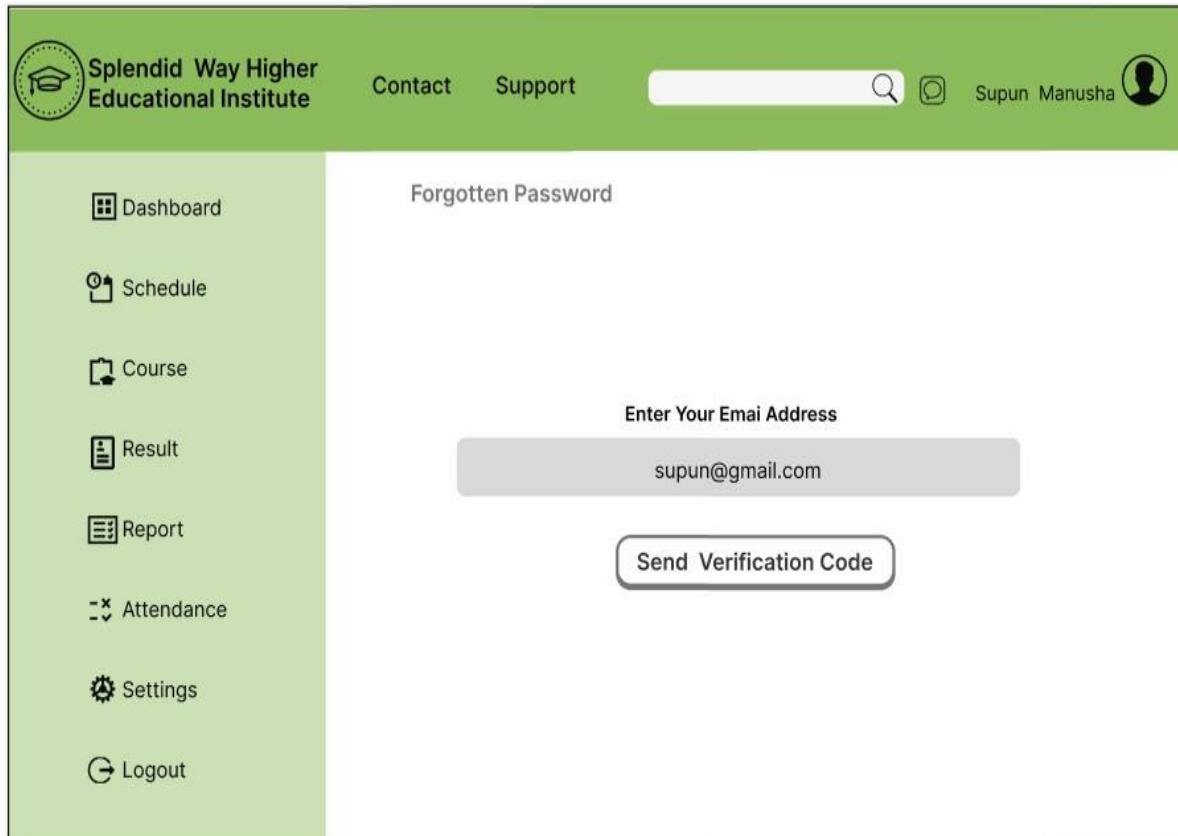


Figure 12 Forgotten Password – Page 01

## No: 05 Interface

Name: Forgotten Password - Page 02

Description: This is the Forgotten password Page for Change password if user forgot password

The screenshot shows a web interface for password recovery. At the top, there is a green header bar with the logo of 'Splendid Way Higher Educational Institute', navigation links for 'Contact' and 'Support', a search bar, and a user profile for 'Supun Manusha'. The main content area has a light gray background. On the left, a sidebar menu lists several options: 'Dashboard', 'Schedule', 'Course', 'Result', 'Report', 'Attendance', 'Settings', and 'Logout'. The main panel is titled 'Forgotten Password' and contains a form for entering a verification code. Below that, there is a section for creating a new password, which includes fields for 'Create New Password' (with a placeholder '\*\*\*\*\*' and a note 'At least 8 Characters') and 'Confirm Password'. A 'Reset Password' button is located at the bottom right of this section.

Figure 13 Forgotten Password – Page 02

## No: 06 Interface

Name: Change Password Page

Description: This is the Change Password Page for User.

The screenshot shows the 'Change Password' page of the 'Splendid Way Higher Educational Institute' website. The page has a green header bar with the institute's logo and name. On the right side of the header, there are links for 'Contact', 'Support', a search bar, and a user profile for 'Supun Manusha'. A dropdown menu icon is also present. The main content area is titled 'Dashboard/Profile/Change Password' and shows the user profile 'Supun Manusha'. It contains fields for 'Enter Current Password' (with an eye icon), 'Create a New, Strong Password' (with an eye icon), and 'Confirm Password' (with an eye icon). A 'Next' button is located below the first password field, and a 'Change Password' button is at the bottom right. A green sidebar on the left lists navigation options: Dashboard, Schedule, Course, Result, Report, Attendance, Settings, and Logout.

Figure 14 Change Password Page

## No: 07 Interface

Name: Student Dashboard

Description: This is the Dashboard for Students.

The screenshot shows the Student Dashboard of the Splendid Way Higher Educational Institute. The interface is divided into several sections:

- Header:** Features the institute's logo (a graduation cap icon), name "Splendid Way Higher Educational Institute", and navigation links for "Contact" and "Support". It also includes a search bar, a profile icon for "Supun Manusha", and a user status message.
- Sidebar (Left):** A vertical menu with icons and text for "Dashboard" (highlighted in green), "Schedule", "Course", "Result", "Report", "Attendance", "Settings", and "Logout".
- Main Content Area:** Contains a "GOOD MORNING!" greeting with a sun icon and motivational text: "Work Hard!", "Dream Big!", and "Never Give Up!". Below this are two certificates:
  - A yellow box for "Certificate In IT CITF1-23.1".
  - An orange box for "Certificate In Graphic Desining CGDF1-23.1".
- Right Side:** A "Messages" box showing a recent notification from "01/07/2023" stating "Institute has been closed" with a "More" button. Below it is a "Calender" section for "January 2021" with a grid of dates from 1 to 31. At the bottom right is a button labeled "Apply For Repeat Exam".

Figure 15 Student Dashboard

## No: 08 Interface

Name: Student View Course Schedule Page

Description: This is the View Course Schedule Page for Students.

The screenshot shows a web application interface for students. The header features a logo of a graduation cap inside a circle, followed by the text "Splendid Way Higher Educational Institute". To the right are links for "Contact" and "Support", a search bar with a magnifying glass icon, and a user profile for "Supun Manusha" with a profile picture. The left sidebar contains navigation links: "Dashboard", "Schedule" (which is highlighted in green), "Course", "Exam", "Result", "Report", "Attendance", "Settings", and "Logout". The main content area is titled "Dashboard/Schedule/Course". It displays course information: "Course: Certificate In IT", "Batch: CITF1-23.1", and date range "From: 01/06/2023" to "To: 30/06/2023". A "View" button is located next to the date range. Below this is a table showing course details:

Batch	Start Time	End Time	Date	Status
CITF1-23.1	10:00	12:00	01/06/2023	
CITF1-23.1	10:00	12:00	08/06/2023	Canceled

Figure 16 Student View Course Schedule Page

## No: 09 Interface

Name: Student View Exam Schedule Page

Description: This is the View Exam Schedule Page for Students.

The screenshot shows a web application interface for students. At the top, there is a green header bar with the logo of 'Splendid Way Higher Educational Institute' (featuring a graduation cap icon), followed by 'Contact', 'Support', a search bar, and a user profile for 'Supun Manusha'. On the left side, there is a sidebar with the following menu items: 'Dashboard' (with a bar chart icon), 'Schedule' (highlighted in green with a calendar icon), 'Course' (with a book icon), 'Exam' (with a document icon), 'Result' (with a bar chart icon), 'Report' (with a document icon), 'Attendance' (with a person icon), 'Settings' (with a gear icon), and 'Logout' (with a circular arrow icon). The main content area has a title 'Dashboard/Schedule/Exam'. Below it, there are two dropdown menus: 'Course: Certificate In IT' and 'Batch: CITF1-23.1'. To the right of the batch dropdown is a 'View' button. Below these dropdowns is a table showing exam schedules:

Exam Schedule	Name	Type	Date	Start Time	End Time	Location	Exam Status
CITF1-MID 23.1	IT-MID Exam	MID	6/8/2023	10:00	12:00	Hall1	
CITF-FINAL 23.1	IT-FINAL Exam	FINAL	6/10/2023	10:00	12:00	Hall1	Canceled

Figure 17 Student View Exam Schedule Page

## No: 10 Interface

Name: Student View Exam Results Page

Description: This is the View Exam Results Page for Students.

The screenshot shows a web application interface for a student. The header features a logo of a graduation cap inside a circle, followed by the text "Splendid Way Higher Educational Institute". To the right are links for "Contact" and "Support", a search bar with a magnifying glass icon, and a user profile for "Supun Manusha" with a small profile picture. The left sidebar contains navigation links: "Dashboard", "Schedule", "Course", "Result" (which is highlighted in green), "Report", "Attendance", "Settings", and "Logout". The main content area has a title "Dashboard/Result". It displays the student's ID "Student ID: SW-S000002" and course information "Course: Certificate In IT" with a "View" button. Below that is batch information "Batch: CITF1-23.1" with another "View" button. A table lists exam details:

Exam Code	Exam Name	Grade
CITF1-MID 23.1	IT-MID Exam	A
CITF-FINAL 23.1	IT-FINAL Exam	B

Figure 18 Student View Exam results Page

## No: 11 Interface

Name: Apply for Repeat Exam - Page 01

Description: This is for Applying Repeat Exam

The screenshot shows a web application interface for the 'Splendid Way Higher Educational Institute'. The top navigation bar is green and includes the institution's logo, name, and links for 'Contact' and 'Support', along with a search bar and a user profile for 'Supun Manusha'.

The left sidebar, also in green, contains a vertical menu with icons and labels: 'Dashboard', 'Schedule', 'Course', 'Result', 'Report', 'Attendance', 'Settings', and 'Logout'.

The main content area has a white background. It displays the title 'Dashboard/Apply Repeat Exam' and a search bar labeled 'Search:'. Below this, there is a table listing exam details:

Exam Code	Exam Name	Date	Start Time	End Time	Action
CITF1-RMID 23.1	IT-MID Exam	08/10/2023	09:00	12:00	<b>Apply</b>
CITF-RFINAL 23.1	IT-FINAL Exam	15/10/2023	09:00	12:00	<b>Apply</b>

Figure 19 Apply for Repeat Exam-Page 01

## No: 12 Interface

Name: Apply for Repeat Exam - Page 02

Description: This is for Applying Repeat Exam

The screenshot shows a web application interface for applying for a repeat exam. At the top, there is a green header bar with the logo of 'Splendid Way Higher Educational Institute', navigation links for 'Contact' and 'Support', a search bar, and a user profile for 'Supun Manusha'. The main content area has two columns. The left column contains a sidebar with icons and labels for 'Dashboard', 'Schedule', 'Course', 'Result', 'Report', 'Attendance', 'Settings', and 'Logout'. The right column displays the 'Dashboard/Apply Repeat Exam' page. It shows 'Payment Details' with the following information:

<b>Exam Code</b>	:	CITF1-RMID 23.1
<b>Exam Name</b>	:	IT-MID Exam
<b>Index No</b>	:	SW-S000002
<b>Full Name</b>	:	Supun Manusha
<b>Email</b>	:	supun@gmail.com
<b>Mobile Num</b>	:	0775412693
<b>Amount</b>	:	800.00

At the bottom right of the payment details section are two buttons: 'Apply' and 'Cancel'.

Figure 20 Apply for Repeat Exam-Page 02

## No: 13 Interface

Name: Repeat Exam Payment – Page 01

Description: This is the Repeat Exam Payment Results Page for Students.

The screenshot shows a web-based payment interface for repeat exam payments. At the top, there is a green header bar with the logo of 'Splendid Way Higher Educational Institute' on the left, and 'Contact', 'Support', a search bar, and a user profile for 'Supun Manusha' on the right. Below the header, the main content area has a light blue background. On the left, a sidebar menu lists several options: Dashboard, Schedule, Course, Result, Report, Attendance, Settings, and Logout. The main content area is titled 'Dashboard/Apply Repeat Exam/Payment Details'. It features a section to 'Select your card type' with buttons for Visa and Mastercard. Below this is a large form for 'Payment Details'. The form includes fields for 'Card Type' (radio buttons for Visa and Mastercard), 'Card Number' (input field), 'Expiration Month' (dropdown), 'Expiration Year' (dropdown), and 'CVN' (input field). A note states: 'This code is a three or four digit number printed on the back or front of credit cards.' At the bottom of the form are 'Cancel' and 'Pay' buttons. To the right of the main form, there is a smaller box labeled 'Your Order' showing a total amount of '800.00 Rs'.

Figure 21 Repeat Exam Payment – Page 01

## No: 14 Interface

Name: Repeat Exam Payment – Page 02

Description: This is the Repeat Exam Payment Results Page for Students.

Splendid Way Higher Educational Institute

Contact Support

Dashboard/Apply Repeat Exam/Payment Authentication

BANK OF CEYLON  
BOC  
Bankers to the Nation

VISA

Purchase Authentication

We have sent a text message with OTP code to your registered mobile number ending with XXXXXXXX4217 and for the transaction performed on 4605 XXXX XXXX 3324. You are paying merchant Mobitel New the amount of LKR 10.00 on Sat Jun 24 09:38:57 IST 2023.

Enter your code below:

CONFIRM

RESEND CANCEL

✓ Payment Successful

The page will automatically timeout after 7 minutes.

Download Receipt

Figure 22 Repeat Exam Payment – Page 02

## No: 15 Interface

Name: Student View Course Page 1

Description: This is the View Course Page for Students.

The screenshot shows a web-based student dashboard. At the top, there is a green header bar with the logo of "Splendid Way Higher Educational Institute", navigation links for "Contact" and "Support", a search bar, and a user profile for "Supun Manusha". The main content area has a light gray background. On the left, a sidebar menu lists various options: "Dashboard", "Schedule >" (which is highlighted in green), "Course" (highlighted in green), "Exam", "Result", "Report", "Attendance", "Settings", and "Logout". The "Schedule" item has a sub-menu icon with a right arrow. The "Course" and "Exam" items are also highlighted in green. The main content area displays two sections. The first section, titled "Dashboard/Course", features a large icon of a computer monitor with a checkmark on its screen. Below this icon, the text "Certificate in IT" and "CITF1-23.1" is displayed. The second section, titled "Certificates", shows four smaller icons arranged in a 2x2 grid: a mountain, a cloud, a sun, and a flower. Below this grid, the text "Certificate in Graphic Design" and "CGDF1-23.1" is displayed.

Figure 23 Student View course Page 1

## No: 16 Interface

Name: Student view Course Page 2

Description: This is the Course Page for Students.

The screenshot shows the student course page for the IT C1TF1-23.1 program at Splendid Way Higher Educational Institute. The left sidebar contains links for Dashboard, Schedule, Course (which is highlighted), Result, Report, Attendance, Settings, and Logout. The main content area displays the course title, course notes (Note 1, Note 2, Note 3), past papers (Past Paper 1, Past Paper 2, Past Paper 3), course work (CW1-Exel, CW2-Exel, CW3-Exel), and a feedback section with a 'Tap Here' button.

Splendid Way Higher Educational Institute

Contact Support

Supun Manusha

Dashboard/Course/Certificate in IT C1TF1-23.1

Course Note:

Note 1 Note 2 Note 3

Past Paper:

Past Paper 1 Past Paper 2 Past Paper 3

Course Work:

CW1-Exel CW2-Exel CW3-Exel

Feedback

You Can Send the course related Feedback to us

Tap Here

Figure 24 Student view Course Page 2

## No: 17 Interface

Name: Coursework Page

Description: This is the Course Work Page for Students.

The screenshot shows a web-based course management system. At the top, there is a green header bar with the logo of "Splendid Way Higher Educational Institute". On the right side of the header, there are links for "Contact", "Support", a search bar, and a user profile for "Supun Manusha". Below the header, the main content area has a light gray background. On the left, there is a sidebar with several menu items: "Dashboard", "Schedule", "Course" (which is highlighted with a green background), "Result", "Report", "Attendance", "Settings", and "Logout". The main content area displays the following information:

Dashboard/Course/Certificate in IT CITF1-23.1/Course Work/CW1-Exel

**CW1-Exel**

Course Work File :  CW1-Exel

Course Work Content : Null

Your File:  Drag Here

Your Answer:  Type Here

At the bottom right of the main content area, there are two buttons: "Submit" and "Cancel".

Figure 25 Coursework Page

## No: 18 Interface

Name: Course Work Submission Page

Description: This is the Course Work Submission Page for Students.

The screenshot shows a web-based application interface for students. At the top, there is a green header bar with the logo of "Splendid Way Higher Educational Institute". The header also includes links for "Contact", "Support", a search bar, and a user profile for "Supun Manusha". The main content area has a light gray background. On the left side, there is a sidebar with the following menu items: Dashboard, Schedule, Course (which is highlighted with a green background), Result, Report, Attendance, Settings, and Logout. The main content area displays the following information:

Dashboard/Course/Certificate in IT CITF1-23.1/Course Work/CW1-Exel

**Course Work Submission Status**

**CW1-Exel**

Submitted

Remove

<b>Submitted Date:</b>	10/05/2023
<b>Course Work Grade :</b>	Not yet
<b>Teacher's Feedback:</b>	Not yet

Figure 26 Course Work Submission Page

## No: 19 Interface

Name: Student View Attendance Page

Description: This is the View Attendance Page for Students

The screenshot shows a web-based student interface for viewing attendance. At the top, there is a green header bar with the institute's logo and name "Splendid Way Higher Educational Institute". On the right side of the header are links for "Contact", "Support", a search bar, and a user profile for "Supun Manusha". Below the header is a sidebar on the left containing icons and labels for "Dashboard", "Schedule", "Course", "Result", "Report", "Attendance" (which is highlighted with a green background), "Settings", and "Logout". The main content area on the right displays "Dashboard/Attendance" information: "Student ID: SW-S000002", "Course: Certificate In IT", "Batch: CITE1-231", and date range "From: 01/06/2023" to "To: 30/06/2023". A "View" button is located next to the date range. Below this, a table lists attendance status for specific dates:

Date	Status
01/06/2023	P
08/06/2023	A
15/06/2023	C

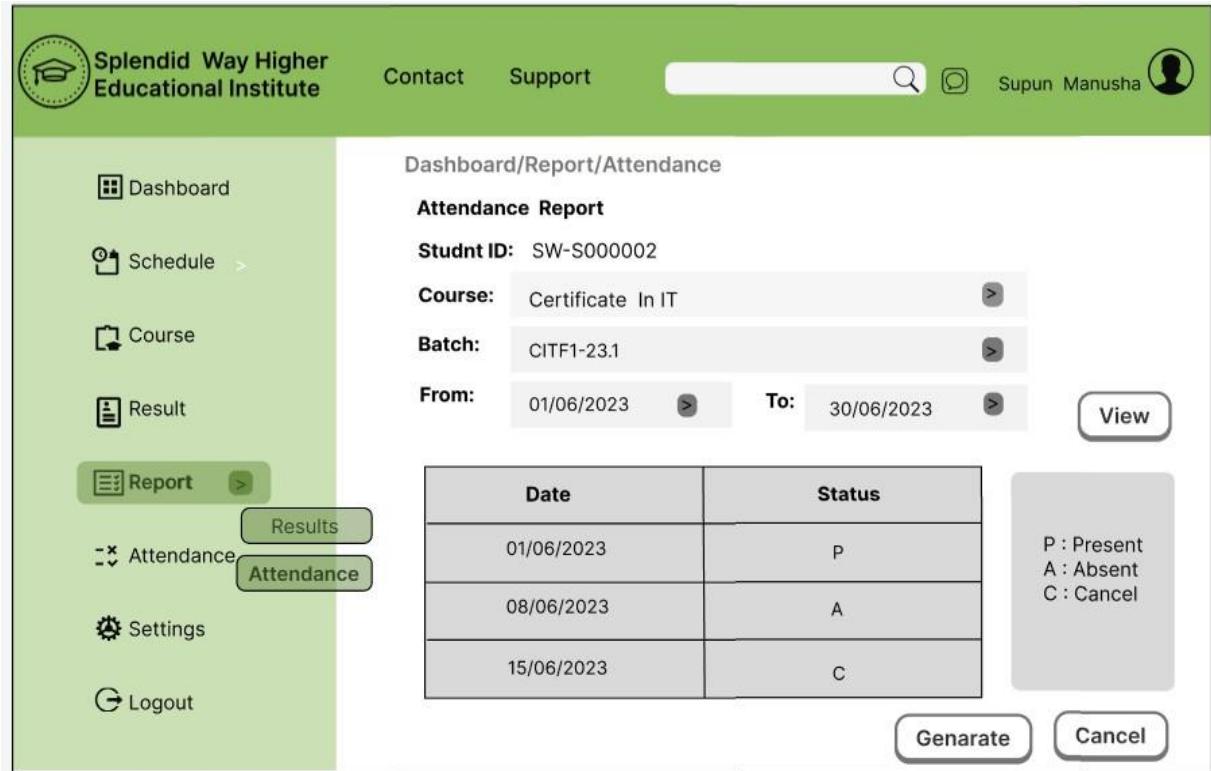
To the right of the table is a legend: "P : Present", "A : Absent", and "C : Cancel".

Figure 27 Student View Attendance Page

## No: 20 Interface

Name: Attendance Report Page

Description: This is the Attendance Report for Students



The screenshot shows a web-based application interface for 'Splendid Way Higher Educational Institute'. The top navigation bar includes the institute logo, 'Contact', 'Support', a search bar, and a user profile for 'Supun Manusha'. The left sidebar contains links for 'Dashboard', 'Schedule', 'Course', 'Result', 'Report' (which is currently selected), 'Attendance' (with 'Results' and 'Attendance' sub-options), 'Settings', and 'Logout'. The main content area displays the 'Attendance Report' for student 'SW-S000002' in the 'Certificate In IT' course, batch 'CITF1-23.1', from '01/06/2023' to '30/06/2023'. A 'View' button is present. Below this, a table shows attendance status for three dates: 01/06/2023 (P), 08/06/2023 (A), and 15/06/2023 (C). A legend on the right defines 'P : Present', 'A : Absent', and 'C : Cancel'. Buttons for 'Generate' and 'Cancel' are at the bottom of the report section.

Date	Status
01/06/2023	P
08/06/2023	A
15/06/2023	C

P : Present  
A : Absent  
C : Cancel

Figure 28 Attendance Report Page

## No: 21 Interface

Name: Results Report Page

Description: This is the Result Report Page for Students

The screenshot shows a web application interface for a higher educational institute. The header features a logo for "Splendid Way Higher Educational Institute", navigation links for "Contact" and "Support", a search bar, and a user profile for "Supun Manusha". The main content area is titled "Dashboard/Report/Results" and "Results Report". It displays student information: "Student ID: SW-S000002" and "Course: Certificate In IT". Below this, there is a "Batch" dropdown set to "CITF1-23.1" with a "View" button. A table lists exam details:

Exam Code	Exam Name	Grade
CITF1-MID 23.1	IT-MID Exam	A
CITF-FINAL 23.1	IT-FINAL Exam	B

At the bottom right are "Generate" and "Cancel" buttons. On the left sidebar, there are links for "Dashboard", "Schedule", "Course", "Result", "Report" (which is highlighted), "Attendance" (with "Results" and "Attendance" sub-links), "Settings", and "Logout".

Figure 29 Results Report Page

## No: 22 Interface

Name: Send Feedback Page

Description: This is the Feedback Page Access for User.

The screenshot shows a web application interface for sending feedback. On the left, there is a sidebar with a logo of a graduation cap inside a circle and the text "Splendid Way Higher Educational Institute". Below the logo are several menu items: Dashboard, Schedule, Course (which is highlighted in green), Result, Report, Attendance, Settings, and Logout. The main content area has a header "Dashboard/Course/Certificate in IT CITF1-23.1/Feedback". It contains a dropdown menu for "Feedback Type" with options: Course, Institute, and Other. Below that, there is a rating section with a "Rate" field showing five stars and a "Comment" field with a placeholder "Type Here". At the bottom right are "Submit" and "Cancel" buttons.

Figure 30 Send Feedback Page

## No: 23 Interface

Name: View Profile Page

Description: This is the View Profile Page for Students

The screenshot shows a web application interface for a student profile. The header features a logo for "Splendid Way Higher Educational Institute" and navigation links for "Contact" and "Support". A search bar and user information ("Supun Manusha") are also present. On the left, a sidebar contains links for "Dashboard", "Schedule", "Course", "Result", "Report", "Attendance", "Settings", and "Logout". The main content area is titled "Dashboard/Profile/View Profile" and displays "Personal Details" for the user. The details include: First Name: Supun, Last Name: Manush, Gender: Male, Date Of Birth: 10/12/2001, Address: No: 313/ A Street: Katana City: Negombo, Email: supunmanusha@gmail.com, Mobile Number: 0772324465, and Final Educational Qualification: A/L. Below this, "Guardian Parent Details" are shown: First Name: Sumudu, Last Name: Kumari, and Guardian/Parent Mobile: 071908765. A green button in the top right corner offers options to "Change Password", "View Profile", and "Logout".

Figure 31 View Profile Page

## No: 24 Interface

Name: Teacher Dashboard

Description: This is the Dashboard for Teacher.

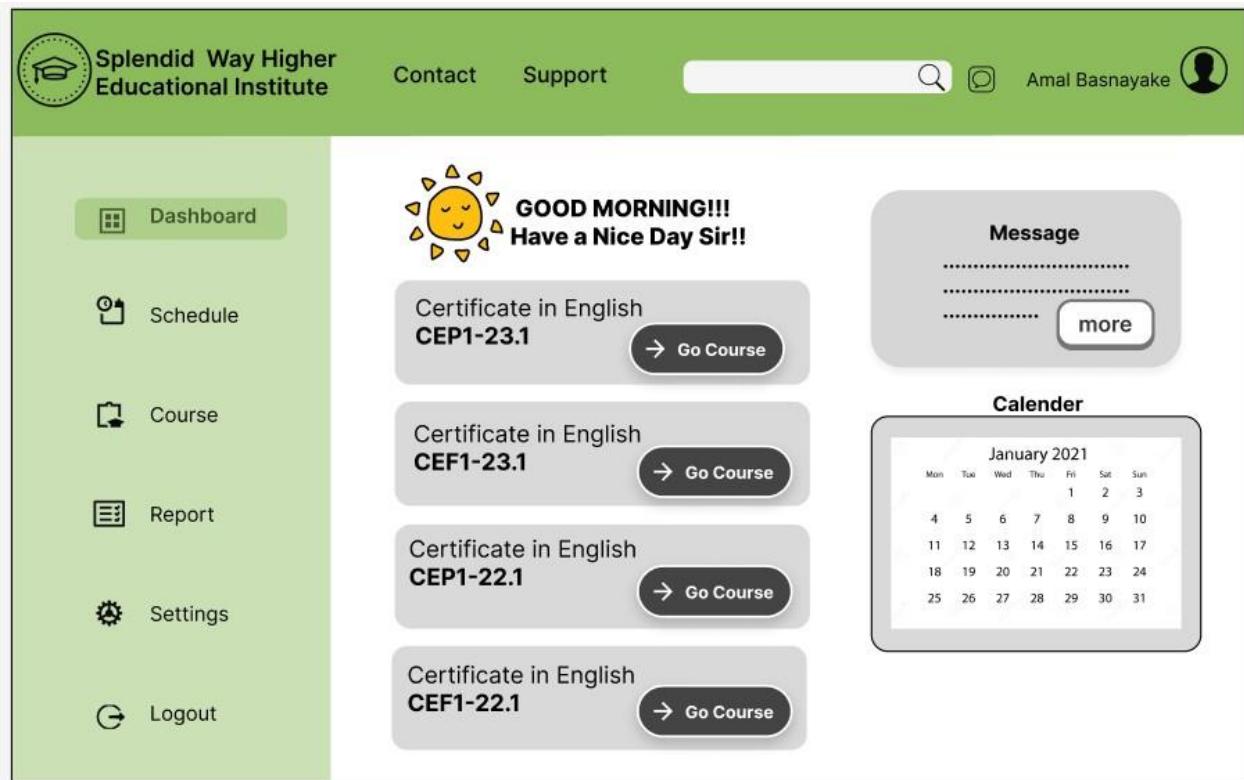


Figure 32 Teacher Dashboard

## No: 25 Interface

Name: Teacher View Course Schedule Page

Description: This is the Course Schedule for Teacher.

The screenshot shows a web interface for a teacher to view course schedules. At the top, there is a navigation bar with the logo of "Splendid Way Higher Educational Institute", contact and support links, a search bar, and a user profile for "Amal Basnayake". On the left, a sidebar menu includes "Dashboard", "Schedule >" (which is currently selected), "Course" (highlighted in green), and "Exam". Other options like "Report" and "Settings" are also listed. Below the sidebar, the main content area displays the "Dashboard/Schedule/Course" section. It shows the "Course: Certificate In English", "Batch: CEF1-23.1", and a date range from "From: 01/06/2023" to "To: 30/06/2023". A "Search" button is located next to the date range. To the right, a table lists course schedules:

Batch	Start Time	End Time	Date	Status
CEF1-23.1	10:00	12:00	01/06/2023	
CEF1-23.1	10:00	12:00	08/06/2023	Canceled

At the bottom right of the main content area, there is a button labeled "Update Course Schedule".

Figure 33 Teacher View Course Schedule Page

## No: 26 Interface

Name: Teacher Update Course Schedule Page

Description: This is the Update Course Schedule for Teacher.

Splendid Way Higher Educational Institute

Contact   Support

Amal Basnayake

Dashboard/Schedule/Course/Update

**Course:** Certificate In English

**Batch:** CEF1-23.1

**Date:** 08/06/2023

**Start Time:** 10:00

**End Time:** 12:00

**Status:** Canceled

Complete   Cancel

Figure 34 Teacher Update Course Schedule Page

## No: 27 Interface

Name: Teacher View All Exam Schedule Page

Description: This is the View All Exam Schedule for Teacher.

The screenshot shows a web interface for a teacher to view exam schedules. The top navigation bar includes the institute logo, 'Splendid Way Higher Educational Institute', and links for 'Contact' and 'Support'. A search bar and user profile for 'Amal Basnayake' are also present. The left sidebar contains links for 'Dashboard', 'Schedule >', 'Course', and 'Exam'. The 'Exam' link is highlighted. The main content area displays a table of exam schedules for the 'Certificate In English' course, batch 'CEF1-23.1'. The table has columns for Exam Schedule, Name, Type, Date, Start Time, End Time, Location, and Exam Status. Two rows are shown: one for a 'MID Exam' scheduled on 6/8/2023 at 10:00-12:00 in Hall1, and another for a 'FINAL Exam' scheduled on 6/10/2023 at 10:00-12:00 in Hall1, which is marked as 'Canceled'.

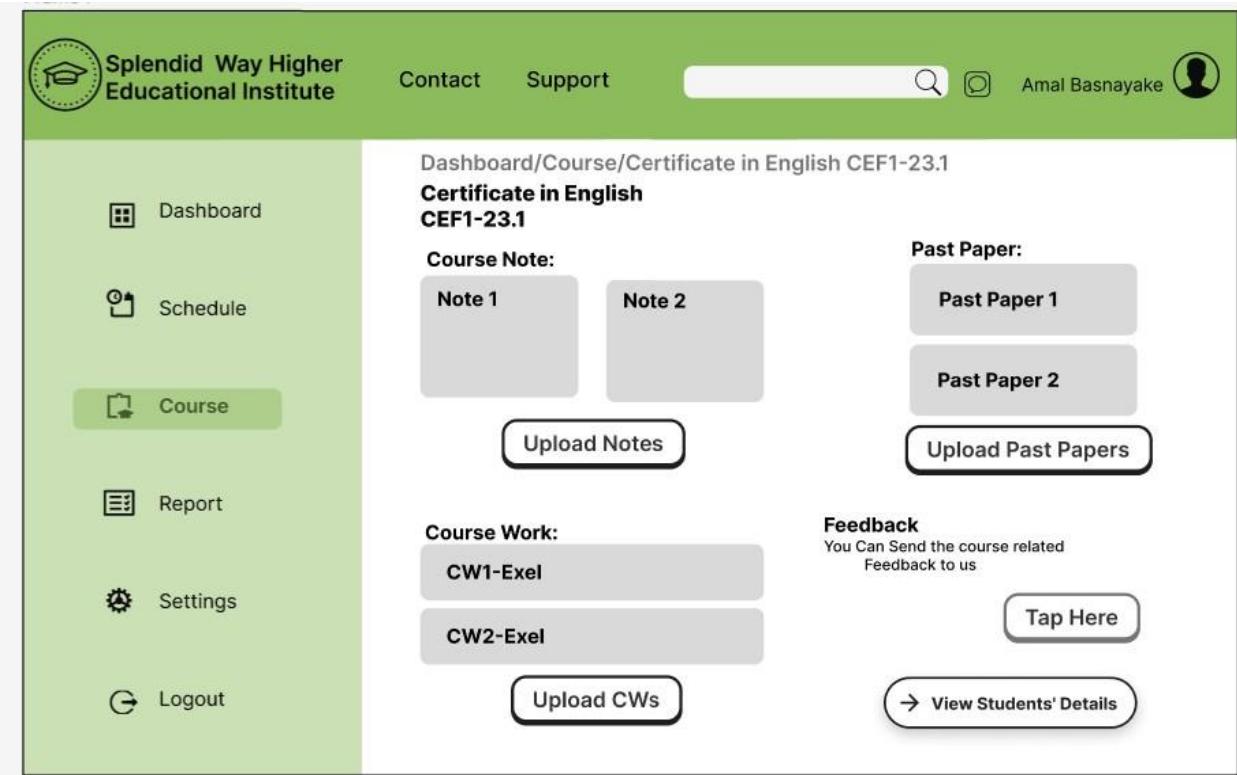
Exam Schedule	Name	Type	Date	Start Time	End Time	Location	Exam Status
CEF1-MID 23.1	Eng-MID Exam	MID	6/8/2023	10:00	12:00	Hall1	
CEF-FINAL 23.1	Eng-FINAL Exam	FINAL	6/10/2023	10:00	12:00	Hall1	Canceled

Figure 35 Teacher View All Exam Schedule Page

## No: 28 Interface

Name: Teacher View Course Page

Description: This is the Course for Teacher.



The screenshot shows the 'Teacher View Course Page' interface for the 'Splendid Way Higher Educational Institute'. The top navigation bar includes the institute's logo, name, and links for Contact, Support, and user profile (Amal Basnayake). A search bar is also present. The main content area displays course details: 'Dashboard/Course/Certificate in English CEF1-23.1', 'Certificate in English CEF1-23.1', and 'Course Note' sections with 'Note 1' and 'Note 2' buttons, each with an 'Upload Notes' button below it. To the right, there are 'Past Paper' and 'Feedback' sections, each with two buttons ('Past Paper 1', 'Past Paper 2' and 'Upload Past Papers' respectively) and a 'Tap Here' button. The left sidebar contains links for Dashboard, Schedule, Course (which is highlighted in green), Report, Settings, and Logout.

Figure 36 Teacher View Course Page

## No: 29 Interface

Name: Upload Notes & Past Paper Page

Description: This is the Upload Notes & Past Paper Page for Teacher.

The screenshot shows a web interface for a higher educational institute. At the top, there is a green header bar with the institute's logo and name "Splendid Way Higher Educational Institute". On the right side of the header are links for "Contact", "Support", a search bar, and a user profile for "Amal Basnayake". Below the header is a sidebar on the left containing links for "Dashboard", "Schedule", "Course" (which is highlighted in green), "Report", "Settings", and "Logout". The main content area on the right is titled "Dashboard/Course/Certificate in English CEF1-23.1/ Upload Notes & Past Paper" and "Upload Notes & Past Papers". It features a "Course Note" section with a note name "Note 2" and a note file upload field labeled "Drag Here". At the bottom right of this section are "Complete" and "Cancel" buttons.

Figure 37 Upload Notes & Past Paper Page

## No: 30 Interface

Name: Upload Course Work Page

Description: This is the Upload Course work Page for Teacher.

The screenshot shows a web interface for 'Splendid Way Higher Educational Institute'. The top navigation bar includes a logo, the institution's name, 'Contact', 'Support', a search bar, and a user profile for 'Amal Basnayake'. The left sidebar contains links for 'Dashboard', 'Schedule', 'Course' (which is highlighted), 'Report', 'Settings', and 'Logout'. The main content area is titled 'Dashboard/Course/Certificate in English CEF1-23.1/ Upload Course Work' and displays the 'Upload Course Work' section. It shows the following details: Date: 22/06/2023, Course Work Name: CW2-Exel, Course Work Content: Null, and Deadline: 30/06/2023. A file submission area with a 'Drag here' placeholder is present, along with 'Complete' and 'Cancel' buttons.

Figure 38 Upload Course Work Page

## No: 31 Interface

Name: All the Submitted Coursework Page

Description: This is the CW1-Exel Page for Teacher.

The screenshot shows a web interface for managing submitted coursework. The top navigation bar includes the logo of 'Splendid Way Higher Educational Institute', contact and support links, a search bar, and a user profile for 'Amal Basnayake'. The main content area displays a table of submitted work for five students, each with a 'View' button. The table columns are: Student ID, Date, Submit File, Submit Content, Grade, and Feedback.

Student ID	Date	Submit File	Submit Content	Grade	Feedback
SW-S000001	30/06/2023	CW1 Exel	Null	Not Yet	Not Yet
SW-S000002	30/06/2023	CW1 Exel	Null	Not Yet	Not Yet
SW-S000003	30/06/2023	CW1 Exel	Null	Not Yet	Not Yet
SW-S000004	30/06/2023	CW1 Exel	Null	Not Yet	Not Yet
SW-S000005	30/06/2023	CW1 Exel	Null	Not Yet	Not Yet

Figure 39 All the Submitted Coursework Page

## No: 32 Interface

Name: Graded Status Page

Description: This is the Graded Status Page for Teacher.

The screenshot shows a web interface for a teacher's graded status page. The top navigation bar includes the logo of 'Splendid Way Higher Educational Institute', contact and support links, a search bar, and a user profile for 'Amal Basnayake'. The left sidebar contains links for Dashboard, Schedule, Course (which is highlighted), Report, Settings, and Logout. The main content area displays the 'Graded Status' section with fields for 'Submit File' (CW1-Exel), 'Submit Content' (Null), 'Grade' (Not Yet), and 'Feedback' (Type here). There are 'Update' and 'Cancel' buttons at the bottom right of the form.

Figure 40 Graded Status Page

### No: 33 Interface

Name: View Students' Attendance Page

Description: This is the View Students' Attendance Page for Teacher.

The screenshot shows a web interface for a higher educational institute. The header features a logo of a graduation cap inside a circle, followed by the text "Splendid Way Higher Educational Institute". To the right are links for "Contact" and "Support", a search bar with a magnifying glass icon, and a user profile for "Amal Basnayake" with a person icon. The main content area has a light green header with the text "Dashboard/Course/Certificate in English CEF1-23.1/View Students' Details/Students' Attendance". Below this, there are two date input fields: "From: 01/10/2023" and "To: 30/10/2023", each with a right arrow button. A "Search" button is located to the right of the date range. On the left side, a sidebar menu lists "Dashboard", "Schedule", "Course", "Report", "Settings", and "Logout", each with a corresponding icon. The main content area displays a table of student attendance data. The table has columns for "Student ID" and dates from "01/10/2023" to "29/10/2023". The table rows show five students: SW-S000001 through SW-S000005. The attendance status is indicated by letters: P for Present, C for Cancel, and A for Absent. The data is as follows:

Student ID	01/10/2023	08/10/2023	15/10/2023	22/10/2023	29/10/2023
SW-S000001	P	C	A	P	P
SW-S000002	P	C	A	P	P
SW-S000003	P	C	P	P	P
SW-S000004	P	C	P	P	P
SW-S000005	P	C	P	P	P

Figure 41 View Students' Attendance Page

## No: 34 Interface

Name: View Schedule Report Page

Description: This is the Schedule Report Page for Teacher.

The screenshot shows the interface of the Splendid Way Higher Educational Institute website. The top navigation bar is green with the institute's logo and name on the left, and links for Contact, Support, and a user profile on the right. A search bar is also present. The main content area has a light gray background. On the left, a sidebar menu includes Dashboard, Schedule, Course, Report (with sub-options Schedule and Students' marked as active), Settings, and Logout. The main content area displays a title "Dashboard/ Report/Schedule Report" and a section titled "Schedule Report". It shows filter options for Course (Certificate In English), Batch (CEF1-23.1), Date range (From: 01/06/2023 To: 30/06/2023), and a "Search" button. Below these filters is a table with columns: Batch, Start Time, End Time, Date, and Status. Two rows are listed: one for CEF1-23.1 with status "Active" and another for CEF1-23.1 with status "Canceled". At the bottom right of the table are "Generate" and "Cancel" buttons.

Batch	Start Time	End Time	Date	Status
CEF1-23.1	10:00	12:00	01/06/2023	Active
CEF1-23.1	10:00	12:00	08/06/2023	Canceled

Figure 42 View Schedule Report Page

## No: 35 Interface

Name: Teacher View Students' Results Page

Description: This is the View Students' Results Page for Teacher.

The screenshot shows a web-based application interface for teachers. At the top, there is a green header bar with the logo of "Splendid Way Higher Educational Institute". On the right side of the header, there are links for "Contact", "Support", a search bar, and a user profile for "Amal Basnayake".  
  
The main content area is divided into two sections. On the left, there is a sidebar with the following options: "Dashboard", "Schedule", "Course", "Report" (with a dropdown arrow showing "Schedule" and "Students'"), "Settings", and "Logout".  
  
On the right, there is a table titled "Dashboard/Course/Certificate in English CEF1-23.1/View Students' Details/Students' Results". The table has two columns: "Student ID" and "Grade". The data in the table is as follows:

Student ID	Grade
SW-S000001	A
SW-S000002	B
SW-S000003	C
SW-S000004	A
SW-S000005	B

Figure 43 Teacher View Students' Results Page

## No: 36 Interface

Name: Students' Results Report Generate Page for teacher

Description: This is the Students' Results Report Page for Teacher.

The screenshot shows a web interface for 'Splendid Way Higher Educational Institute'. The top navigation bar includes a logo, 'Contact', 'Support', a search bar, and a user profile for 'Amal Basnayake'. The left sidebar has links for 'Dashboard', 'Schedule', 'Course', 'Report' (which is highlighted in green), 'Settings' (with 'Students' selected), and 'Logout'. The main content area displays 'Students' Results Report' for 'Certificate In English' (Batch: CEF1-23.1, Exam Name: Eng-MID Exam, Exam Code: CEF1-MID 23.1). A table lists student IDs and grades:

Student ID	Grade
SW-S000001	A
SW-S000002	B
SW-S000003	C
SW-S000004	A
SW-S000005	B

Buttons at the bottom right are 'Generate' and 'Cancel'.

Figure 44 Students' Results Report Generate Page for teacher

## No: 37 Interface

Name: Update Profile Page

Description: This is the Update Profile Page for Teacher.

The screenshot shows a web application interface for 'Splendid Way Higher Educational Institute'. The top navigation bar includes a logo, the institution's name, 'Contact' and 'Support' links, a search bar, and a user profile for 'Amal Basnayake' with a dropdown arrow. On the left, a sidebar lists 'Dashboard', 'Schedule', 'Course', 'Report', 'Settings', and 'Logout' with corresponding icons. The main content area is titled 'Dashboard/Profile/Update Profile' and 'Update Profile'. It contains a 'Personal Details' form with fields for First Name (Amal), Last Name (Basnayake), Gender (Male), Date Of Birth (10/12/1980), Address (No: 123/ A Street: Katana City: Negombo), Email (amalbasnayake@gmail.com), and Mobile Number (0772233444). Below the form is a 'Teacher Specialization' field. A green button on the right labeled 'Change Password', 'Profile', and 'Logout' is highlighted. At the bottom right is a large 'Update Profile' button.

Figure 45 Update Profile Page

## No: 38 Interface

Name: Admin Dashboard

Description: This is the Admin Dashboard Page

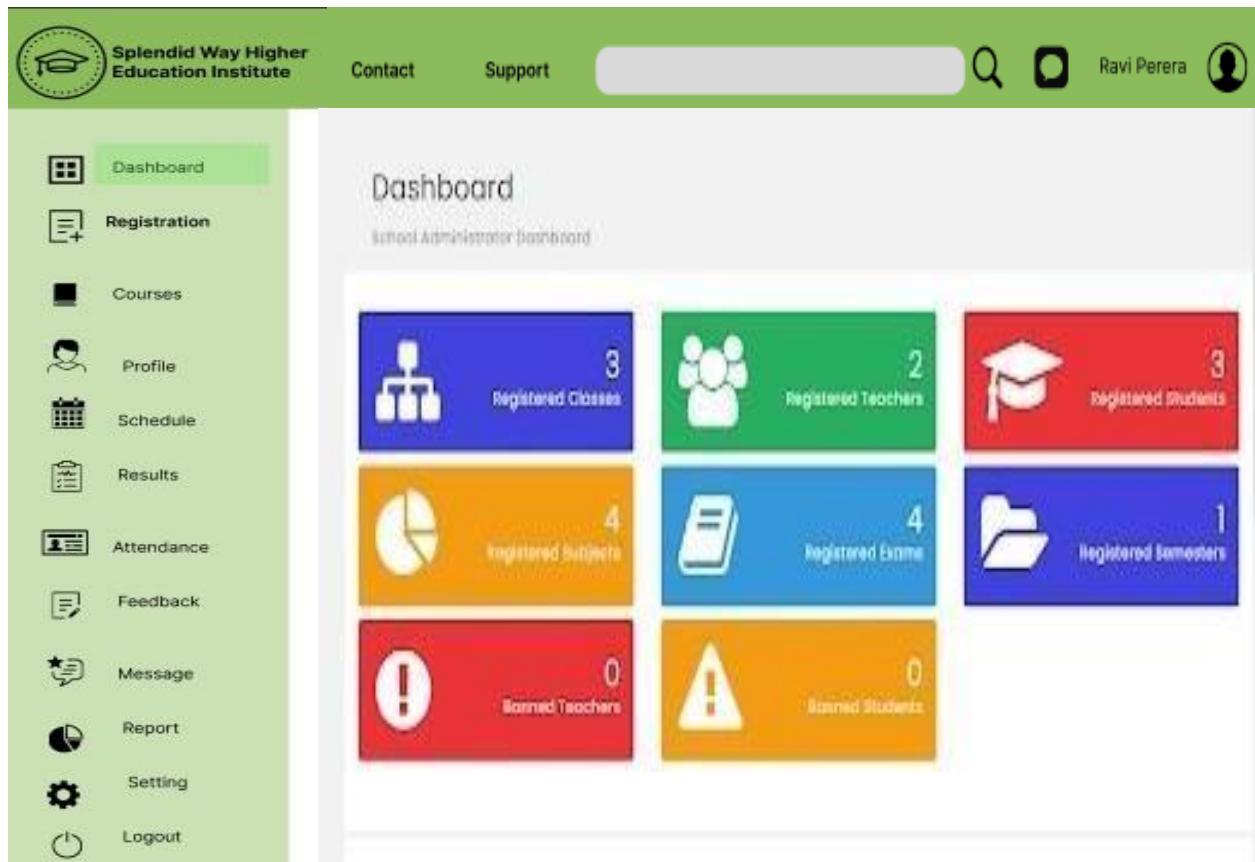


Figure 46 Admin Dashboard

## No: 39 Interface

Name: Student Registration Page

Description: This is the page for Student registration for the System

The screenshot shows a web-based student registration system. The header includes the logo of 'Splendid Way Higher Education Institute', contact information, a search bar, and a user profile for 'Ravi Perera'. The left sidebar lists navigation options: Dashboard, Registration (which is selected), Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area is titled 'Dashboard/ Registration/ Student' and has tabs for 'Student' (selected), 'Teacher', and 'Admin'. Under the 'Student' tab, there are fields for 'Student Id' (SW-000002) and 'Search by NIC' (200387196584), with a 'Search' button. Below this is a section for 'Personal Details' with fields for First Name (Supun), Last Name (Perera), Date of Birth (14/02/2003), Address (NO : 78 Street : Colombo Road City : Malabe), Email (supun@gmail.com), and Mobile Number (Personal: 0775489325, Home: 011-2768532). There are dropdowns for Final Qualification (A/L) and Gender (Male). Under 'Guardian Details', there are fields for First Name (Malini), Last Name (Perera), Mobile Number (0775698742), and Home (0775647125). The 'System Credentials' section contains fields for User Id (SW-S000002) and Password (\*\*\*\*\*). At the bottom right are 'Register and Send' and 'Cancel' buttons.

Figure 47 Student Registration Page

## No: 40 Interface

Name: Teacher Registration Page

Description: This is the page for registration of the Teachers to the System

The screenshot shows the Teacher Registration Page of the Splendid Way Higher Education Institute system. The page has a green header bar with the institute's logo and name, and links for Contact and Support. On the right side of the header are a search icon, a user profile icon, and the name "Ravi Perera". The left sidebar contains a navigation menu with icons and labels: Dashboard, Registration (which is selected), Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area has a title "Dashboard/Registration/Teacher" and tabs for Student, Teacher, and Admin (the Admin tab is currently active). Below the tabs, there is a form for entering teacher details. The "Personal Details" section includes fields for Teacher Id (SW-T000001), First Name (Kumari), Last Name (Dasanayaka), Address (NO), Street, City, Email (kumari@gmail.com), Mobile Number (0778712365), Home Number (0772354874), Date of Birth (05/04/1970), Gender (Male), NIC number (18891547896V), and Teacher Qualification. The "System Credentials" section includes fields for Teacher Id (SW-T000001) and Password (\*\*\*\*\*). At the bottom right are two buttons: "Register and Send" and "Cancel".

Figure 48 Teacher Registration Page

## No: 41 Interface

Name: Admin Registration Page

Description: This is the page for registering Administrators to the System

The screenshot shows the Admin Registration Page of the Splendid Way Higher Education Institute website. The header includes the institute's logo, name, and links for Contact, Support, a search bar, and user profile (Ravi Perera). The left sidebar contains navigation links: Dashboard, Registration (selected), Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area has a title 'Dashboard/Registration/Admin' and tabs for Student, Teacher, and Admin (Admin is selected). It displays personal details like Admin Id (SW-A000001), First Name (Kumari), Last Name (Dasanayaka), Address (NO), Street, City, Email (kumari@gmail.com), Mobile Number (0778712365), Home Number (0772354874), Date of Birth (05/04/1970), Gender (Male), NIC number (18891547896V), and a Description field ('Type Here'). Below that is a 'System Credentials' section with Admin Id (SW-A000001) and Password (\*\*\*\*\*). At the bottom are 'Register and Send' and 'Cancel' buttons.

Personal Details	
Admin Id	: SW-A000001
First Name	: Kumari
Last Name	: Dasanayaka
Address	: NO
Street	
City	
Email	: kumari@gmail.com
Mobile Number	: 0778712365
Home Number	: 0772354874
Date of Birth	: 05/04/1970
Gender	: Male
NIC number	: 18891547896V
Description	: Type Here

System Credentials	
Admin Id	: SW-A000001
Password	: *****

**Buttons:** Register and Send, Cancel

Figure 49 Admin Registration Page

## No: 42 Interface

Name: Student Registration for the Course

Description: This is the page for registering Students for courses

The screenshot shows a web-based application for student registration. The header features a logo for 'Splendid Way Higher Education Institute' and navigation links for 'Contact', 'Support', a search bar, and a user profile for 'Ravi Perera'. The main content area is titled 'Dashboard/Courses/Register Student' and includes three buttons: 'Register Student' (highlighted in green), 'New Course', and 'New Batch'. A sidebar on the left lists various menu items: Dashboard, Registration, Courses (selected), Profile, Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The 'Courses' section displays two course entries:

Course Details	
<b>Course 1</b>	
Course ID	CITF1
Course Name	Certificate It
Course Type	Full
Batch	CITF1-23.1
Fee	30000.00
<b>Course 2</b>	
Course ID	CEF1
Course Name	Certificate English
Course Type	Full
Batch	CEF1-23.1
Fee	40000.00

Below the courses is a 'Payment Details' section with the following information:

Student ID	SW-S000002
Full course fee	70000.00
Payment Description	Course Fee

At the bottom right are three buttons: 'Register', 'Print Receipt', and 'Cancel'.

Figure 50 Student Registration for the Course

## No: 43 Interface

Name: Add New courses

Description: This is the page for Add New Courses to the system

The screenshot shows a web application interface for managing courses. The top navigation bar includes the logo of 'Splendid Way Higher Education Institute', links for 'Contact' and 'Support', a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains links for 'Dashboard', 'Registration', 'Courses' (which is selected), 'Profile', 'Schedule', 'Results', 'Attendance', 'Feedback', 'Message', 'Report', 'Setting', and 'Logout'. The main content area is titled 'Dashboard/Courses/Course/New Course' and features a navigation bar with 'Register Student', 'Course' (selected), 'New Batch', 'New Course' (selected), and 'Update Course'. Below this is a section titled 'Course Details' containing fields for Course Id (CGDF1), Course Name (Certificate Graphic Designing), Course Type (Full), Course Description, Course Duration (4 months), and Course Fee (40000.00). At the bottom are 'Add Course' and 'Cancel' buttons.

Course Details	
Course Id	: CGDF1
Course Name	: Certificate Graphic Designing
Course Type	: Full
Course Description	
Course Duration	: 4 months
Course Fee	: 40000.00

Figure 51 Add New Courses

## No: 44 Interface

Name: Update Details of the Existing courses

Description: This is the page for Update the Course Details for Existing Course in the Institute

The screenshot shows a web application interface for managing courses. On the left is a sidebar with icons and labels: Dashboard, Registration, Courses (selected), Profile, Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main area has a green header bar with the logo 'Splendid Way Higher Education Institute', 'Contact', 'Support', a search bar, and a user profile for 'Ravi Perera'. Below the header is a navigation bar with tabs: 'Register Student' (disabled), 'Course' (selected), 'New Batch', 'New Course' (disabled), and 'Update Course'. A sub-header 'Course Details' is followed by a search bar 'Search by Course Id' and a 'Search' button. The main form contains fields for Course Id (CGDF1), Course Name (Certificate Graphic Designing), Course Type (Full), Course Description (empty), Course Duration (4 months), and Course Fee (40000.00). At the bottom are 'Update Course' and 'Cancel' buttons.

Course Id	:	CGDF1
Course Name	:	Certificate Graphic Designing
Course Type	:	Full
Course Description	:	
Course Duration	:	4 months
Course Fee	:	40000.00

Figure 52 Update Details of the Existing courses

## No: 45 Interface

Name: Add New Batches

Description: This is the page for Add New Batches to the system

The screenshot shows a web application interface for managing batches. At the top, there is a navigation bar with the logo 'Splendid Way Higher Education Institute', a search bar, and a user profile for 'Ravi Perera'. Below the navigation bar, the main menu includes 'Dashboard', 'Registration', 'Courses' (which is highlighted), 'Profile', 'Schedule', 'Results', 'Attendance', 'Feedback', 'Message', 'Report', 'Setting', and 'Logout'. The main content area has a title 'Dashboard/Courses/Batch/New Batch'. It features three buttons: 'Register Student' (green), 'New Course' (light green), and 'Batch' (dark green). Below these are two more buttons: 'New Batch' (green) and 'Update Batch' (light green). A section titled 'Batch Details' contains fields for 'Course Id' (CGDF1), 'Batch Id' (CGDF1-23.2), 'Start date' (1/7/2023), 'End date' (10/20/2023), 'Description' (empty), and 'Teacher' (empty). At the bottom right are 'New Batch' and 'Cancel' buttons.

Figure 53 Add New Batches

## No: 46 Interface

Name: Update Details of the Existing Batches

Description: This is the page for Update the Batch Details for Existing Batches in the Institute

The screenshot shows a web application interface for managing batches. The top navigation bar includes the logo 'Splendid Way Higher Education Institute', 'Contact', 'Support', a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains links for Dashboard, Registration, Courses (which is selected), Profile, Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area has tabs for 'Dashboard/Courses/Batch/Update Batch', 'Register Student', 'New Course', 'Batch', 'New Batch', and 'Update Batch'. A sub-section titled 'Batch Details' shows fields for Course Id (CGDF1), Batch Id (CGDF1-23.2), Start date (1/7/2023), End date (10/20/2023), Description, and Teacher. Below these fields are 'Update Batch' and 'Cancel' buttons.

Batch Details

Course Id	: CGDF1
Batch Id	: CGDF1-23.2
Start date	: 1/7/2023
End date	: 10/20/2023
Description	:
Teacher	:

Update Batch      Cancel

Figure 54 Update Details of the Existing Batches

## No: 47 Interface

Name: Student Profile Update Page

Description: This is the page for updating the profile of the student

The screenshot shows the 'Student Profile Update Page' of the Splendid Way Higher Education Institute website. The top navigation bar includes the institute's logo, name, and links for Contact, Support, a search bar, and user Ravi Perera. The left sidebar contains links for Dashboard, Registration, Courses, Profile (which is highlighted), Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area is titled 'Dashboard/ Profile/ Student' and shows tabs for Student (selected), Teacher, and Admin. It displays personal details for a student with ID SW-000002, named Supun Perera, born on 14/02/2003, residing at NO: 78 Colombo Road, Malabe, with email supun@gmail.com and mobile numbers 0775489325 (Personal) and 011-2768532 (Home). The guardian details show Malini Perera as the contact person with mobile number 0775698742 and home number 0775647125. Buttons for 'Update Profile' and 'Cancel' are at the bottom.

Personal Details			
First Name	Supun	Last Name :	Perera
Date of Birth	14/02/2003		
Address	NO : 78	Street :	Colombo Road
Email	supun@gmail.com		
Mobile Number	Personal :	0775489325	Home : 011-2768532
Final Qualification :	A/L	Gender :	Male
Guardian Details			
First Name	Malini	Last Name :	Perera
Mobile Number :	0775698742	Home :	0775647125

Figure 55 Student Profile Update Page

## No: 48 Interface

Name: Teacher Profile Update Page

Description: This is the page for updating the profile of the teacher

The screenshot shows the 'Teacher Profile Update Page' of the Splendid Way Higher Education Institute website. The header includes the institute's logo, name, and navigation links for Contact, Support, a search bar, and a user profile for Ravi Perera. A sidebar on the left lists various menu items: Dashboard, Registration, Courses, Profile (which is selected), Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area is titled 'Dashboard/Profile/Teacher' and shows tabs for Student, Teacher (which is selected), and Admin. It displays personal details for a teacher named Kumari Dasanayaka, including her ID (SW-T000001), address (No 123 Street City), email (kumari@gmail.com), mobile number (0778712365), home number (0772354874), date of birth (05/04/1970), gender (Male), NIC number (18891547896V), and teacher qualification (which is currently empty). There are 'Update Profile' and 'Cancel' buttons at the bottom.

Figure 56 Teacher Profile Update Page

## No: 49 Interface

Name: Admin Profile Update Page

Description: This is the page for updating the profile of the admin

The screenshot shows the Admin Profile Update Page. At the top, there is a green header bar with the institute's logo, name, and navigation links for Contact and Support. A search bar and a user profile icon are also present. The main content area has a left sidebar with icons and labels for Dashboard, Registration, Courses, Profile (which is selected), Schedule, Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main panel title is "Dashboard/Profile/Admin". Below it, a sub-panel shows tabs for Student, Teacher, and Admin, with "Admin" selected. A dropdown menu for "Admin Id" shows "SW-A000001" with a "Search" button next to it. The "Personal Details" section contains fields for First Name (Kumari), Last Name (Dasanayaka), Address (NO Street City), Email (kumari@gmail.com), Mobile Number (0778712365), Home Number (0772354874), Date of Birth (05/04/1970), Gender (Male), NIC number (18891547896V), and a large Description field with placeholder text "Type Here". At the bottom are "Update Profile" and "Cancel" buttons.

Figure 57 Admin Profile Update Page

## No: 50 Interface

Name: Add Exam Schedule

Description: This is the page for Add New Exam Schedule to the system

Splendid Way Higher Education Institute

Contact Support

Dashboard/Schedule/Exam Schedule/New Exam

Exam Schedule Course Schedule Repeat Exam Schedule

New Exam Update Exam

Schedule New Exam

Course Id	:	CITF
Batch	:	CITF-23.1
Exam ID	:	CITF-MID23.1
Exam Name	:	IT Mid Exam
Exam Schedule Id	:	CITF1-MID23.1
Exam Type	:	Normal
Exam Date	:	07/08/2023
Start time	:	10.00
End time	:	13.00
Exam Locations	:	Hall 1
Exam Status	:	

Schedule Exit

Figure 58 Add Exam Schedule

## No: 51 Interface

Name: Update Details of the Exam Schedule

Description: This is the page for Update the Exam Schedule Details for Existing Exam Schedule in the Institute

The screenshot shows a web-based application for managing exam schedules. The header includes the logo of 'Splendid Way Higher Education Institute', navigation links for 'Contact' and 'Support', a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains links for 'Dashboard', 'Registration', 'Courses', 'Profile', 'Schedule' (which is highlighted in green), 'Results', 'Attendance', 'Feedback', 'Message', 'Report', 'Setting', and 'Logout'. The main content area is titled 'Dashboard/Schedule/Exam Schedule/Update Exam'. It features several buttons: 'Exam Schedule' (highlighted in green), 'Course Schedule', 'Repeat Exam Schedule', 'New Exam' (highlighted in green), and 'Update Exam'. Below these are fields for 'Course Id' (CITF) and 'Batch' (CITF-23.1). A dropdown for 'Exam ID' is set to 'CITF-MID23.1'. A 'Search' button is located next to these fields. The main form area contains the following fields: 'Exam Name' (IT Mid Exam), 'Exam Schedule Id' (CITF1-MID23.1), 'Exam Type' (Normal), 'Exam Date' (07/08/2023), 'Start time' (10.00), 'End time' (13.00), 'Exam Locations' (Hall 1), 'Exam Status' (Canceled), and two additional dropdowns for 'Hall 2' and 'Update'. Buttons for 'Update' and 'Exit' are at the bottom right.

Figure 59 Update Details of the Exam Schedule

## No: 52 Interface

Name: Add Repeat Exam Schedule

Description: This is the page for Add New Repeat Exam Schedule to the system

The screenshot shows a web application interface for managing exam schedules. The header includes the logo of 'Splendid Way Higher Education Institute', navigation links for 'Contact' and 'Support', a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains links for 'Dashboard', 'Registration', 'Courses', 'Profile', 'Schedule' (which is selected), 'Results', 'Attendance', 'Feedback', 'Message', 'Report', 'Setting', and 'Logout'. The main content area has a title 'Dashboard/Schedule/Repeat Exam Schedule/New Exam' and a sub-section 'Schedule New Exam'. It displays form fields for 'Course Id' (CITF), 'Batch' (CITF-23.1), 'Exam ID' (CITF-MID23.1), 'Exam Name' (IT Mid Exam), 'Exam Schedule Id' (CITF1-MID23.1), 'Exam Type' (Normal), 'Exam Date' (07/08/2023), 'Start time' (10.00), 'End time' (13.00), 'Exam Locations' (Hall 1 and Hall 2), and 'Exam Status'. Two buttons at the bottom are 'Schedule' and 'Exit'.

Schedule New Exam	
Course Id	: CITF
Batch	: CITF-23.1
Exam ID	: CITF-MID23.1
Exam Name	: IT Mid Exam
Exam Schedule Id	: CITF1-MID23.1
Exam Type	: Normal
Exam Date	: 07/08/2023
Start time	: 10.00
End time	: 13.00
Exam Locations	: Hall 1
Exam Status	:

Schedule      Exit

Figure 60 Add Repeat Exam Schedule

## No: 53 Interface

Name: Update Details of the Repeat Exam Schedule

Description: This is the page for Update the Repeat Exam Schedule Details for Existing Repeat Exam Schedule in the Institute

The screenshot shows a web-based application interface for managing exam schedules. The header includes the logo of 'Splendid Way Higher Education Institute', navigation links for 'Contact' and 'Support', a search bar, and a user profile for 'Ravi Perera'. The main menu on the left lists options like 'Dashboard', 'Registration', 'Courses', 'Profile', 'Schedule' (which is selected), 'Results', 'Attendance', 'Feedback', 'Message', 'Report', 'Setting', and 'Logout'. The central content area is titled 'Dashboard/Schedule/Repeat Exam Schedule/Update Exam'. It features three main buttons: 'Exam Schedule' (disabled), 'Course Schedule' (disabled), and 'Repeat Exam Schedule' (enabled). Below these are two more buttons: 'New Exam' (disabled) and 'Update Exam' (enabled). A section titled 'Update Existing Exam' contains dropdown menus for 'Course Id' (CITF), 'Batch' (CITF-23.1), 'Exam ID' (CITF-MID23.1), and a 'Search' button. Further down, there are several input fields with dropdown arrows: 'Exam Name' (IT Mid Exam), 'Exam Schedule Id' (CITF1-MID23.1), 'Exam Type' (Repeat), 'Exam Date' (07/08/2023), 'Start time' (10.00), 'End time' (13.00), 'Exam Locations' (Hall 1), 'Exam Status' (Canceled), and another dropdown for 'Hall 2'. At the bottom right are 'Update' and 'Exit' buttons.

Figure 61 Update Details of the Repeat Exam Schedule

## No: 54 Interface

Name: View Student Attendance Page by Admin

Description: This is the page for View the Students Attendance

The screenshot shows a web application interface for viewing student attendance. The top navigation bar is green and includes the logo of 'Splendid Way Higher Education Institute', a search bar, and user profile information for 'Ravi Perera'. A sidebar on the left contains links for Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance (which is highlighted in green), Feedback, Message, Report, Setting, and Logout. The main content area is titled 'Dashboard/Attendance' and 'View Attendance'. It features a search form with fields for Course Id (CITF1), Batch Id (CITF1-23.1), From (2023/06/01), To (2023/06/30), and a 'Search' button. Below the search form is a legend: P : Present, A : Absent, C : Cancel. A table displays student attendance records for five students (SW-S000001 to SW-S000005) across six dates (01/10/2023 to 29/10/2023). The table data is as follows:

Student ID	01/10/2023	08/10/2023	15/10/2023	22/10/2023	29/10/2023
SW-S000001	P	C	A	P	P
SW-S000002	P	C	A	P	P
SW-S000003	P	C	P	P	P
SW-S000004	P	C	P	P	P
SW-S000005	P	C	P	P	P

Figure 62 View Student Attendance Page by Admin

## No: 55 Interface

Name: Add New Exam

Description: This is the page for Add New Exam to the system

The screenshot shows a web application interface for managing exams. At the top, there is a header bar with the logo of 'Splendid Way Higher Education Institute', a search bar, and a user profile for 'Ravi Perera'. Below the header is a navigation menu on the left with options like Dashboard, Registration, Courses, Profile, Schedule, Exam (which is highlighted), Attendance, Feedback, Message, Report, Setting, and Logout. The main content area is titled 'Dashboard/Exam/New Exam' and contains two buttons: 'New Exam' (highlighted in green) and 'Update Exam'. Below these buttons are several input fields with dropdown menus: Course Id (CITF1), Batch Id (CITF1-23.1), Exam Name (IT Last Semester), Exam Id (empty), Exam Type (dropdown menu), and Exam Fee (empty). At the bottom right are 'Add' and 'Cancel' buttons.

Figure 63 Add New Exam

## No: 56 Interface

Name: Update Details of the Exam

Description: This is the page for Update the Exam Details for Existing Exam in the Institute

Splendid Way  
Higher Education  
Institute

Contact      Support

Dashboard/Exam/Update Exam

New Exam      Update Exam

Course Id : CITF1

Batch Id : CITF1-23.1

Exam Id :  Search

Exam Name : IT Last Semester

Exam Type :

Exam Fee :

Update      Cancel

Figure 64 Update Details of the Exam

## No: 57 Interface

Name: Add New Message Page

Description: This is the page for Send Important Message for Students and Teachers

The screenshot shows a web-based application interface for managing messages. On the left is a sidebar with a green header containing the logo of 'Splendid Way Higher Education Institute' and navigation links: Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback, Message (which is highlighted in green), Report, Setting, and Logout. The main content area has a light blue header with the title 'Dashboard/Message'. Below it is a section titled 'New message' with a text input field labeled 'Type here' and a 'Add' button. A table titled 'Displayed Message' lists one message entry: No 1, Message 'This is a Sample Message 1', and Added date '2023/06/20'. To the right of the table are 'Edit' and 'Delete' buttons. A modal window titled 'Edit Message' is open, showing a text input field labeled 'Type here' and an 'Edit' button. In the top right corner of the main header, there is a user profile for 'Ravi Perera'.

Figure 65 Add New Message Page

## No: 58 Interface

Name: View Feedback Page

Description: This is the page for View the Feedback Which are sent by student and Teachers

The screenshot shows a web application interface for viewing feedback. On the left is a vertical sidebar with icons and labels for Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback (which is highlighted in green), Message, Report, Setting, and Logout. The main content area has a header 'Dashboard/Feedback' and a sub-header 'View Feedback'. It includes a search bar with a magnifying glass icon and a user profile for 'Ravi Perera'. Below the search bar are dropdown menus for 'Feedback type' (set to 'Course'), 'From' (set to '12/05/2023'), 'To' (set to '30/06/2023'), and a 'View' button. A table lists three feedback entries:

No	Sent By	Comment	Date	Rating
1	SW-T001	average	12/05/2023	3
2	SW-T002	good	12/05/2023	4
3	SW-T003	Highly Agreed	12/05/2023	5

Figure 66 View Feedback Page

## No: 59 Interface

Name: Add New Course Schedule

Description: This is the page for Add New Course Schedule to the system

Splendid Way  
Higher Education  
Institute

Contact      Support

Exam Schedule      Course Schedule      Repeat Exam Schedule

New course schedule      Update Course Schedule

**New Course Schedule**

Course Id	:	CITF1
Batch Id	:	CITF1-23.1
Schedule Name	:	
Date	:	2023/06/30
Start Time	:	10:30
End Time	:	12:30
Schedule Status	:	

Schedule      Exit

Figure 67 Add New Course Schedule

## No: 60 Interface

Name: Update Details of the Course Schedule

Description: This is the page for Update the Course Schedule Details for Existing Course Schedule in the Institute

The screenshot shows a web-based application interface for managing course schedules. The header includes the logo of 'Splendid Way Higher Education Institute', navigation links for 'Contact' and 'Support', a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains a vertical menu with icons and labels: Dashboard, Registration, Courses, Profile, Schedule (selected), Results, Attendance, Feedback, Message, Report, Setting, and Logout. The main content area is titled 'Dashboard/Schedule/Course Schedule/Update course schedule'. It features several buttons: 'Exam Schedule' (light green), 'Course Schedule' (dark green, currently selected), and 'Repeat Exam Schedule' (light green). Below these are two more buttons: 'New course schedule' (light green) and 'Update Course Schedule' (dark green). A sub-section titled 'Update Existing Course Schedule' contains form fields for 'Course Id' (CITF1), 'Batch Id' (CITF1-23.1), 'Date' (2023/06/30), 'Schedule Name' (empty), and a 'Search' button. Further down are fields for 'Date' (2023/06/30), 'Start Time' (10:30), 'End Time' (12:30), and 'Schedule Status' (Canceled). At the bottom right are 'Update' and 'Exit' buttons.

Figure 68 Update Details of the Course Schedule

## No: 61 Interface

Name: Student Data Report Generate Page 1

Description: This is the page shows the course wise/Batch Wise student Data Report

The screenshot shows a web-based application for managing student data. The header features a logo for 'Splendid Way Higher Education Institute' with a graduation cap icon, and navigation links for 'Contact', 'Support', a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains a vertical menu with icons for Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report (which is highlighted in green), and Setting/Logout.

The main content area is titled 'Dashboard/Report/Student Data Report' and 'Student Data Report'. It includes dropdown menus for 'Course Id' (set to CITF1) and 'Batch Id' (set to CITF1-23.1), and a 'Search' button. Below these are two tables. The first table displays student details:

Student ID	First name	Last Name	Date of Birth	Address	Email	Home	Personal	Gender	Parent Name	Parent Home	Parent Personal	Final Qualification	Id Num
SW-S1	vishmi	kaveesha	2/23/1996	34 main road, colombo	Vishmi@gmsail.com	0774852369	0774852369	Female					
SW-S2	sandun	perera	10/5/1999	50 cross street, gampaha	Sandun@gmail.com	0762541789	0762541789	Male					

The second table is partially visible below it. At the bottom right are 'Generate' and 'Cancel' buttons.

Figure 69 Student Data Report Generate Page 1

## No: 62 Interface

Name: Student Data Report Generate Page 2

Description: This is the page shows the course wise student Data Report

The screenshot shows a web application interface for managing student data. The top navigation bar includes the logo of 'Splendid Way Higher Education Institute', contact and support links, a search bar, and a user profile for 'Ravi Perera'. The left sidebar contains a vertical menu with icons for Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report (which is highlighted in green), Setting, and Logout. The main content area displays a table titled 'Student Data Report' with two rows of data. The table columns are: Stud ent ID, First name, Last Nme, Date of Birth, Address, Email, Home, Personal, Gender, Parent Name, Parent Home, Parent Personal, Final Qualification, and Id Num. The data entries are:

Stud ent ID	First name	Last Nme	Date of Birth	Address	Email	Home	Personal	Gender	Parent Name	Parent Home	Parent Personal	Final Qualification	Id Num
SW-S1	vishmi	kaveesha	2/23/1998	34 main road, colombo	Vishmi@gmsail.com	0774852369	0774852369	Female					
SW-S2	sandun	perera	10/5/1999	50 cross street, gampaha	Sandun@gmail.com	0762541789	0762541789	Male					

At the bottom right of the table are 'Generate' and 'Cancel' buttons.

Figure 70 Student Data Report Generate Page 2

## No: 63 Interface

Name: Exam result report Generate Page

Description: This report shows the course-wise/Batch Wise results

The screenshot shows a web application interface for generating exam results. At the top, there is a navigation bar with the logo of 'Splendid Way Higher Education Institute', 'Contact', 'Support', a search bar, and a user profile for 'Amal Basnayake'. On the left, a sidebar menu lists various options: Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report (which is highlighted with a green background), Setting, and Logout. The main content area displays the title 'Dashboard/ Report/Students' / Students'Results' and 'Students' Results Report'. It shows the following configuration details:

- Course:** Certificate In English
- Batch:** CEF1-23.1
- Exam Name:** Eng-MID Exam
- Exam Code:** CEF1-MID 23.1

A 'Search' button is located to the right of these fields. Below this, a table is displayed with the following data:

Student ID	Grade
SW-S000001	A
SW-S000002	B
SW-S000003	C
SW-S000004	A
SW-S000005	B

At the bottom right of the table are two buttons: 'Generate' and 'Cancel'.

Figure 71 Exam result report Generate Page

## No: 64 Interface

Name: Exam Schedule report Generate Page

Description: This report shows the Date Wise exam schedules

The screenshot shows a web application interface for managing exams. The header features the logo of 'Splendid Way Higher Education Institute' and navigation links for 'Contact', 'Support', and a user profile for 'Ravi Perera'. A search bar and a 'Logout' button are also present.

The left sidebar contains a vertical menu with icons and labels: Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report (which is highlighted in green), Setting, and Logout.

The main content area is titled 'Dashboard/Report/Exam Schedule Report' and 'Exam Schedule Report'. It includes a dropdown for 'Course Id' set to 'CITF1', and date pickers for 'From Date' (12/05/2023) and 'To Date'. A 'Search' button is located next to the date fields.

A table displays the exam schedule details:

Exam Schedule	Name	Type	Date	Start Time	End Time	Location	Exam Status
CITF1-MID 23.1	IT-MID Exam	MID	6/8/2023	10:00	12:00	Hall1	
CITF-FINAL 23.1	IT-FINAL Exam	FINAL	6/10/2023	10:00	12:00	Hall1	Canceled

Figure 72 Exam Schedule report Generate Page

## No: 65 Interface

Name: Student Attendance report Generate Page

Description: This report shows the Date Wise Student attendance

Splendid Way Higher Education Institute

Contact      Support

Ravi Perera

Dashboard

Registration

Courses

Profile

Schedule

Results

Attendance

Feedback

Message

Report

Setting

Logout

Dashboard/Report/Student Attendance Report

Student Attendance Report

Course Id : CITF1

Batch Id :

From Date : 12/05/2023

To Date :

P : Present    A : Absent    C : Cancel

Student ID	01/10/2023	08/10/2023	15/10/2023	22/10/2023	29/10/2023
SW-S000001	P	C	A	P	P
SW-S000002	P	C	A	P	P
SW-S000003	P	C	P	P	P
SW-S000004	P	C	P	P	P
SW-S000005	P	C	P	P	P

Generate      Cancel

Figure 73 Student Attendance report Generate Page

## No: 66 Interface

Name: Income report Generate Page

Description: This report shows the Monthly income Report

The screenshot shows a web application interface for generating an income report. On the left, there is a vertical sidebar with icons and labels for various functions: Dashboard, Registration, Courses, Profile, Schedule, Results, Attendance, Feedback, Message, Report (which is highlighted in green), Setting, and Logout. At the top right, there are links for Contact, Support, a search bar, and a user profile for Ravi Perera. The main content area is titled 'Dashboard/Report/Income Report' and contains a section for the 'Income Report'. It includes dropdown menus for 'Payment Description' set to 'Course Fees' and 'Month' set to 'June', with a 'Search' button. Below this is a table showing course fees for June:

Course Name	Received Full Payment
Certificate in English Part Time	100000.00
Certificate in It Full Time	200000.00
Total	300000.00

At the bottom right of the main content area are two buttons: 'Generate' and 'Cancel'.

Figure 74 Income report Generate Page

### **4.3 Database Design**

#### **User**

Primary Key: user\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	User's Username
user_password	Text	8	User's password
fname	Text	30	User First Name
lname	Text	30	User Last Name
personal_email	Text	50	User Email address
dob	Date	10	Date of birth
id_number	Text	12	User NIC number
no	Text	10	Number of the Address
street	Text	100	Street of the Address
city	Text	30	City of the Address
gender	Text	10	User's Gender
Record Size	300		

*Table 1 User*

#### **Admin**

Primary Key: user\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Admin's Username
description	Text	30	Type of Admin
Record Size	40		

*Table 2 Admin*

## **Student**

Primary Key: user\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
guardian_fname	Text	30	Student guardian first name
guardian_lname	Text	30	Student guardian last name
final_qualification	Text	20	Student final qualification
Record Size	90		

*Table 3 Student*

## **Teacher**

Primary Keys: user\_id, teacher\_specialization

Foreign Key: user\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Teacher's Username
teacher_specialization	Number	10	Teacher's Specialization
Record Size	20		

*Table 4 Teacher*

### **Student\_Course**

Primary Keys: user\_id, course\_id

Foreign Keys: user\_id, course\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
course_id	Text	10	Course Id
register_date	Date	10	Registration date
Record Size	30		

*Table 5 Student\_Course*

### **Course**

Primary Key: course\_id

Foreign Key: user\_id

Field Names	Data type	Data Size	Description
course_id	Text	10	Course number
course_type	Text	20	Course Type
course_description	Text	150	Course Description
couse_name	Text	50	Course Name
course_duration	Number	05	Course duration
course_fee	Number	15	Course fee
user_id	Text	10	Teacher's Username
Record Size	260		

*Table 6 Course*

## **Payment**

Primary key: payment\_id

Field Names	Data type	Data Size	Description
payment_id	Number	5	Payment Id
payment_amount	Number	10	Payment Amount
payment_description	Text	30	Payment Description
Record Size	45		

*Table 7 Payment*

## **Student\_Course\_Payment**

Primary Keys: user\_id, course\_id, payment\_id

Foreign Keys: user\_id, course\_id, payment\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
course_id	Text	10	Course Id
payment_id	Number	5	Payment Id
payment_date	Date	10	Payment Date
Record Size	35		

*Table 8 Student\_Course\_Payment*

## **Student\_Batch**

Primary Keys: user\_id, batch\_id

Foreign Keys: user\_id, batch\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
batch_id	Text	20	Batch Id
Record Size	30		

*Table 9 Student\_Batch*

## **Batch**

Primary Key: batch\_id

Foreign Keys: course\_id, user\_id

Field Names	Data type	Data Size	Description
batch_id	Text	20	Batch Id
batch_description	Text	100	Batch description
course_id	Text	10	Course Id
batch_strat_date	Date	10	Batch Start Date
batch_end_date	Date	10	Batch End Date
user_id	Text	10	Teacher's Username
Record Size	160		

*Table 10 Batch*

### **Student\_ExamSchedule**

Primary Keys: user\_id, exam\_schedule\_id

Foreign Keys: user\_id, exam\_schedule\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
exam_schedule_id	Text	20	Exam schedule Id
grade	Text	10	Student Exam grade
Record Size	40		

*Table 11 Student\_ExamSchedule*

### **Exam**

Primary Key: exam\_id

Foreign Key: course\_id

Field Names	Data type	Data Size	Description
exam_id	Text	20	Exam Id
exam_name	Text	50	Exam name
exam_type	Text	10	Exam Type
exam_fee	Number	10	Exam Fee
course_id	Text	10	Course Id
Record Size	100		

*Table 12 Exam*

## **RepeatExamPayment**

Primary Key: repeat\_payment\_id

Field Names	Data type	Data Size	Description
repeat_payment_id	Number	5	Repeat Payment Id
p_amount	Number	10	Payment Amount
p_description	Text	10	Payment Details
Record Size	25		

*Table 13 RepeatExamPayment*

## **Student\_ExamSchedule\_RepeatExamPayment**

Primary Keys: repeat\_payment\_id, user\_id, exam\_shedule\_id

Foreign Keys: repeat\_payment\_id, user\_id, exam\_shedule\_id

Field Names	Data type	Data Size	Description
repeat_payment_id	Number	5	Repeat Payment Id
user_id	Text	10	Student's Username
exam_shedule_id	Text	20	Exam Schedule Id
p_date	Date	10	Payment Date
Record Size	45		

*Table 14 Student\_ExamSchedule\_RepeatExamPayment*

### **Exam\_Schedule**

Primary Key: exam\_schedule\_id

Foreign Keys: batch\_id, exam\_id

Field Names	Data type	Data Size	Description
exam_schedule_id	Text	20	Exam schedule Id
exam_name	Text	30	Exam name
exam_type	Text	30	Exam type
exam_start_time	Time	5	Exam start date
exam_end_time	Time	5	Exam end date
exam_date	Date	10	Exam date
exam_status	Text	20	Exam Status
batch_id	Text	20	Batch Id
exam_id	Text	20	Exam Id
Record Size	160		

*Table 15 Exam\_Schedule*

### **Course\_Schedule**

Primary Key: course\_schedule\_id

Foreign Key: batch\_id

Field Names	Data type	Data Size	Description
course_schedule_id	Text	20	Course schedule Id
schedule_name	Text	30	Schedule name
start_time	Time	5	Course start time
end_time	Time	5	Course end time
week_date	Date	10	Course Dates
schedule_status	Text	20	Course Schedule Status
batch_id	Text	20	Batch Id
Record Size	110		

*Table 16 Course\_Schedule*

### **Student\_CourseSchedule**

Primary Keys: course\_schedule\_id, user\_id

Foreign Keys: course\_schedule\_id, user\_id

Field Names	Data type	Data Size	Description
course_schedule_id	Text	20	Course schedule Id
user_id	Text	10	Student's Username
time	Time	5	Student attend time
attend_date	Date	10	Student attend date
status	Text	10	Student attendance status
Record Size	55		

*Table 17 Student\_CourseSchedule*

### **Feedback**

Primary Key: feedback\_id

Foreign Key: user\_id

Field Names	Data type	Data Size	Description
feedback_id	Number	5	Feedback Id
feedback_rating	Text	5	Feedback rating
feedback_comment	Text	150	Feedback comment
feedback_date	Date	10	Feedback timestamp
user_id	Text	10	Student's/ Teacher's Username
Record Size	180		

*Table 18 Feedback*

## **Message**

Primary Key: message\_id

Foreign Key: user\_id

Field Names	Data type	Data Size	Description
message_id	Number	10	Message Id
content	Text	150	Message content
message_date	Date	10	Message Date
user_id	Text	10	Admin's Username
Record Size		180	

*Table 19 Message*

## **CourseWork**

Primary Key: coursework\_id

Foreign Keys: batch\_id, user\_id

Field Names	Data type	Data Size	Description
coursework_id	Number	5	Coursework Id
coursework_content	Text	200	Coursework content
coursework_file	Text	50	Coursework file
date	Date	10	Coursework date
deadline	Date	10	Coursework deadline
batch_id	Text	20	Batch Id
user_id	Text	10	Teacher's Username
Record Size		305	

*Table 20 CourseWork*

### **Student\_CourseWork**

Primary Keys: user\_id, coursework\_id

Foreign Keys: user\_id, coursework\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
coursework_id	Number	5	Coursework number
uploaded_file	Text	50	Student Coursework uploaded file
uploaded_content	Text	200	Student Coursework uploaded content
coursework_grade	Text	5	Coursework Grade
coursework_feedback	Text	150	Coursework feedback
uploaded_date	Date	10	Student Coursework uploaded date
Record Size	430		

*Table 21 Student\_CourseWork*

### **User Mobile**

Primary Keys: user\_id, mobile

Foreign Key: user\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	User's Username
mobile	Number	10	User's Mobile Number
Record Size	20		

*Table 22 UserMobile*

### **Student Guardian Mobile**

Primary Keys: user\_id, guardian\_mobile

Foreign Key: user\_id

Field Names	Data type	Data Size	Description
user_id	Text	10	Student's Username
guardian_mobile	Number	10	Student's Guardian Mobile Number
Record Size	20		

*Table 23 Student Guardian Mobile*

### **ExamSchedule Location**

Primary Keys: exam\_shedule\_id, exam\_location

Foreign Key: exam\_shedule\_id

Field Names	Data type	Data Size	Description
exam_shedule_id	Text	10	Exam schedule Id
exam_location	Text	20	Exam Location
Record Size	30		

*Table 24 ExamSchedule Location*

## 4.4 Report Layout Design

### No: 01 Report Layout

Name: Individual Student's Attendance summary report

Description: This is the Student's Attendance summary report of one student

	<b>Spelendid Way Higher Educational Institute</b>													
Katana,Negombo														
<b><u>Student's Attendance Report</u></b>														
Course	: Certificate In IT	Printed By : SW-A00002												
Batch	: CITF1-23.1	Printed Date : 12/06/2023 11:20												
Student ID	: SW-5000002	P: Present												
Name	: Vishmi Kaveesha	A: Absent												
		C : Cancel												
<table border="1"><thead><tr><th>Date</th><th>Status</th></tr></thead><tbody><tr><td>01/06/2023</td><td>P</td></tr><tr><td>08/06/2023</td><td>A</td></tr><tr><td>15/06/2023</td><td>P</td></tr><tr><td>22/06/2023</td><td>P</td></tr><tr><td>29/06/2023</td><td>C</td></tr></tbody></table>			Date	Status	01/06/2023	P	08/06/2023	A	15/06/2023	P	22/06/2023	P	29/06/2023	C
Date	Status													
01/06/2023	P													
08/06/2023	A													
15/06/2023	P													
22/06/2023	P													
29/06/2023	C													

Figure 75 Individual Student's Attendance summary report

## No: 02 Report Layout

Name: Individual Student's Results summary report

Description: This is the Student's Results summary report of one student

	<b>Spelendid Way Higher Educational Institute</b> Katana,Negombo										
<b><u>Student's Results Report</u></b>											
Course	: Certificate In IT	Printed By : SW-A00002									
Batch	: CITF1-23.1	Printed Date : 12/06/2023 11:20									
Student ID	: SW-5000002										
Name	: Vishmi Kaveesha										
<table border="1"><thead><tr><th>Exam Code</th><th>Exam Name</th><th>Grade</th></tr></thead><tbody><tr><td>CITF1-MID 23.1</td><td>IT-MID Exam</td><td>A</td></tr><tr><td>CITF-FINAL 23.1</td><td>IT-FINAL Exam</td><td>B</td></tr></tbody></table>			Exam Code	Exam Name	Grade	CITF1-MID 23.1	IT-MID Exam	A	CITF-FINAL 23.1	IT-FINAL Exam	B
Exam Code	Exam Name	Grade									
CITF1-MID 23.1	IT-MID Exam	A									
CITF-FINAL 23.1	IT-FINAL Exam	B									

Figure 76 Individual Student's Results summary report

### No: 03 Report Layout

Name: Repeat Exam Payment Receipt

Description: This is the Repeat Exam Payment Receipt report of one student


<b>Spelendid Way Higher Educational Institute</b>
<b>Katana,Negombo</b>
Payment Num: 2
Issuing Date : 13/06/2023 12:34
Student ID : SW-S000002
Name : Vishmi Kaveesha
Description : IT MID Repeate Exam (CITF1-RMID 23.1)
Amount : 800:00 RS
Total : <u>800:00 RS</u>
<b>Thank You!!</b>

Figure 77 Repeat Exam Payment Receipt

## No: 04 Report Layout

Name: Teacher's Course Schedule report

Description: This is the Teacher's Course Schedule report of one teacher

	<b>Spelendid Way Higher Educational Institute</b> Katana, Negombo																		
<b><u>Teacher's Course Schedule Report</u></b>																			
Course	= Certificate In English	Printed By : SW-A00002																	
Batch	: CEF1-23.1	Printed Date : 12/06/2023 11:20																	
Student ID	: SW-T000002																		
Name	: Amal Basnayake																		
<table border="1"><thead><tr><th>Batch</th><th>Start Time</th><th>End Time</th><th>Date</th><th>Status</th></tr></thead><tbody><tr><td>CEF1-23.1</td><td>10:00</td><td>12:00</td><td>01/06/2023</td><td></td></tr><tr><td>CEF1-23.1</td><td>10:00</td><td>12:00</td><td>08/06/2023</td><td>Canceled</td></tr></tbody></table>					Batch	Start Time	End Time	Date	Status	CEF1-23.1	10:00	12:00	01/06/2023		CEF1-23.1	10:00	12:00	08/06/2023	Canceled
Batch	Start Time	End Time	Date	Status															
CEF1-23.1	10:00	12:00	01/06/2023																
CEF1-23.1	10:00	12:00	08/06/2023	Canceled															

Figure 78 Teacher's Course Schedule report

## No: 05 Report Layout

Name: Students' Results report

Description: This is the Students' Results report of one teacher

	<b>Spelendid Way Higher Educational Institute</b>													
Katana, Negombo														
<b><u>Students' Results Report</u></b>														
Course	= Certificate In English	Printed By : SW-A00002												
Batch	: CEF1-23.1	Printed Date : 12/06/2023 11:20												
Student ID	: SW-T000002													
Name	: Amal Basnayake													
<table border="1"><thead><tr><th>Student ID</th><th>Grade</th></tr></thead><tbody><tr><td>SW-5000001</td><td>A</td></tr><tr><td>SW-5000002</td><td>B</td></tr><tr><td>SW-5000003</td><td>C</td></tr><tr><td>SW-5000004</td><td>A</td></tr><tr><td>SW-5000005</td><td>B</td></tr></tbody></table>			Student ID	Grade	SW-5000001	A	SW-5000002	B	SW-5000003	C	SW-5000004	A	SW-5000005	B
Student ID	Grade													
SW-5000001	A													
SW-5000002	B													
SW-5000003	C													
SW-5000004	A													
SW-5000005	B													

Figure 79 Students' Results report

## No: 06 Report Layout

Name: Exam Schedules report

Description: This is the Exam schedule report of the admin

	<b>Spelendid Way Higher Educational Institute</b> Katana,Negombo																															
<b><u>Exam Schedule Report</u></b>																																
Course	: Certificate In IT				Printed By : SW-A00002																											
Batch	: CITF1-23.1				Printed Date : 12/06/2023 11:20																											
<table border="1"><thead><tr><th>Exam Schedule</th><th>Name</th><th>Type</th><th>Date</th><th>Start Time</th><th>End Time</th><th>Location</th><th>Exam Status</th></tr></thead><tbody><tr><td>CITF1-MID 23.1</td><td>IT-MID Exam</td><td>MId</td><td>6/8/2023</td><td>10:00</td><td>12:00</td><td>Hall1</td><td></td></tr><tr><td>CITF-FINAL 23.1</td><td>IT-FINAL Exam</td><td>FINAL</td><td>6/8/2023</td><td>10:00</td><td>12:00</td><td>Hall1</td><td>Canceled</td></tr></tbody></table>									Exam Schedule	Name	Type	Date	Start Time	End Time	Location	Exam Status	CITF1-MID 23.1	IT-MID Exam	MId	6/8/2023	10:00	12:00	Hall1		CITF-FINAL 23.1	IT-FINAL Exam	FINAL	6/8/2023	10:00	12:00	Hall1	Canceled
Exam Schedule	Name	Type	Date	Start Time	End Time	Location	Exam Status																									
CITF1-MID 23.1	IT-MID Exam	MId	6/8/2023	10:00	12:00	Hall1																										
CITF-FINAL 23.1	IT-FINAL Exam	FINAL	6/8/2023	10:00	12:00	Hall1	Canceled																									

Figure 80 Exam Schedules report

## No: 07 Report Layout

Name: Student Attendance report

Description: This is the Student Attendance report of the admin

	<b>Spelendid Way Higher Educational Institute</b> <b>Katana, Negombo</b>				
<b><u>Student's Attendance Report</u></b>					
Course	: Certificate In English		Printed By : SW-A00002		
Batch	: CEF-23.1		Printed Date : 12/06/2023 11:20		
		P:Present	A:Absent	C:Cancel	
Student ID	01/10/2023	08/10/2023	15/10/2023	22/10/2023	29/10/2023
SW-S000001	P	C	A	P	P
SW-S000002	P	C	A	P	P
SW-S000003	P	C	A	P	P
SW-S000004	P	C	A	P	P
SW-S000005	P	C	A	P	P

Figure 81 Student Attendance report

## No: 08 Report Layout

Name: Students Results report

Description: This is the Student Attendance report of the admin

	<b>Spelendid Way Higher Educational Institute</b> Katana,Negombo													
<b><u>Students Results Report</u></b>														
Course	:	Certificate In IT												
Batch	:	CEF-23.1												
Printed By :	SW-A00002													
Printed Date :	12/06/2023 11:20													
<table border="1"><thead><tr><th>Student ID</th><th>Grade</th></tr></thead><tbody><tr><td>SW-S000001</td><td>A</td></tr><tr><td>SW-S000002</td><td>B</td></tr><tr><td>SW-S000003</td><td>C</td></tr><tr><td>SW-S000004</td><td>A</td></tr><tr><td>SW-S000005</td><td>B</td></tr></tbody></table>			Student ID	Grade	SW-S000001	A	SW-S000002	B	SW-S000003	C	SW-S000004	A	SW-S000005	B
Student ID	Grade													
SW-S000001	A													
SW-S000002	B													
SW-S000003	C													
SW-S000004	A													
SW-S000005	B													

Figure 82 Students Results report

## No: 09 Report Layout

Name: Income report

Description: This is the Monthly Income report of the admin

	<b>Spelendid Way Higher Educational Institute</b> Katana, Negombo									
<b><u>Monthly Income Report</u></b>										
Payment Type	: Course Fees	Printed By : SW-A00002								
Month	: July	Printed Date : 12/06/2023 11:20								
<table border="1"><thead><tr><th>Course Name</th><th>Received Full Payment</th></tr></thead><tbody><tr><td>Certificate in English</td><td>100000.00</td></tr><tr><td>Certificate in IT</td><td>200000.00</td></tr><tr><td>Total for the Month</td><td>300000.00</td></tr></tbody></table>			Course Name	Received Full Payment	Certificate in English	100000.00	Certificate in IT	200000.00	Total for the Month	300000.00
Course Name	Received Full Payment									
Certificate in English	100000.00									
Certificate in IT	200000.00									
Total for the Month	300000.00									

Figure 83 Income report

## No: 10 Report Layout

Name: Course Fees Payment Receipt

Description: This is the Course Fees Payment Receipt to the Student

	
<b>Spelendid Way Higher Educational Institute</b>	
Katana,Negombo	
Payment Num: 2	Issuing Date : 13/06/2023 12:34
Student ID : SW-S000002	
<b>Description</b>	<b>Amount</b>
Course Fee - Certificate In IT	30000.00
Course Fee - Certificate In English	40000.00
Total Amount	<u>70000.00</u>
<b>Thank You!!</b>	

Figure 84 Course Fees Payment Receipt

## No: 11 Report Layout

Name: Student Data Report

Description: This is the Student Data Report Course Wise/Batch Wise

	<b>Spelendid Way Higher Educational Institute</b> Katana,Negombo												
<b><u>Students Data Report</u></b>													
Course : Certificate in IT							Printed By : SW-A00002						
Batch : CITF1-23.1							Printed Date : 12/06/2023 11:20						
<b>No</b>	<b>First Name</b>	<b>Last Name</b>	<b>DOB</b>	<b>Address</b>	<b>Email</b>	<b>Personal Number</b>	<b>Home Number</b>	<b>Gender</b>	<b>Parent Name</b>	<b>Parent Home</b>	<b>Parent Personal</b>	<b>Qualification</b>	<b>Id Num</b>
01	Vishmi	Kaveesha	1999/12/26	20, colombo	<a href="mailto:ab@gmail.com">ab@gmail.com</a>	00000000	121212 12	Female					
02	Supun	Danusha	1999/07/08	50, kandana	<a href="mailto:an@gmail.com">an@gmail.com</a>	11111111	122222 22	Male					
03	Piyath	Perera	2002/10/31	40, Malabe	<a href="mailto:bn@gmail.com">bn@gmail.com</a>	55555555	555555 5	Male					
04	Dinesh	Chandima	2002/06/26	26/A Koswatta	<a href="mailto:cn@gmail.com">cn@gmail.com</a>	10521621 0	445522 155	Male					
05	Sandun	Perera	2000/04/05	85, Borella Rajagiriya	<a href="mailto:dn@gmail.com">dn@gmail.com</a>	52054853 3	211563 22	Male					

Figure 85 Student Data Report

## **Chapter 05 : Conclusion**

Organization Currently using manual system to maintain the student day-to-day operation. So, this educational institution had to face various problems at various times. Therefore, as a solution to that paper-based management system, we proposed a new automated learning management system that can be created using new technology. This web application can help to manage all other tasks from the student registration process. Before creating this management system, we discussed with its manager and gathered the necessary information. Based on the findings, the user interface of this system is designed in such a way that the user can easily understand and manipulate it. Also, using new features and new technology, it has been designed in such a way that it can be handled by the any user and this system is a user-friendly web-based system. Finally, this student management system can be used to manage the institute's operation related student management successfully.

## 5.1 References

- <https://web.csulb.edu/colleges/coe/cecs/dbdesign/dbdesign.php?page=manymany.php#:~:text=The%20many%2Dto%2Dmany%20relationship%20will%20be%20modeled%20with%20an,association%20by%20a%20dotted%20line>
- <https://web.csulb.edu/colleges/coe/cecs/dbdesign/dbdesign.php?page=hobbies.php>
- <https://chat.openai.com/chat>
- <https://github.com/>
- [javatpoint.com/student-management-system](https://javatpoint.com/student-management-system)
- [https://www.researchgate.net/publication/362301918\\_Student\\_Management\\_System\\_-\\_Group\\_Project\\_Report](https://www.researchgate.net/publication/362301918_Student_Management_System_-_Group_Project_Report)
- <https://itsourcecode.com/fyp/student-management-system-project/>

## 5.2 Appendices

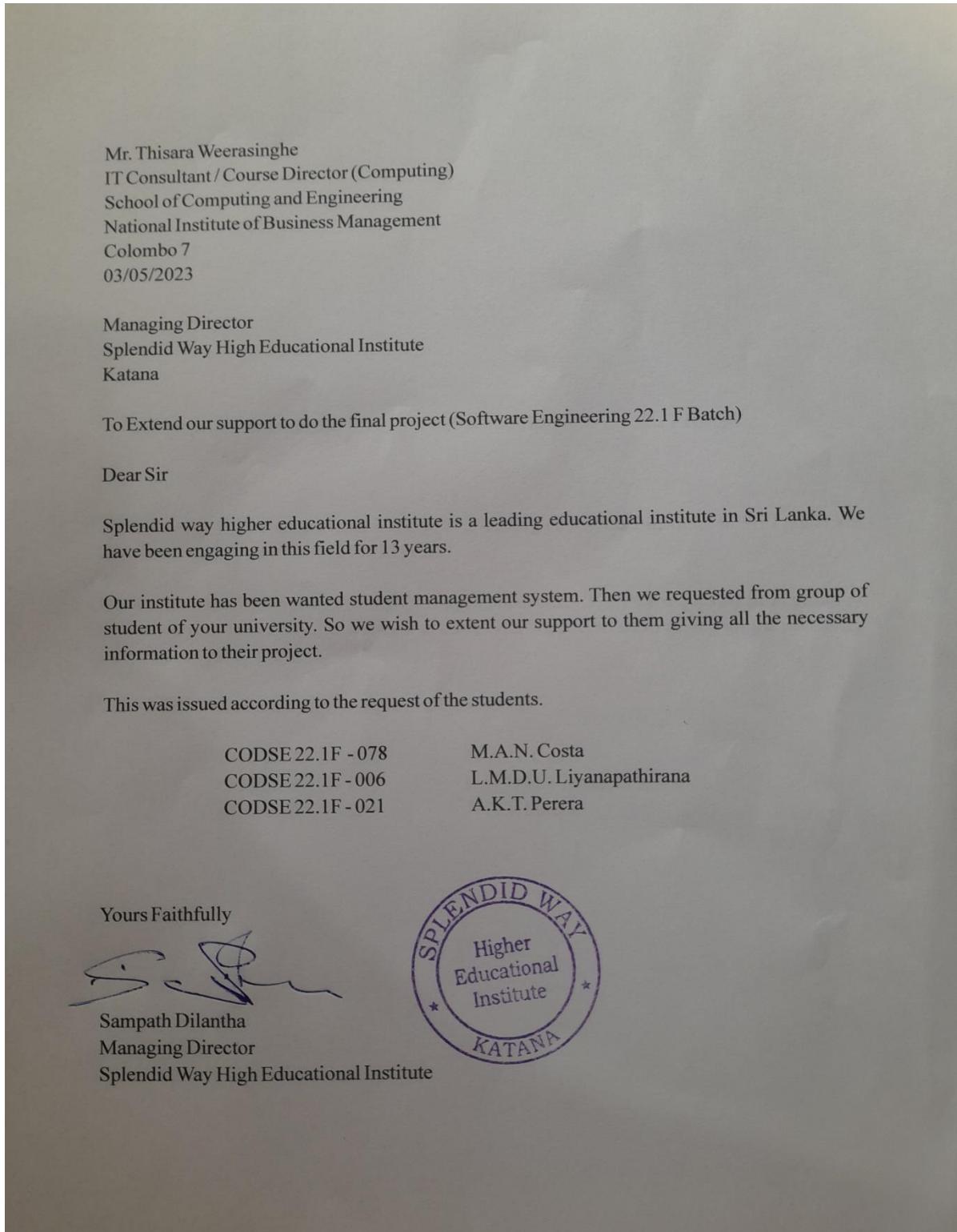


Figure 86 Letter issued by the organization

**Thank You..!**