

Development of DIU Hall Management System

By

Mahedy Hasan

ID: 161-15-849

MD. Ebrahim Hossain

ID: 161-15-881

MD. Akshibur Rahman

ID: 161-15-885

MD. Shohag Hossain Babu

ID:161-15-904

This Report Presentation in Partial Fulfillment of the Requirements for the Degree of Bachelor of Science Computer Science and Engineering

Supervised By

Mr.Ohidujjaman

Senior Lecturer

Department of CSE

Daffodil International University

Co-Supervised By

Zarin Tasnim Shejuti

Lecturer

Department of CSE

Daffodil International University



DAFFODIL INTERNATIONAL UNIVERSITY

DHAKA, BANGLADESH

15 OCTOBER 2020

APPROVAL

This project titled “**DEVELOPMENT OF DIU HALL MANAGEMENT SYSTEM**” submitted by Mahedy Hasan, ID: 161-15-849, MD. Ebrahim Hossain, ID: 161-15-881, MD. Akshibur Rahman Emon, ID: 161-15-885, MD. Shohag Hossain Babu, ID: 161-15-904 to the Department of Computer Science and Engineering, Daffodil International University has been accepted as satisfactory for the partial fulfillment of the requirements for the degree of Bachelor of Science in Computer Science and Engineering and approved as to its style and contents. The presentation has been held on October 1,2020

BOARD OF EXAMINERS

Dr. Syed Akhter Hossain

Chairman

Professor and Head

Department of Computer Science and Engineering

Faculty of Science and Information Technology

Daffodil International University

Dr. S M Aminul Haque

Internal Examiner

Associate Professor and Associate Head

Department of Computer Science and Engineering

Faculty of Science & Information Technology

Daffodil International University

Mr. Ohidujjaman

Internal Examiner

Senior Lecturer

Department of Computer Science and Engineering

Faculty of Science & Information Technology

Daffodil International University

DECLARATION

We hereby declare that this project has been done by us under the supervision of Md.Ohidujjaman, Senior Lecturer, Department of CSE, Daffodil International University. We also declare that neither this project nor any part of this project has been submitted elsewhere for the award of nay degree or diploma.

Supervised By:

Mr.Ohidujjaman

Senior Lecturer

Department of CSE

Daffodil International University

Co-Supervised By

Zarin Tasnim Shejuti

Lecturer

Department of CSE

Daffodil International University

Submitted By

Mahedy Hasan

ID:161-15-849

Department of CSE

Daffodil International University

Md. Ebrahim Hossain

ID:161-15-881

Department of CSE

Daffodil International University

Md. Akshibur Rahman

ID:161-15-885

Department of CSE

Daffodil International University

MD.Shohag Hossain Babu

ID:161-15-904

Department of CSE

Daffodil International University

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We would like to thank our entire course mate at Daffodil International University, who took part in this discussion while completing the course work.

Finally, we must acknowledge with due respect the constant support and patience of our parents.

ABSTRACT

The student hall of a university is a main place to student's daily life, so a hall management is a vital part of the university management. But it's a matter of regret that we have no digitalized management system available right now. Here everything controlled manually. That's why authorities and students face a lot of problems. We don't get enough information to allocate a seat of a student in the hall and manage room distribution. We have no digital record of payments of the student. In our current system, we solve our problems manually but we have no strong record, that's why some problem is not solved in time. In this case, we want to propose an online hall management system, which may help the student and authority to some extent.

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CHAPTER 1

INTRODUCTION

1.1 Introduction

The project “Development of Hall Management System for DIU” is an online web-based management system provides a simple, easy and beautiful interface for handling manage.

Traditionally Hall Management/Dormitory uses physically paper for documentation and other works. We want to make the management system easier and make the system comfortable for the uses and Hall authority.

The main objective of the Development of Hall Management for DIU is to manage the details information of old and new students, payments of students, distributing rooms to the students and managing hall programmers using the web portal.

1.2 Objectives

The objectives of the “Development of Hall Management for DIU” are:

- To provide a digital management system for DIU hall.
- To reduce time for solving a problem.
- To increase collaboration of student and authority.
- To digitalize the problem gathering and solving system.
- To digitalize the seat distribution system for DIU hall.

1.3 Expected Outcome

The expected outcomes of the “Development of Hall Management System for DIU” are:

- A complete digital management system for DIU Hall.
- Digital means of storing student information.
- Digitalized and Secure communication with authority and student.
- Reduction of human resource and additional cost of DIU Hall.

CHAPTER 2

BACKGROUND

2.1 Introduction

To completely digitalize a university hall and providing online-based management system.

In this project, every single things will be automated (digital) and total activities will be complete using new technology. In our country, there are several universities. Our university is developing day by day, increasing with a number of students and hall rooms every semester. Our hall management authority faced troubles to share out room for student. Whereas, this was an lengthy procedure, so this spoiling a lot of time, diligent is not always capable to do the better used of the source. While we are living in the moment of technology, we need to apply for solve this problem.

We endeavor to solve the matter by execute a digital system and successfully we have done this. This project will help Hall authorities and students to locate rooms for students.

2.2 Related Work

2.2.1 Dhaka University Hall

Digital world is being digital by using information technology like many web-based automation system. A Web-based Computer Experiment Management System is designed and implemented by Dhaka University.

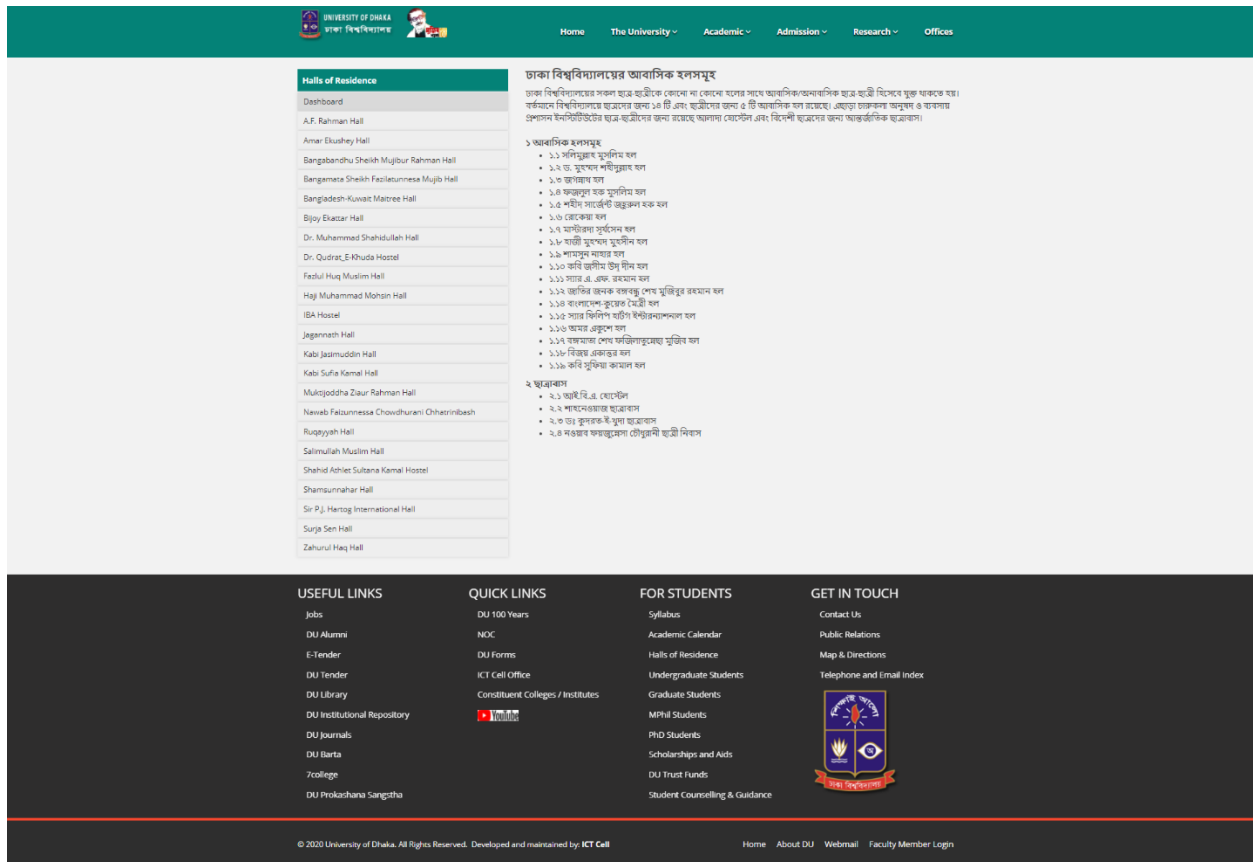


Figure 2.2.1 Home Page of Dhaka University

2.2.2 Shahjalal University Hall

Digital World is being digital by using information technology like many web-based automation system. A Web-based Computer Experimental Management System is designed and implemented by Shahjalal University.

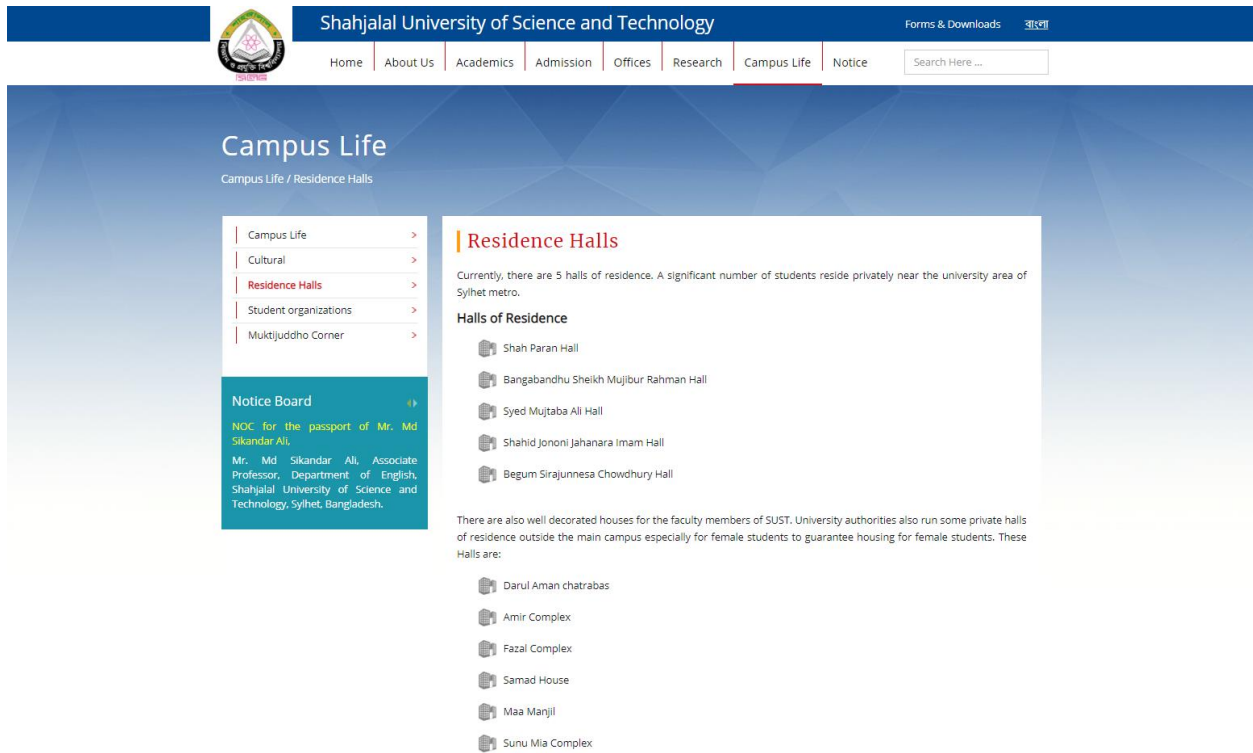


Figure 2.2.2 Home Page of Shahjalal University of Science and Technology

2.2.3 Khulna University of Engineering Technology

Digital world being digital by using information technology like many web-based automation system. A Web-based Computer Experiment Management System is designed and implemented by Khulna University of Information and Technology.



FAZLUL HAQUE HALL

Fazlul Haque Hall is the most oldest and historical hall of Khulna University of Engineering and Technology. The name goes after the famous patriot Sher-e-Bangla A.K.Fazlul Haque. The residential life of this hall offers a wide variety of services designed to support students in their academic and personal success.



The hall is organized around the vital theme of students' engagement-think volunteering, social entrepreneurship, civic spirit, and the like. In this hall, there are forty one residential rooms and few other common rooms. One of the attractions of this hall is its library cum study room named Sejuti where it has a collection of around 2000 local and foreign books. The library is enriched with novel, story, poetry, autobiography and other types of books.

The hall has also got a common room where students can play many indoor games such as table tennis, chess, carom etc. Besides, indoor games competition on various events is also held in every year which imparts entertainment and refreshment among the students. There is also an arrangement for the students to participate in outdoor games. Last year the hall won a fair play trophy in football tournament showing adequate performance. A beautiful garden with numerous types of flowers resides in front of the hall. Students of this hall are very much enthusiastic and energetic.

OFFICE OF THE PROVOST

	Name & Designation	Phone	Email
	Prof. Dr. Md. Habibur Rahman Provost	105, 581	hrahman180Tmath.kuet.ac.bd, hrahman180ATgmail.com
	Dr. Md. Elias Uddin Asst. Provost	8427	elias@le.kuet.ac.bd, elias.ecct.du@gmail.com
	Debasish Kumar Saha Asst. Provost	883	debasish.saha18@yahoo.com




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Figure 2.2.3 Home Page of Khulna University of Engineering and Technology

CHAPTER 3

SOFTWARE REQUIREMENTS SPECIFICATION

3.1 Requirement Collection and Analysis

3.1.1 Functional System Requirement:

This section gives a functional requirement that applicable to the “Development of Hall Management System for DIU Hall”.

These are sub modules in this phase.

- Administrator module
- User Module
- Hostile Module
- Registration Module

3.1.2 Non-Functional System Requirements:

- Performance Requirements
- Security Requirements

3.2 Use Case Modeling

3.2.1 Use Case Diagram

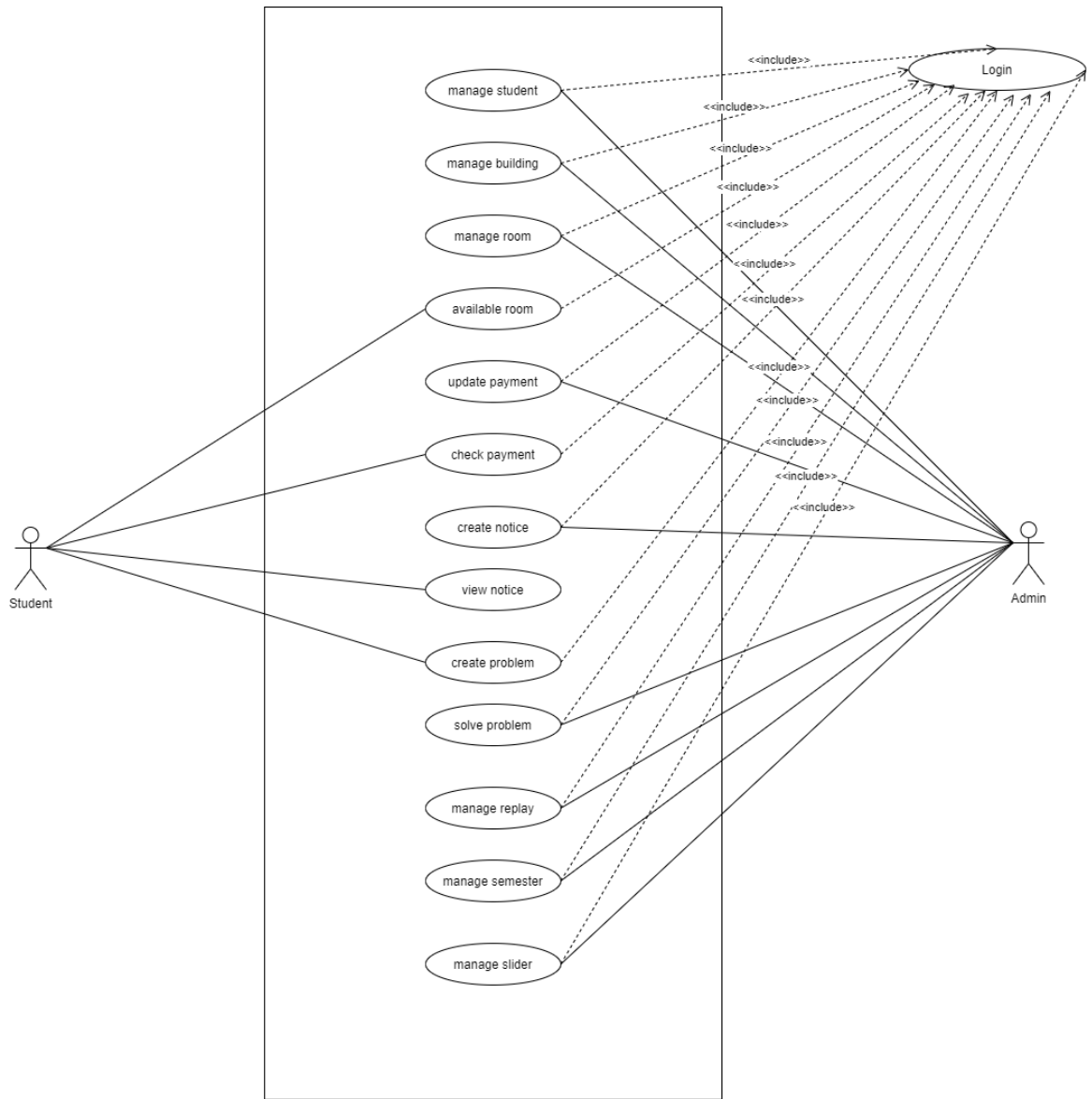


Figure 3.2.1 Use Case Diagram

3.3 Use Case Description

TABLE 3.3.1 Student Manage

Use Case Term	Student Manage
Actors	Admin
Flow of Events	1.Affix to Student 2. Remove Student 3.View Student Details
Substitute Flows	1.No student found 2.Do not add new student 3.Invalid Information
Pre-Condition	Login
Post Condition	Confirm Student, Delete Student

TABLE 3.3.2 Building Manage

Use Case Term	Building Manage
Actors	Admin
Flow of Events	1.Affix to Building 2. Upgrade Building 3. Remove Building
Substitute Flows	1.Chosen the wrong building 2.Building not found
Pre-Condition	Login
Post Condition	Chosen right building

TABLE 3.3.3 Room Manage

Use Case Term	Room Manage
Actors	Admin
Flow of Events	1.Affix on Room 2. Upgrade Room 3.Remove Room
Substitute Flows	1.Chosen false room 2.Delete incorrect room 3.Invalid Input
Pre-Condition	Login
Post Condition	Select the right room

TABLE 3.3.4 Available Room

Use Case Term	Available Room
Actors	Admin, Student
Flow of Events	1.Check Available Room 2.Upgrade Room
Substitute Flows	1.Chosen false room 2.Don't updated available room 3.Invalid Input's
Pre-Condition	Login
Post Condition	Select Building, Select Room

TABLE 3.3.5 Update Payment

Use Case Term	Update Payment
Actors	Admin
Flow of Events	1.Affix to Payment 2.Upgrade Payment 3.Remove Payment
Substitute Flows	1.Update wrong student payment 2.Don't delete running student payment 3.Invalid Input's
Pre-Condition	Login
Post Condition	Select correct student

TABLE 3.3.6 Check Payment

Use Case Term	Check Payment
Actors	Student
Flow of Events	1.Check current payment 2. Check payment list
Substitute Flows	1.Incorrect student id 2.Invalid Input's
Pre-Condition	Login
Post Condition	Enter Login Information

TABLE 3.3.7 Create Notice

Use Case Term	Create Notice
Actors	Admin
Flow of Events	1.Affix to Notice 2.Remove Notice
Substitute Flows	1.Affix wrong notice 2.Invalid Information
Pre-Condition	Login
Post Condition	Enter notice title and description

TABLE 3.3.8 View Notice

Use Case Term	View Notice
Actors	Student
Flow of Events	1.View current Notice 2.View previous Notice
Substitute Flows	1.Select invalid notice 2.Can't view future notice
Pre-Condition	Login
Post Condition	View notice panel

TABLE 3.3.9 Create Problem

Use Case Term	Create Problem
Actors	Student
Flow of Events	1.Affix to Problem 2.Upgrade Problem 3.Remove Problem
Substitute Flow	1.Incorrect student id 2.Invalid Information
Pre-Condition	Login
Post Condition	View problem list, view reply of admin

TABLE 3.3.10 Solve Problem

Use Case Term	Solve Problem
Actors	Admin
Flow of Events	1.Reply
Substitute of Flow	1.Can't ignore problem 2.Invalid reply
Pre-Condition	Login
Post Condition	View problem solving list

TABLE 3.3.11 Apply Manage

Use Case Term	Apply Manage
Actors	Admin
Flow of Events	1.Confirm Apply
Substitute Flows	1.Don't update previous apply information 2.Invalid Information Input
Pre-Condition	Login
Post-Condition	View Appy list

TABLE 3.3.12 Semester Manage

Use Case Term	Semester Manage
Actors	Admin
Flow of Events	1.Affix to Semester 2.Remove Semester 3.Upgrade Semester
Substitute of Flows	1.Affix false semester 2.search wrong semester 3.Invalid Information
Pre-Condition	Login, Create a new semester
Post Condition	View All Semester

3.4 Database Schema

3.4.1 Database Schema

Admins (id, f_name, l_name, email, contact, email_verified_at, password, is_active, remember_token)

Applies (id, st_application, st_id)

Buildings (id, building_name)

Members (id, name, email, position, contact, image)

Notices (id, title, file, created_at, updated_at)

Payments (id, st_id, st_semester, hall_fee)

Problems (id, p_description, st_id)

Replies (id, st_reply, problem_id)

Rooms (id, room_num, quantity, booked, building_id)

Semesters (id, semester_name)

Sliders (id, image)

Students (id, st_id, st_name, email, password, st_dept, image, room_id, semester_id, st_contact, remember_token)

User (id, f_name, l_name, email, password, address, contact)

3.5 Diagram of Entity Relationship

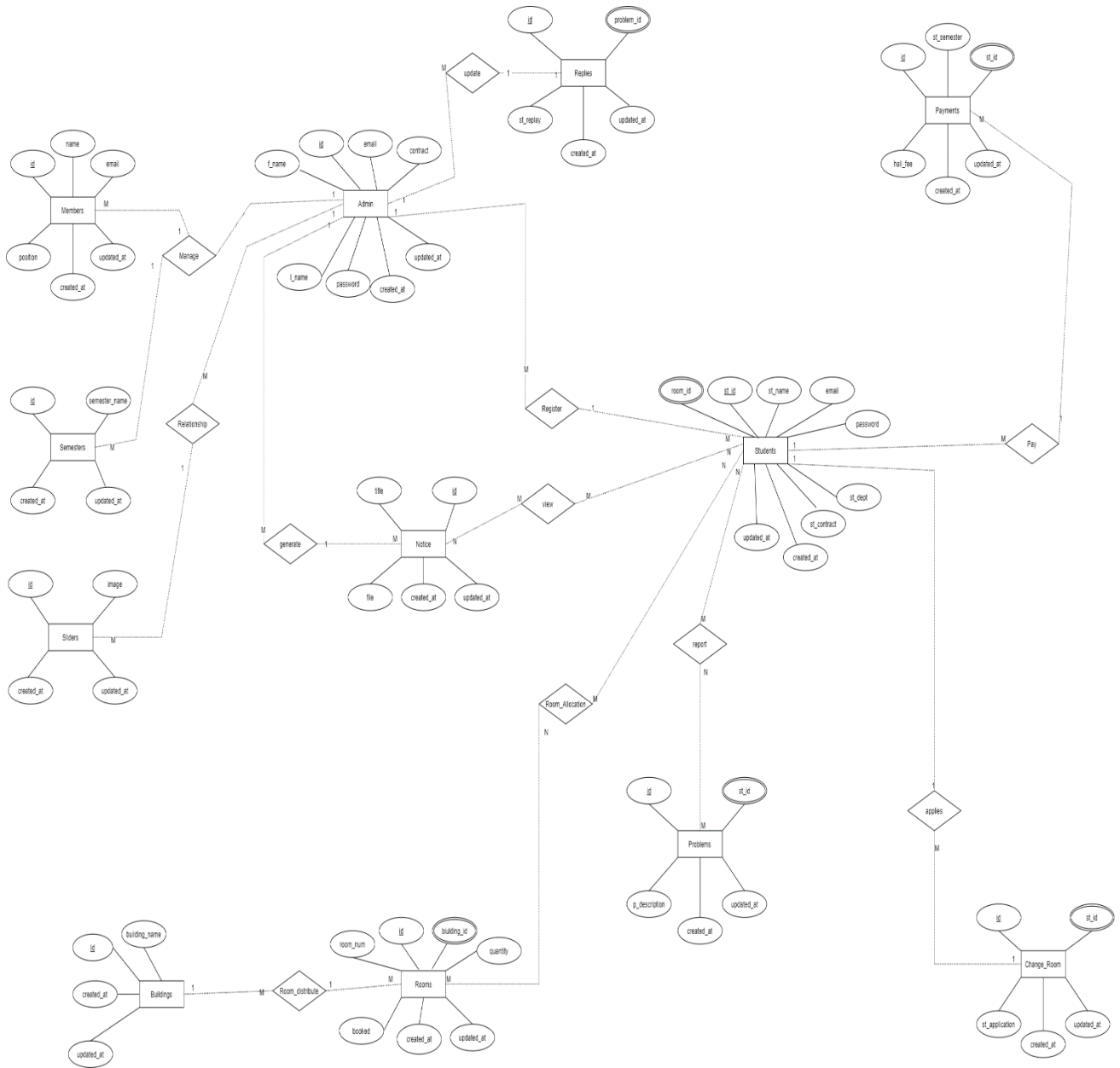


Figure 3.5 Entity Relationship

3.6 Diagram of DFD

3.6.1 Context Level



Figure 3.6.1 DFD Context Level

3.6.2 0 Level Diagram

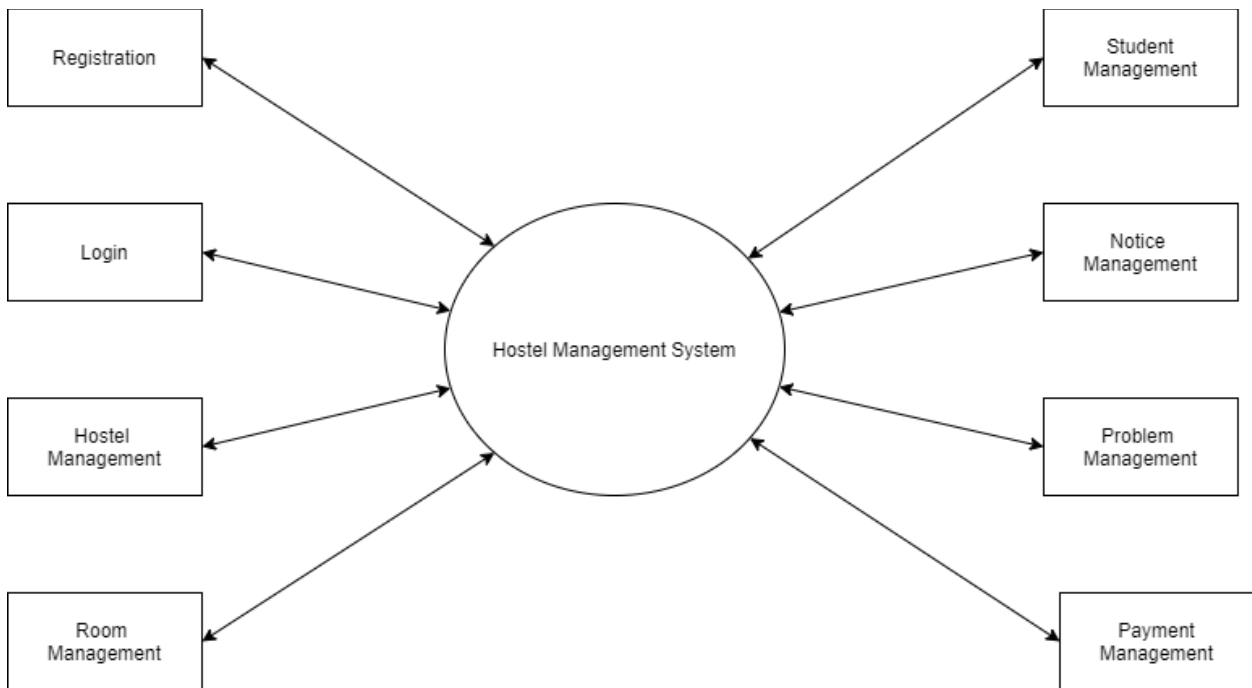


Figure 3.6.2 DFD 0 Level

3.6.3 1 Level Diagram

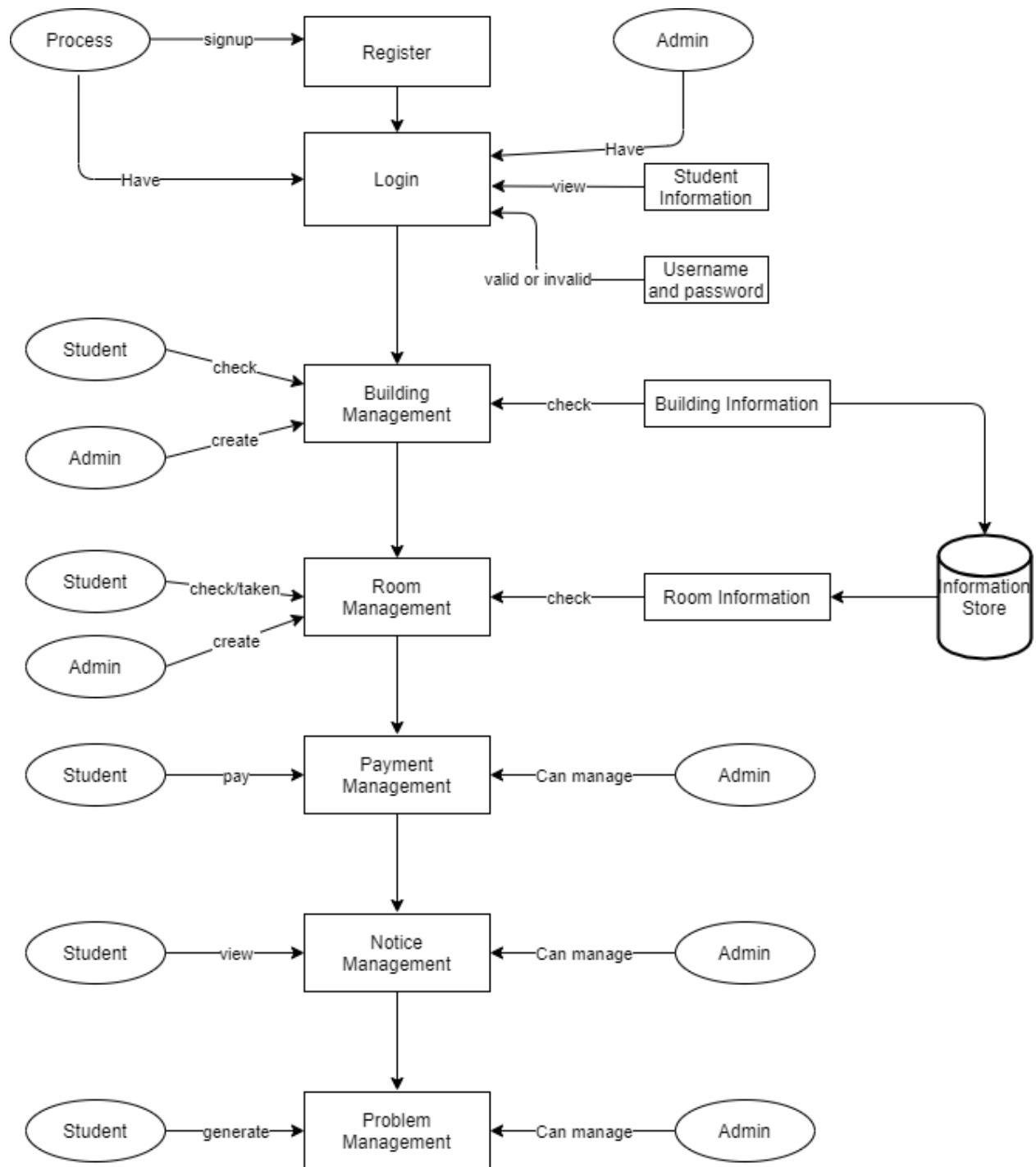


Figure 3.6.3 DFD 1 Level

CHAPTER 4

SYSTEM DESIGN

4.1 Diagram of Activity

4.1.1 Student

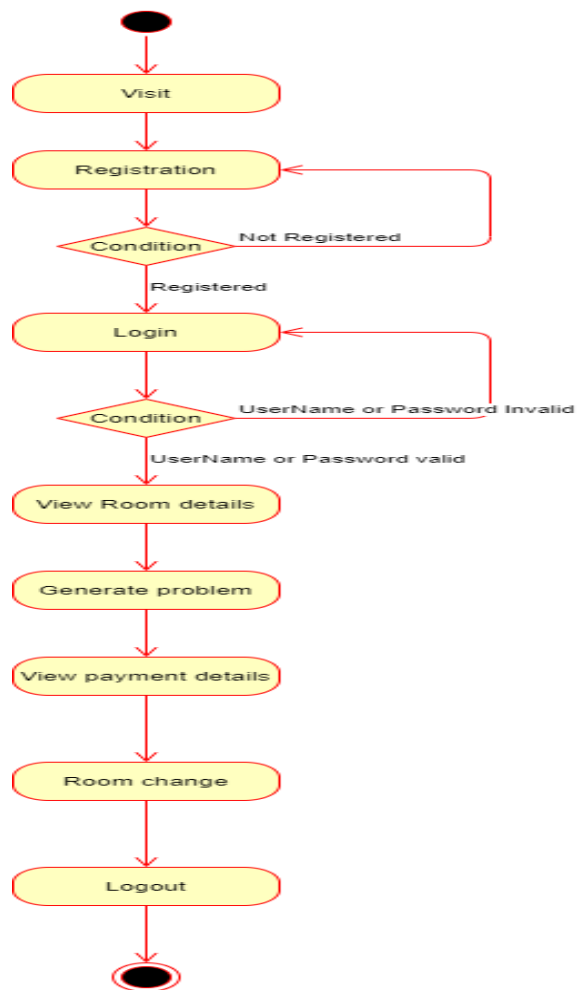


Figure 4.1.1 Student Activity Diagram

4.1.2 Admin

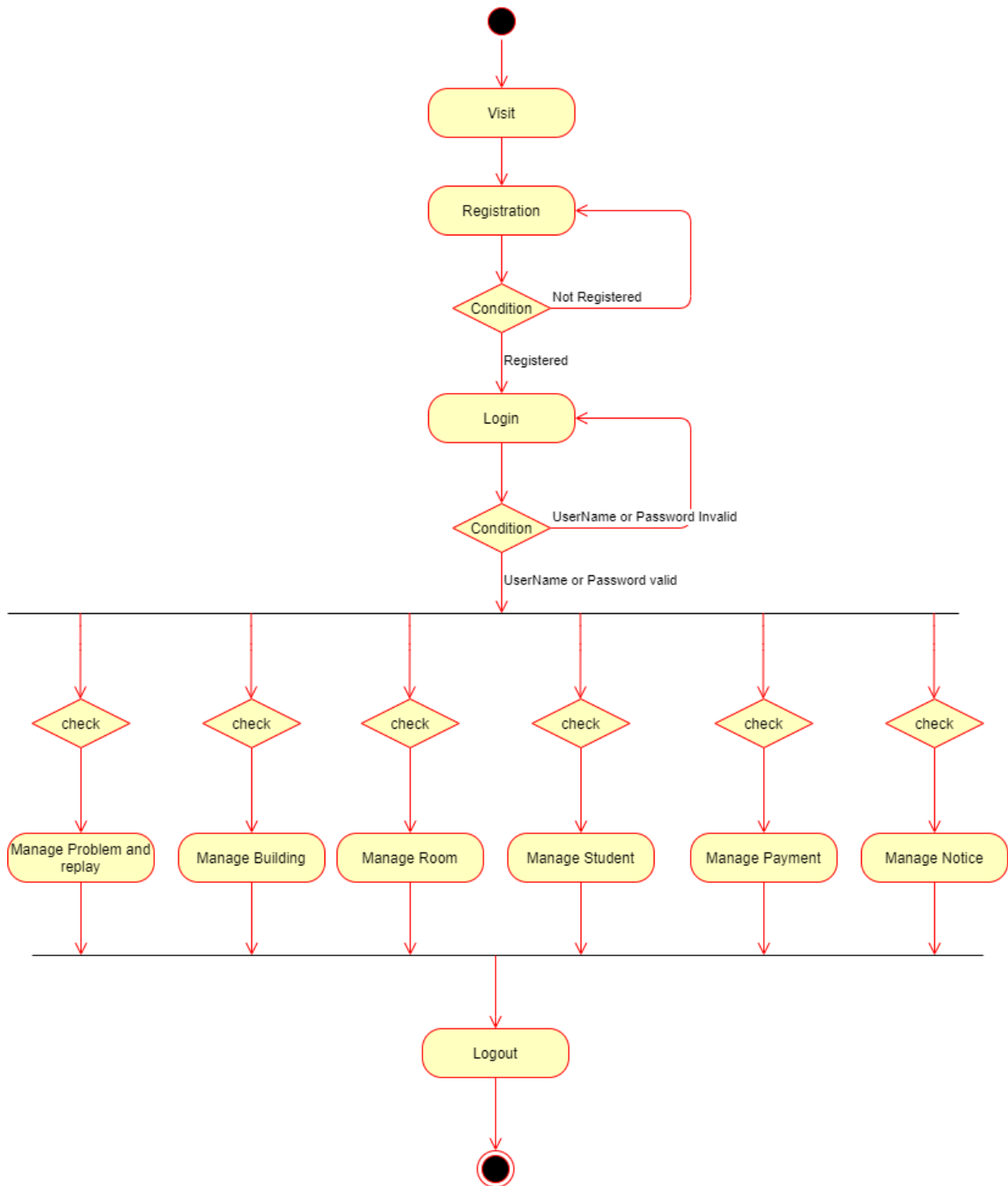


Figure 4.1.2 Admin Activity Diagram

4.2 Sequence Diagram

4.2.1 Login Operation of Admin

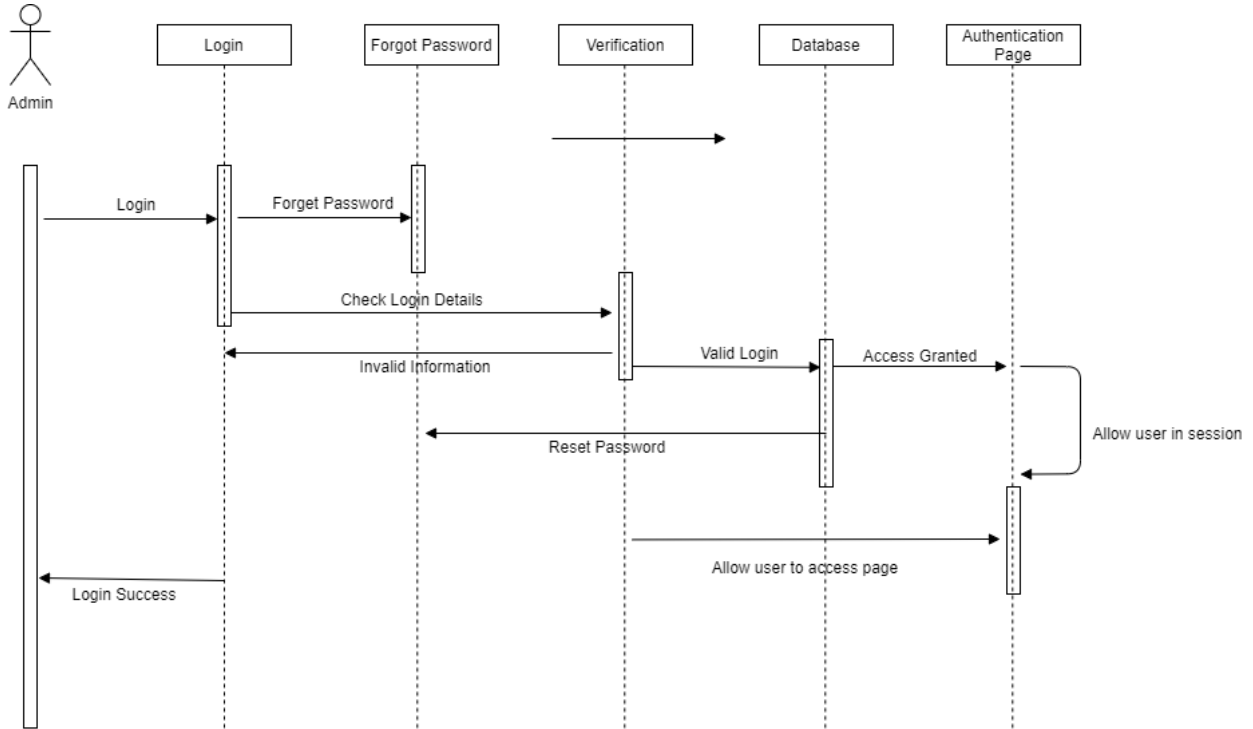


Figure 4.2.1 Login Operation of Admin

4.2.2 Admin Operation Process

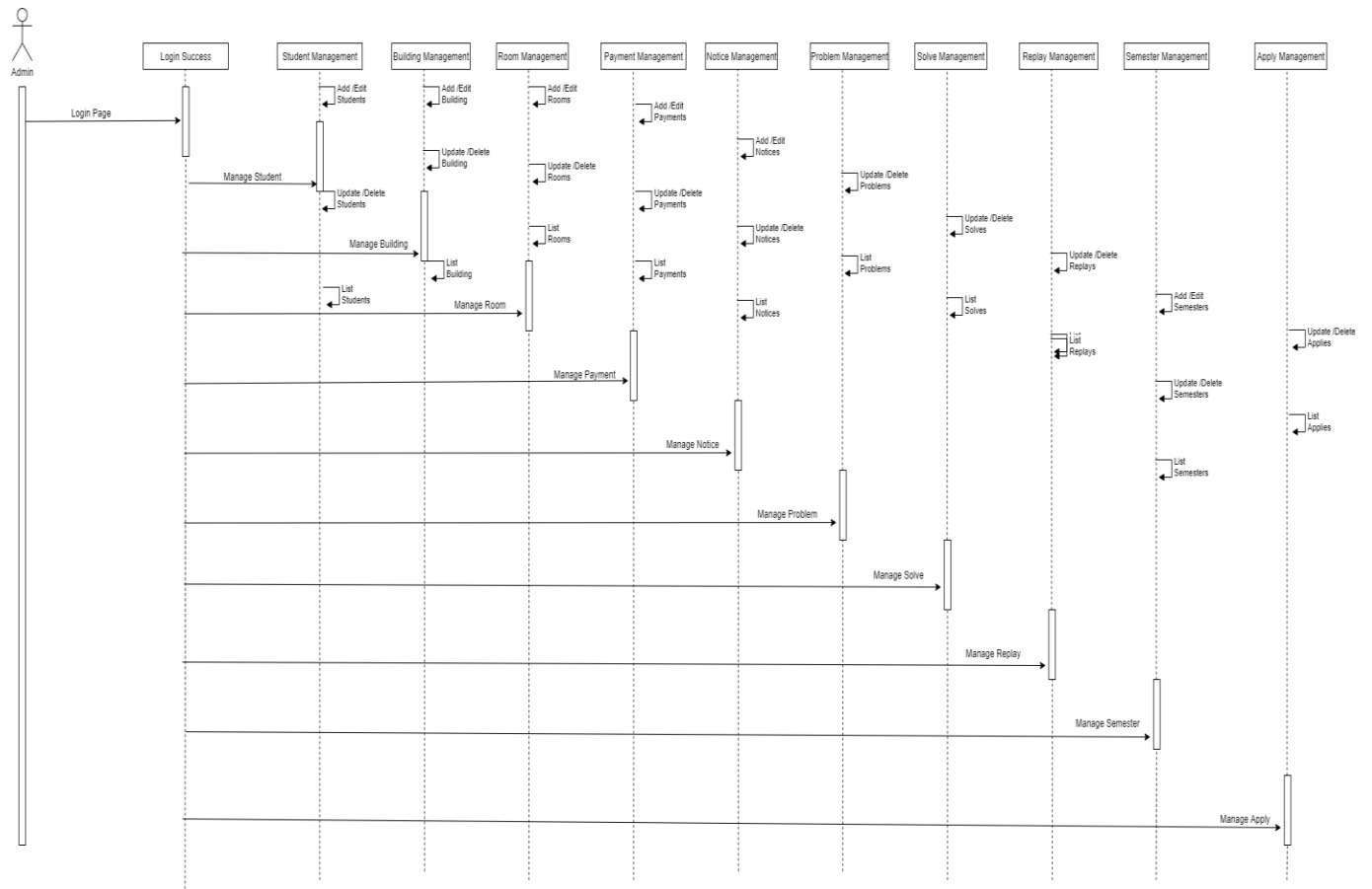


Figure 4.2.2 Admin Operation Process

4.2.3 Student Operation Process

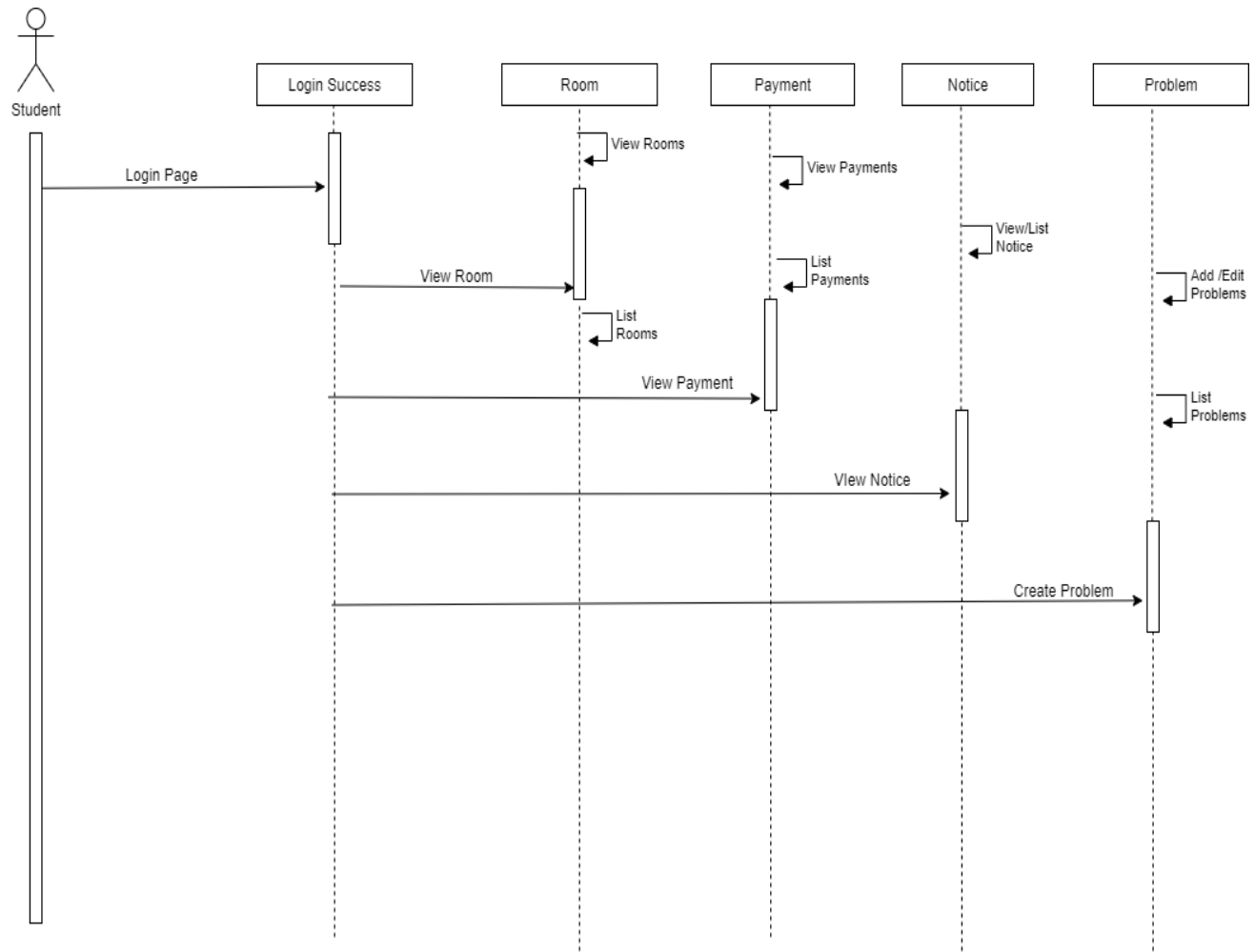


Figure 4.2.3 Student Operation Process

4.3 Front End Design

I use different type of markup language, style sheet, Programming language and some libraries for both front-end and backend.

- HTML 5
- CSS
- Bootstrap4
- JavaScript

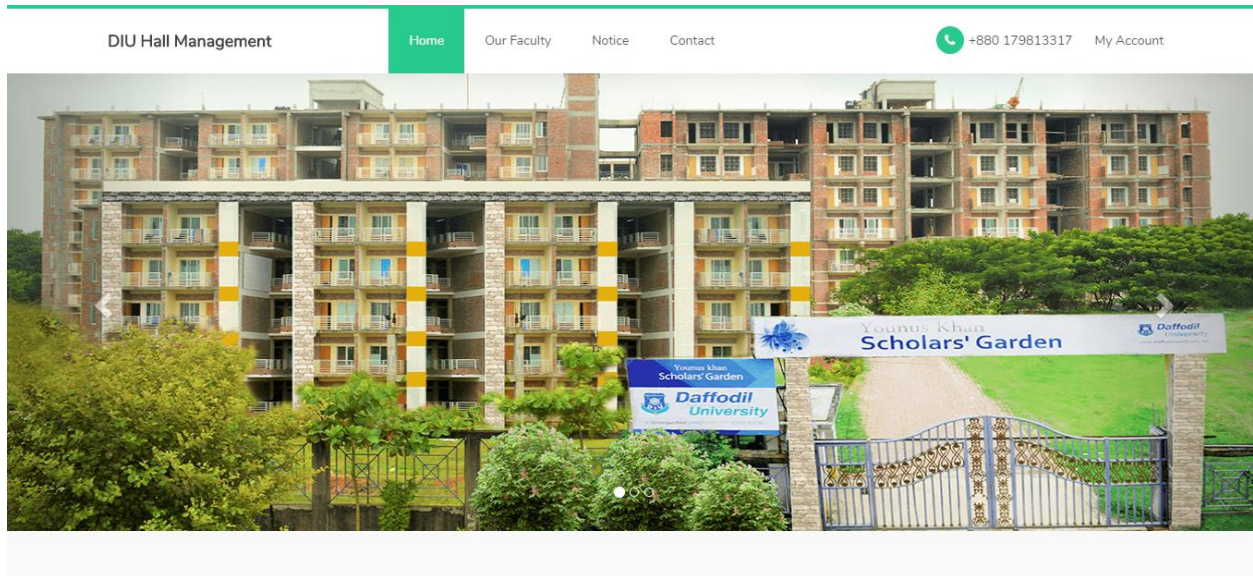


Figure 4.3.5 Home Page

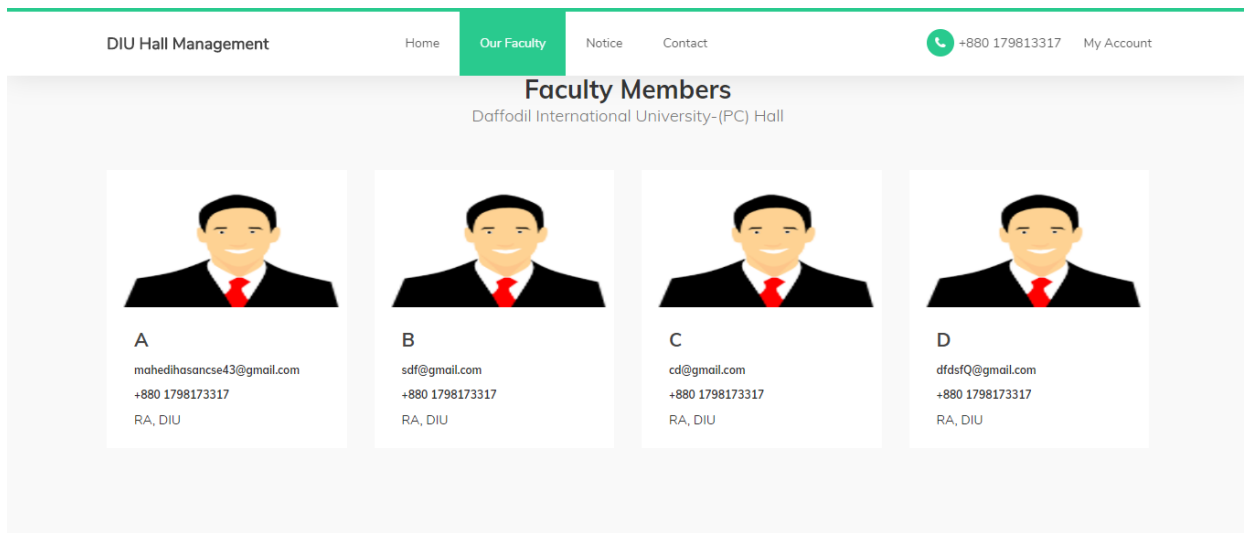


Figure 4.3.6 Our Hall Faculty

DIU Hall Management Home Our Faculty **Notice** Contact +880 179813317 My Account

Notice Area

Upgrade Notice of DIU Hall

Maximum Latest 8 Notices Show:

Notice	Date
AMI	17/08/2020
SPORT	17/08/2020
MEETING	17/08/2020
C PROGRAMMING	17/08/2020
WEB DEVELOPMENT	17/08/2020

[All Notices](#)

Figure 4.3.7 Notice Area

DIU Hall Management Home +880 179813317 My Account

All Notice

Show entries Search:

Date	Title
17/08/2020	ami
17/08/2020	sport
17/08/2020	meeting
17/08/2020	c programming
17/08/2020	web development

Showing 1 to 5 of 5 entries

Previous **1** Next

Figure 4.3.8 All Notice

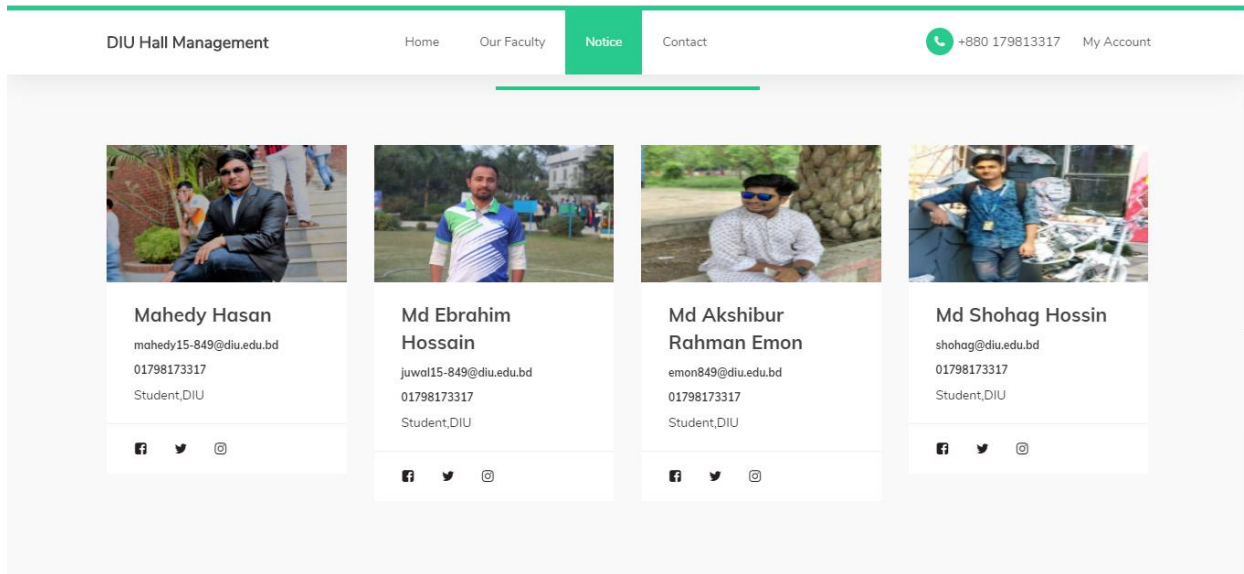


Figure 4.3.9 Developer Team

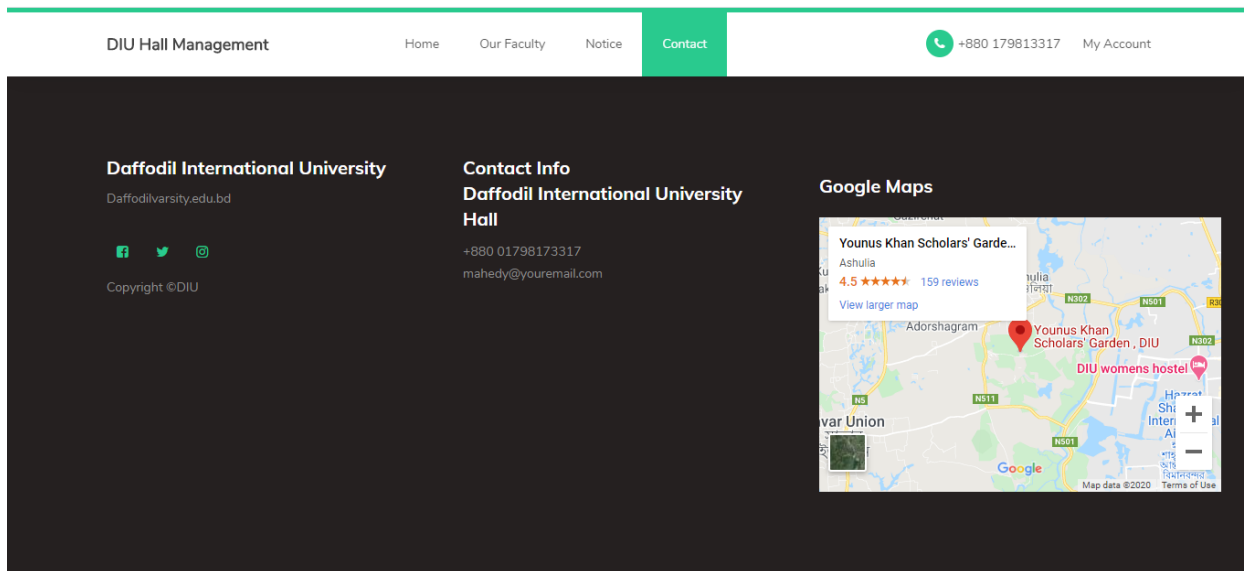


Figure 4.3.10 Contact

4.4 Back End Design

I used some programming languages and frameworks to complete the back-end design of this website.

- PHP
- Laravel Framework
- MySQL

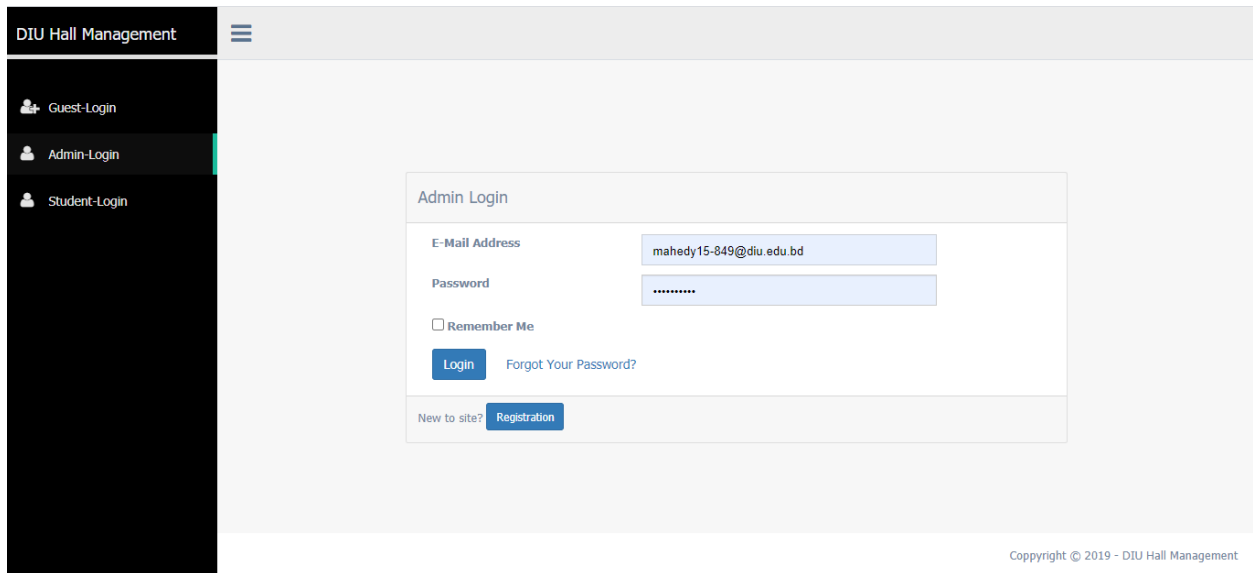


Figure 4.4.4 Login Page

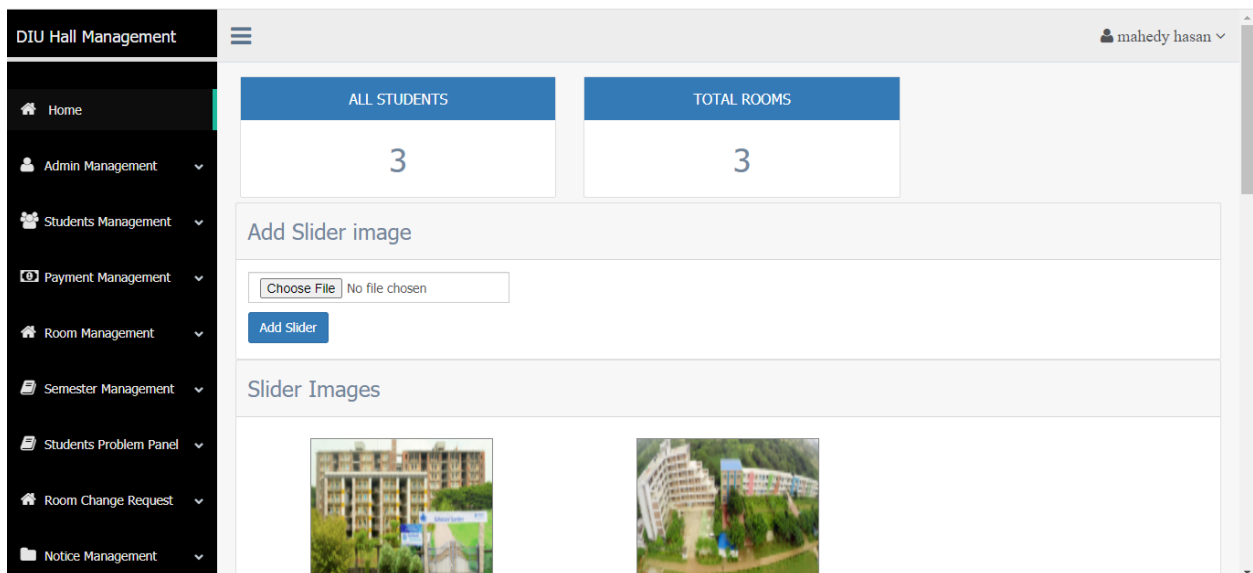


Figure 4.4.5 Admin Dashboard

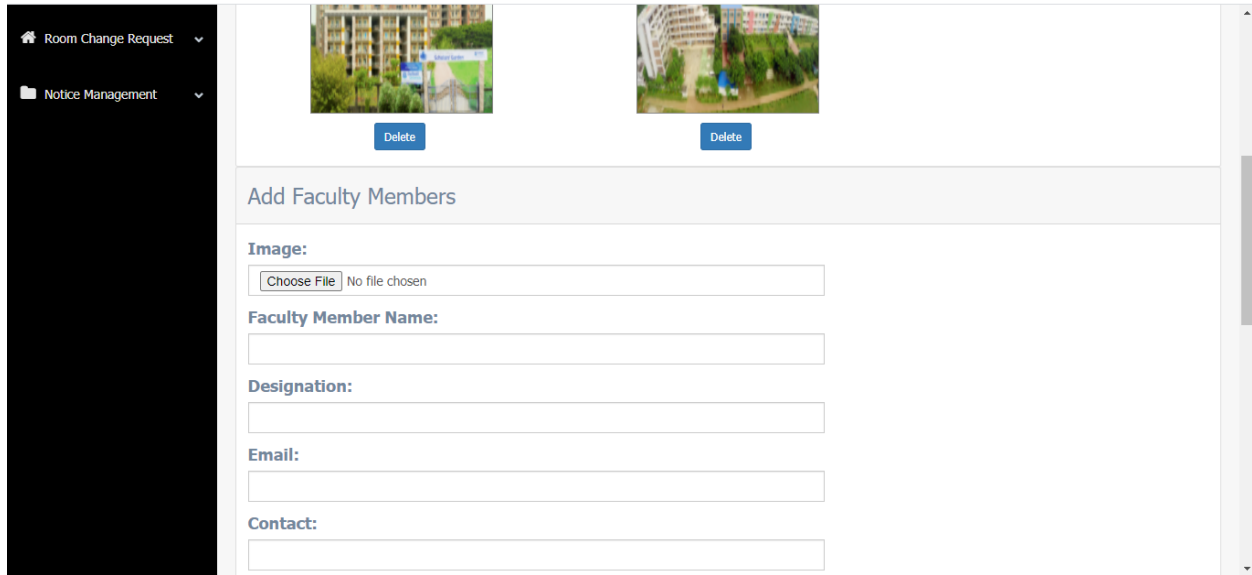


Figure 4.4.6 Add Faculty Members

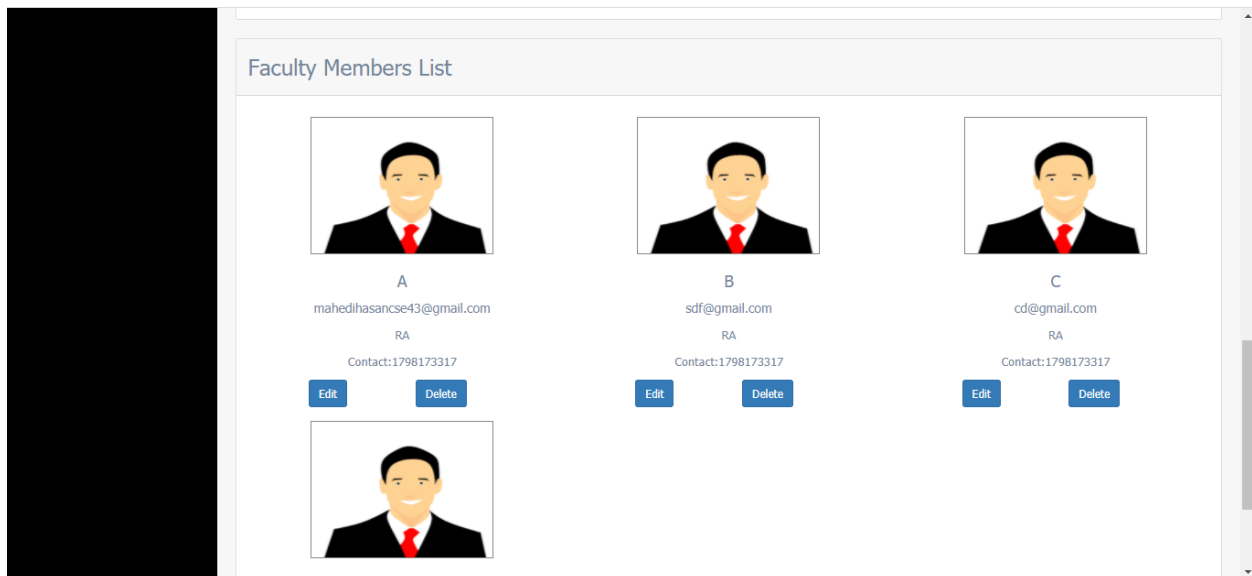


Figure 4.4.7 Faculty Member List

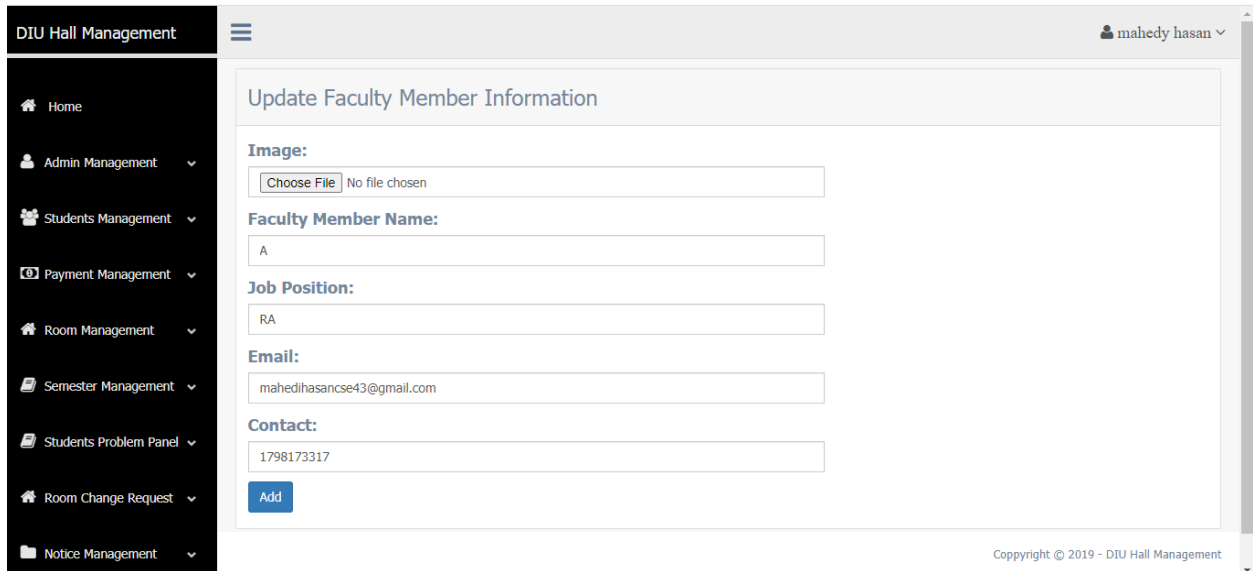


Figure 4.4.8 Update Faculty Member Information

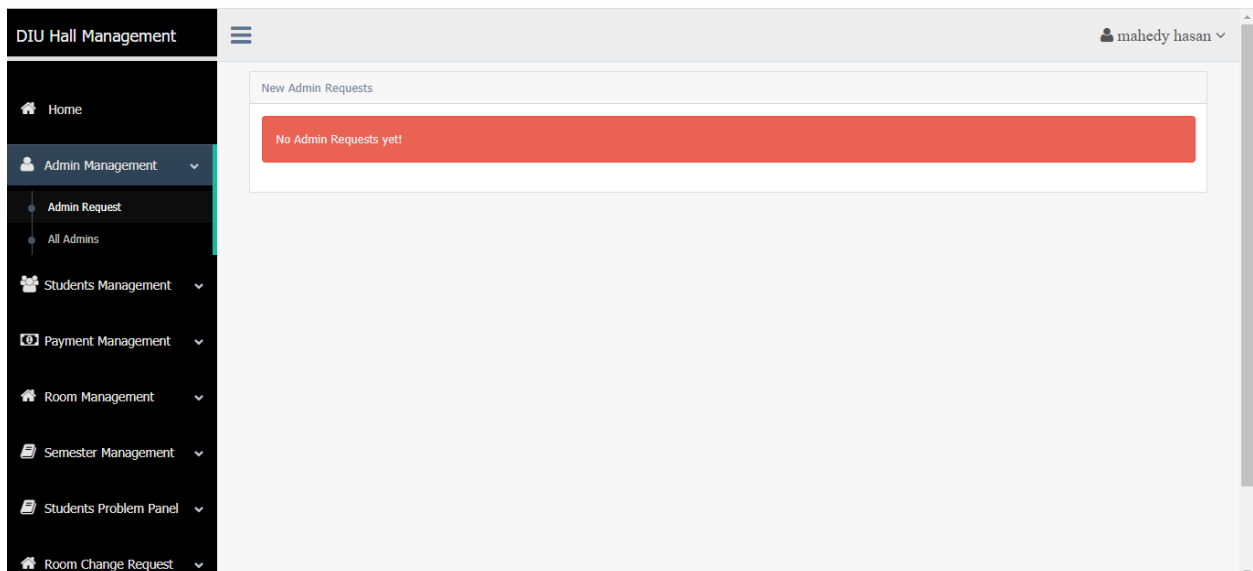


Figure 4.4.9 New Admin Request

DIU Hall Management

maahedy hasan

All Admins

Show 10 entries Search:

Frist Name	Last name Name	Admin Email	Admin contact
mahedy	hasan	mahedy15-849@diu.edu.bd	01798173317

Showing 1 to 1 of 1 entries Previous Next

Figure 4.4.10 All Admin List

Home

Admin Management

Students Management

All Student List

Payment Management

Room Management

Semester Management




Students Problem Panel

Room Change Request

Notice Management

All Student

Show 10 entries Search:

Student Name	Student Email	Student contact	Semester	Room Number	Hall Building Name	Department	Image	Action
emon	emon@gmail.com	01798173317	Fall-20	e220	emon	CSE		Edit Delete
mahedy hasan	mahedihasancse43@gmail.com	01798173317	Fall-20	202	extension-1	CSE		Edit Delete
san ratul	ratul@nitul.com	01798173317	Fall-20	202	extension-1	CSE		Edit Delete

Showing 1 to 3 of 3 entries Previous Next

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Figure 4.4.11 All Student List

DIU Hall Management mahedy hasan

Edit Student Information

Student ID
161-15-885

Student Name
emon

Student Email
emon@gmail.com

Student Department
CSE

Password
.....

Building Name
emon

Semester
Fall-20

Figure 4.4.12 Update Student Information

DIU Hall Management mahedy hasan

Add Student Information

Student ID
mahedy15-849@diu.edu.bd

Student Name
enter the student name

Student Email
enter the student email

Student Department
enter the student department

Password
.....

Building Name
Choose building name

Room Number
Choose Room Number

Figure 4.4.13 Add Student Part-1

Student Email
enter the student email

Student Department
enter the student department

Password
.....

Building Name
Choose building name

Room Number
Choose Room Number

Semester
Choose Semester name

Student Contact
enter the student Contact

Image
Choose File | No file chosen

Submit

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Figure 4.4.14 Add Student Part-2

DIU Hall Management

maahedy hasan

Your Profile

Frist Name	Last name Name	Your Email	Your contact	Action
mahedy	hasan	mahedy15-849@diu.edu.bd	01798173317	Edit

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Figure 4.4.15 Admin Profile

DIU Hall Management

mahedy hasan

Update Admin Information

Admin First Name
mahedy

Admin Last Name
hasan

Admin Email
mahedy15-849@diu.edu.bd

Password
.....

Admin Contact
01798173317

Submit

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Figure 4.4.16 Update Admin Information

DIU Hall Management

mahedy hasan

Add Students Payment

All Student Payments

Show 10 entries Search:

Student ID	Student Semester	Hall Fee	Action
161-15-849	Fall-20	2000	Edit
161-15-849	Summer-2020	2020	Edit
161-15-849	Fall-19	10000	Edit
161-15-885	Fall-19	100	Edit

Showing 1 to 4 of 4 entries Previous Next

Figure 4.4.17 Student Payment List

The screenshot shows the 'Add Student Payment' form within the DIU Hall Management application. The interface includes a dark sidebar with navigation options: Home, Admin Management, Students Management, Payment Management, Room Management, Semester Management, Students Problem Panel, Room Change Request, and Notice Management. The main content area is titled 'Add Student Payment' and contains three input fields: 'Student ID' with a placeholder 'enter the student id', 'Semester Name' with a dropdown menu showing 'choose Semester', and 'Hall Fee' with an empty text box. A blue 'Submit' button is located below the 'Hall Fee' field. The top right corner shows the user 'mahedy hasan' and a copyright notice 'Copyright © 2019 - DIU Hall Management' is at the bottom right.

Figure 4.4.18 Add Student Payment

The screenshot shows the 'Add Building' form within the DIU Hall Management application. The interface is identical to the previous one, with the same sidebar and top navigation. The main content area is titled 'Add Building' and contains a single input field for 'Building Name' with a placeholder 'enter the building name'. A blue 'Submit' button is positioned below the input field. The user 'mahedy hasan' is logged in, and the copyright notice 'Copyright © 2019 - DIU Hall Management' is visible at the bottom right.

Figure 4.4.19 Add Building

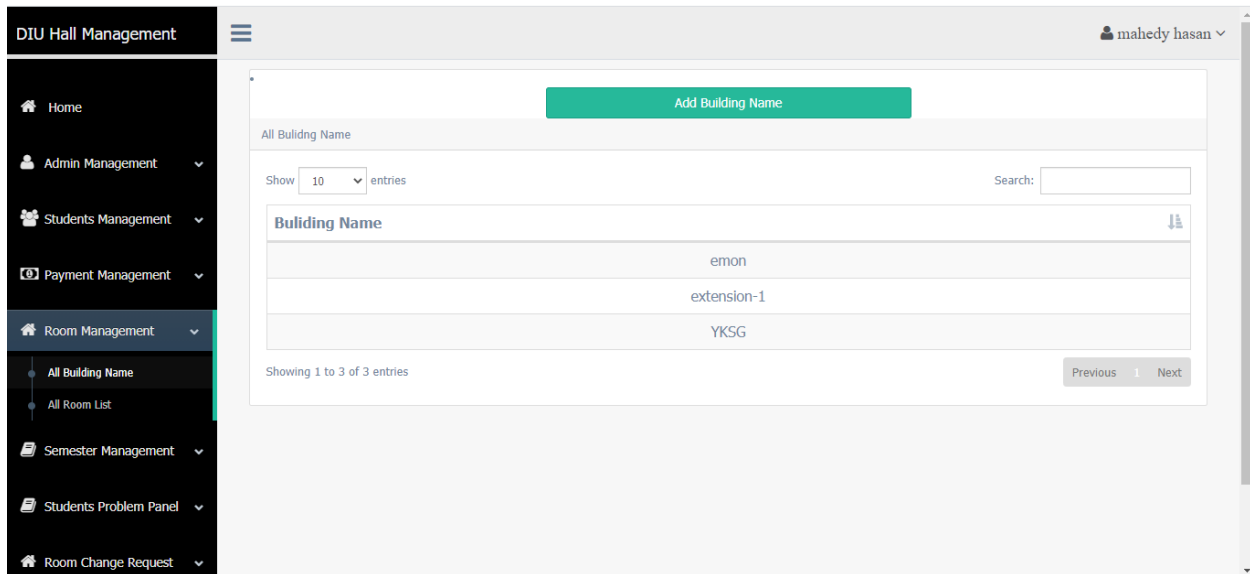


Figure 4.4.20 All Building List

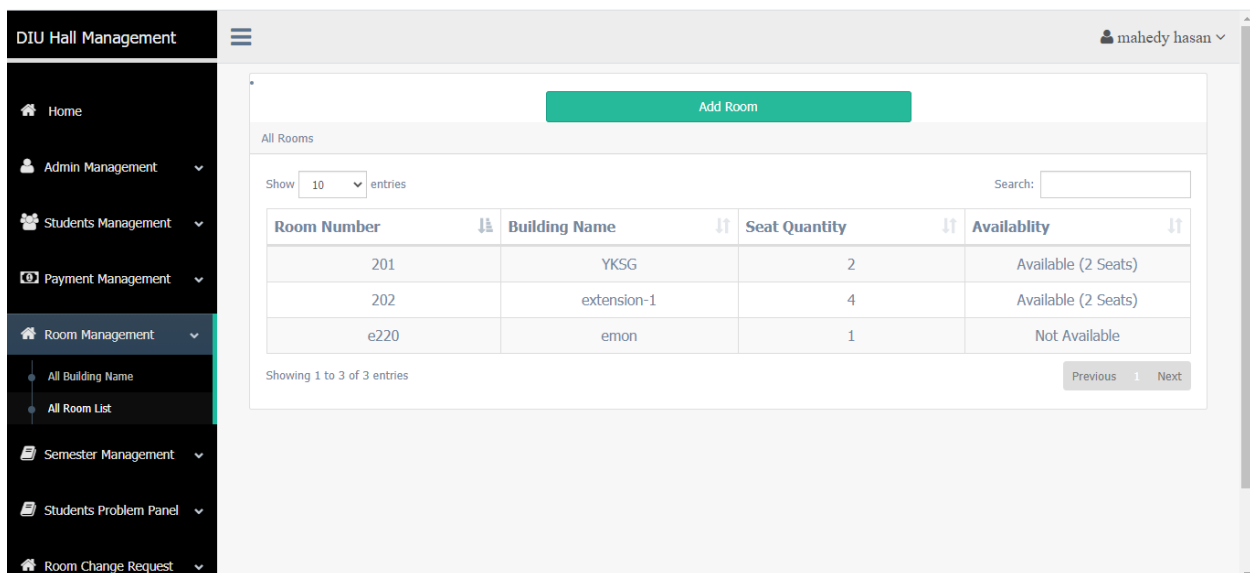


Figure 4.4.21 All Room List

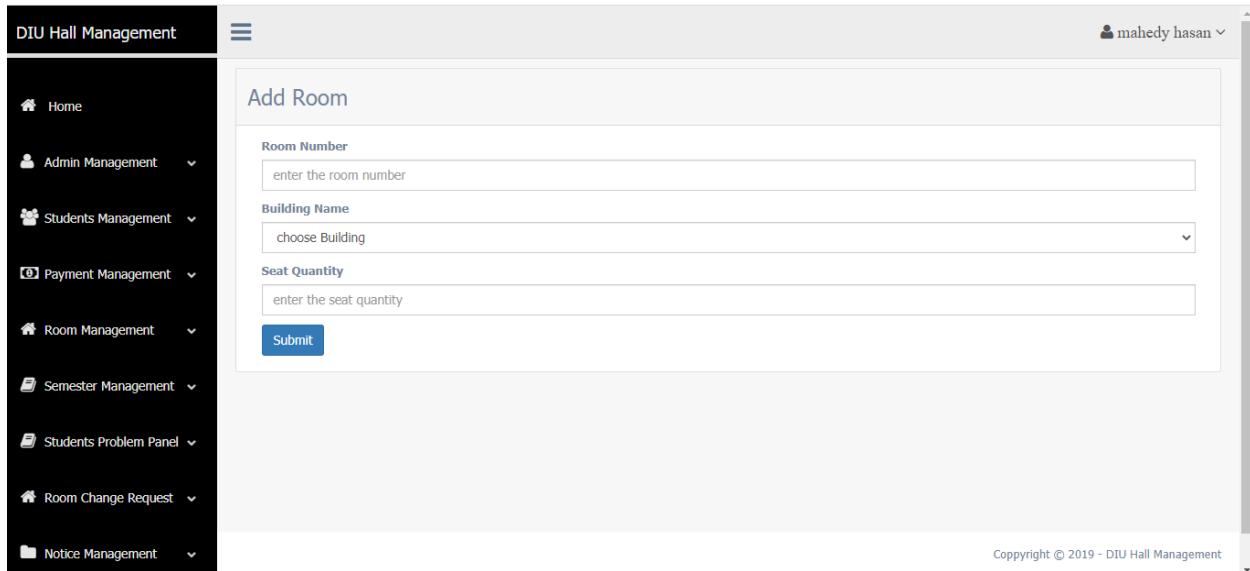


Figure 4.4.22 Add Room

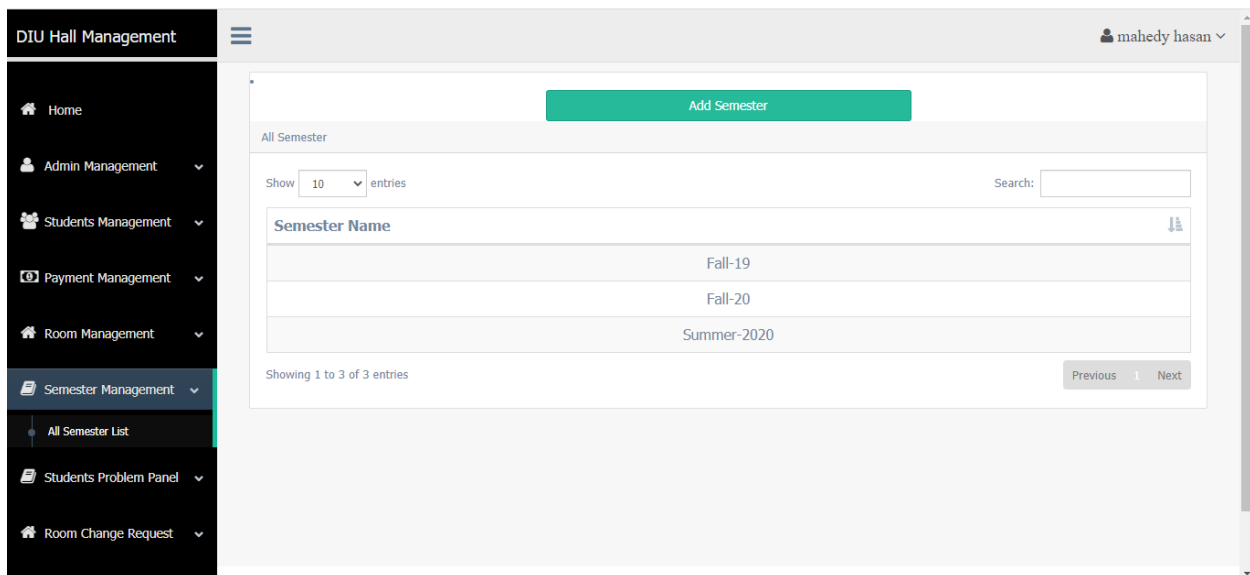


Figure 4.4.23 All Semester List

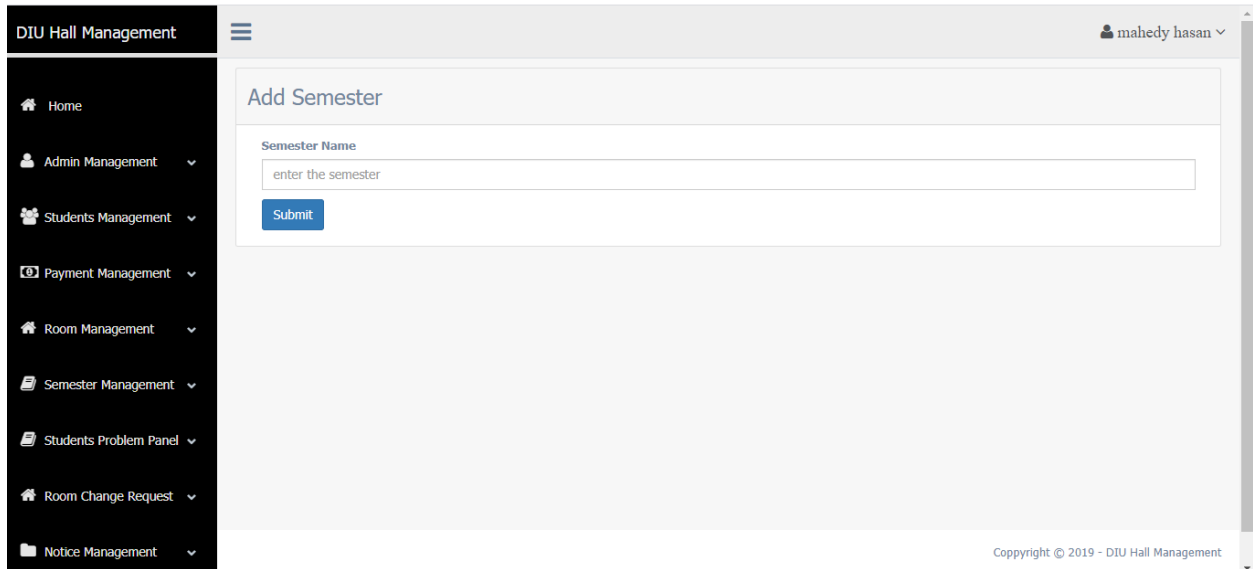


Figure 4.4.24 Add Semester

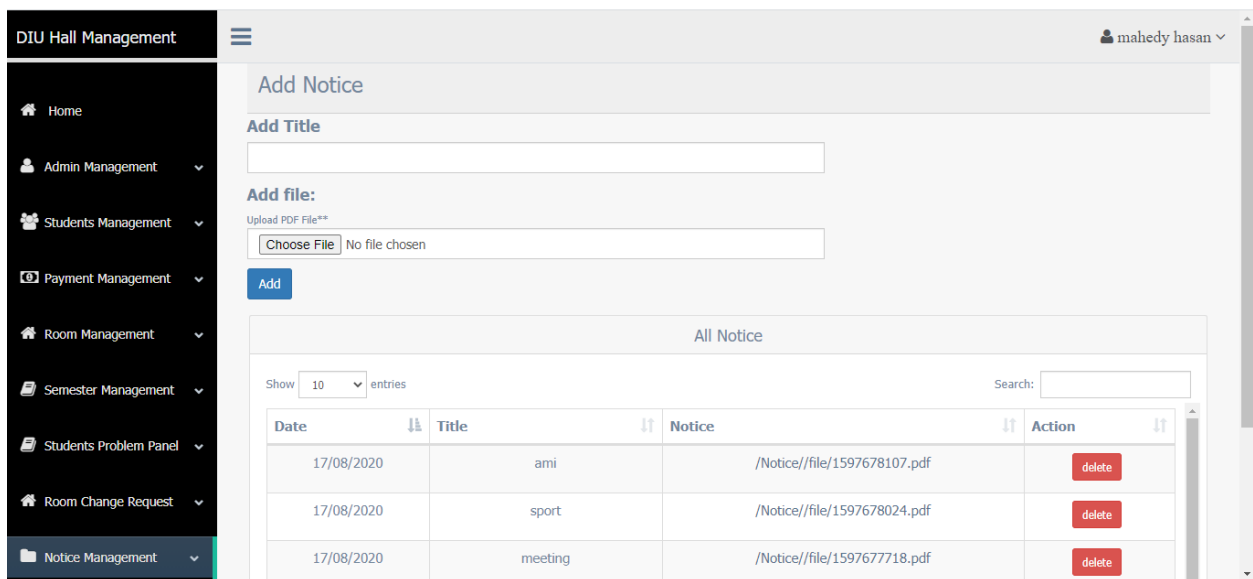


Figure 4.4.25 Add Notice

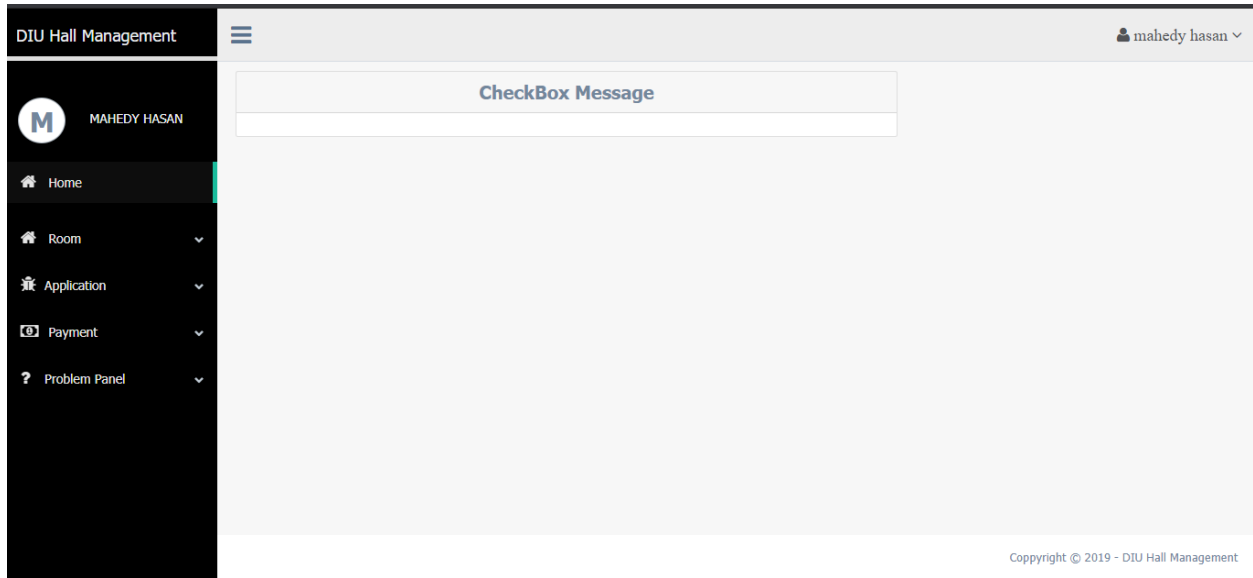


Figure 4.4.26 Student Dashboard

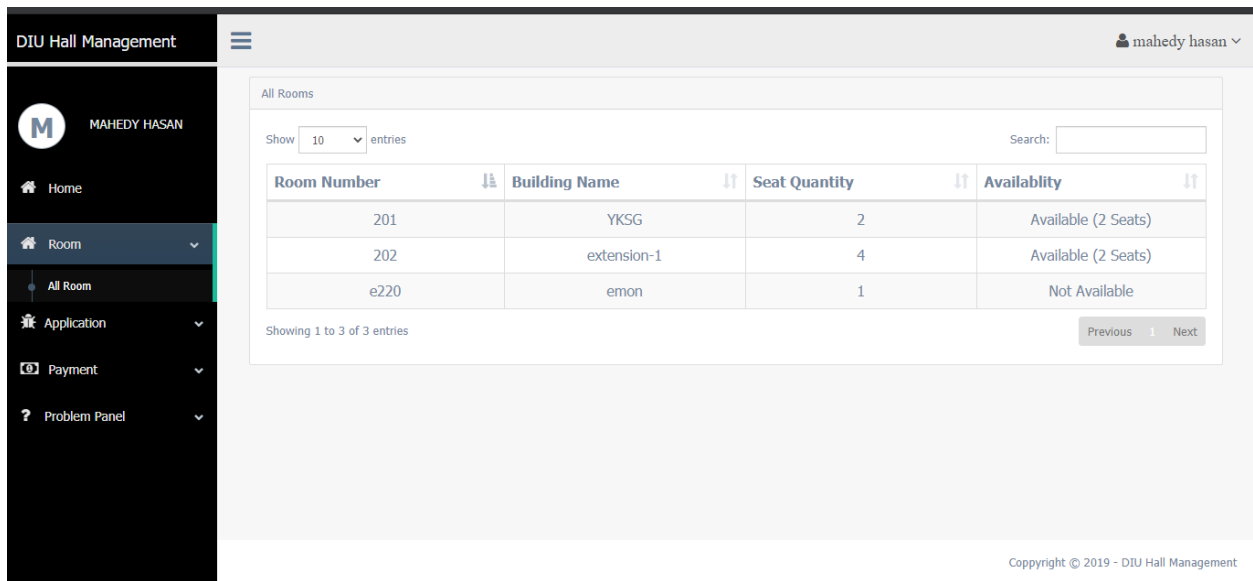


Figure 4.4.27 All Rooms

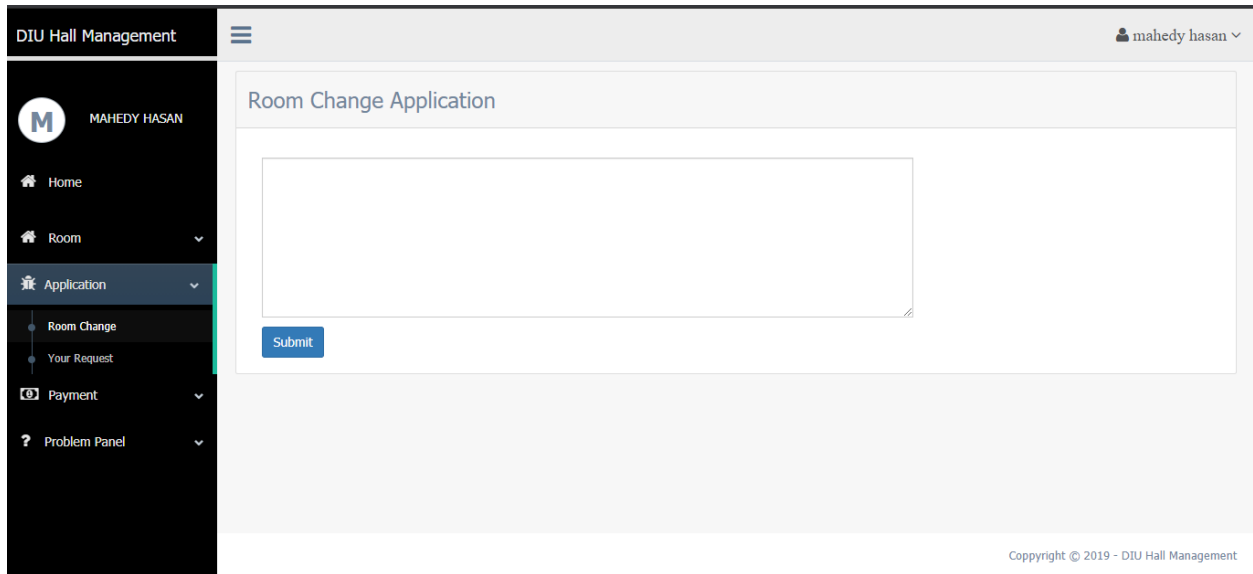


Figure 4.4.28 Room Change Application

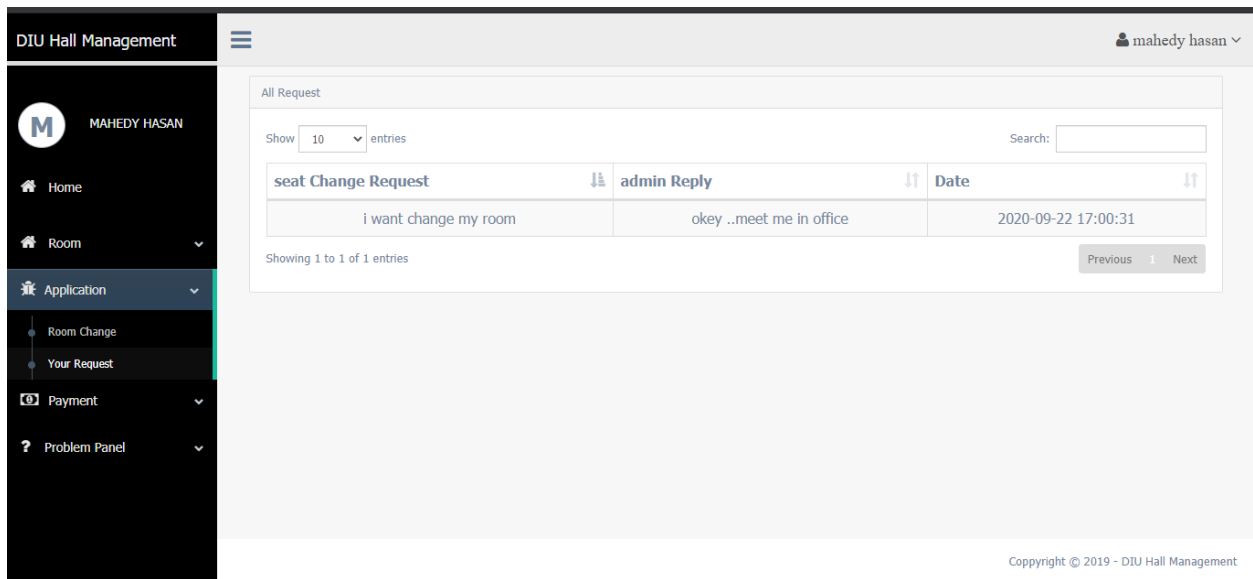


Figure 4.4.29 Room Change Request

The screenshot displays the 'Your Payments' section of the DIU Hall Management interface. At the top, it shows the user's name 'MAHEDY HASAN' and a total amount of 14020. Below this, there is a search bar and a table with columns for 'Student Semester' and 'Hall Fee'. The table lists three entries: Summer-2020 with a fee of 2020, Fall-20 with a fee of 2000, and Fall-19 with a fee of 10000. The interface also includes a sidebar with navigation options like Home, Room, Application, Payment, Your Payments, and Problem Panel.

Student Semester	Hall Fee
Summer-2020	2020
Fall-20	2000
Fall-19	10000

Figure 4.4.30 Student Payment List

The screenshot shows the 'Problems Request' page in the DIU Hall Management system. It features a large text input field with the placeholder text 'Enter your Room problem's Details' and a blue 'Submit' button below it. The sidebar on the left includes navigation options such as Home, Room, Application, Payment, Problem Panel, Problem assign, and Admin Reply. The user's name 'MAHEDY HASAN' is visible at the top right.

Figure 4.4.31 Problem Request

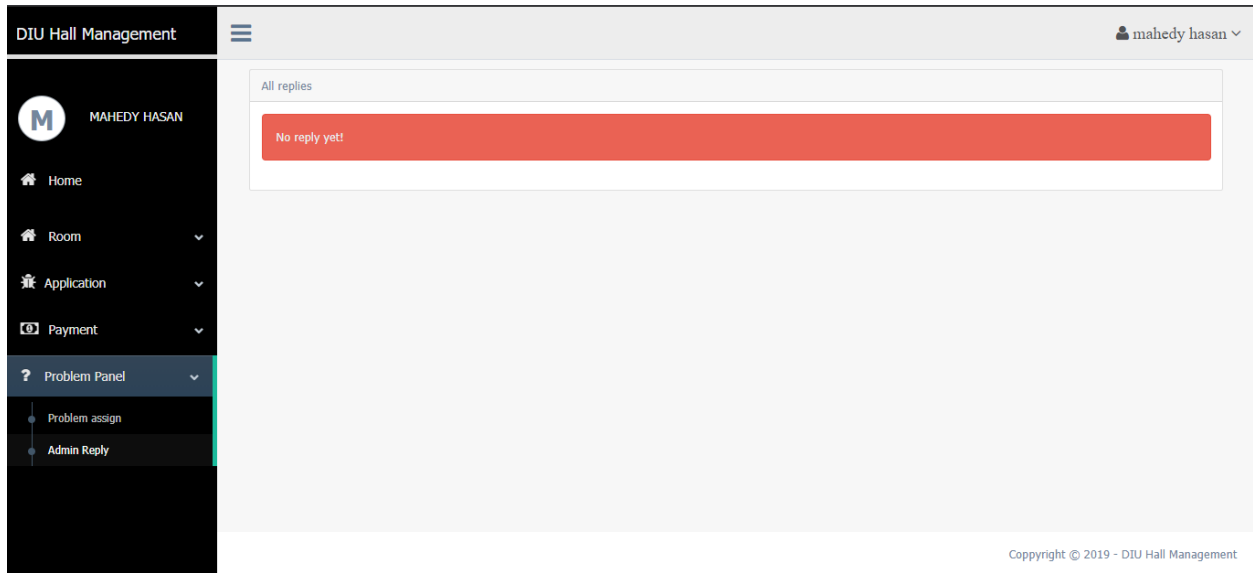


Figure 4.4.32 All Replies

CHAPTER 5

IMPLEMENTATION AND TESTING

5.1 Database Implementation

TABLE 5.1.1 Database Details of Admin

Chart Name		Admin				
Chart Statement		This is chart container of Admin records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
F_name	Varchar	250	√			Container contain first name of admin
L_name	Varchar	250				Container contain last name of admin
Email	Varchar	250				Container contain email of admin
Contact	Varchar	250				Container contain Contact of admin
Email_verified_at	Timestamp					Container contain email verification date of the admin
Password	Varchar	250				Container contain password of admin
Is_active	Int	1				Container contain active status of admin
Remember_token	varchar	250				Container contain remember token of admin

TABLE 5.1.2 Database Details of Applies

Chart Name		Applies				
Chart Statement		This is chart container of Applies records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
St_application	Varchar	250	√			Container contain student application
St_id	Int	30			√	Container contain student id of apply

TABLE 5.1.3 Database Details of Building

Chart Name		Building				
Chart Statement		This is chart container of Buildings records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
Buiding_name	Varchar	250	√			Container contain building name of building

TABLE 5.1.4 Database Details of Members

Chart Name		Members				
Chart Statement		This is chart container of members record				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increment)
Name	Varchar	250	√			Container contain name of member
Email	Varchar	250	√			Container contain email of member
Position	Varchar	250	√			Container contain position of member
Contact	Int	30	√			Container contain contact of member
Image	Varchar	250	√			Container contain image of member

TABLE 5.1.5 Database Details of Notice

Chart Name		Notice				
Chart Statement		This is chart container of notice records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain id (Self Increase)
Title	Varchar	250	√			Container contain notice title of notice
File	Varchar	250	√			Container contain file of notice

TABLE 5.1.6 Database Information Details of Reset

Chart Name		Password Reset				
Chart Statement		This is chart container of password reset records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Email	VARCHAR	250	√			Container contain email of password reset
Token	VARCHAR	250	√			Container contain token of password reset

TABLE 5.1.7 Database Details of Payments

Chart Name		Payments				
Chart Statement		This is chart container of payments records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
St_id	Int	30	√		√	Container contain student id of payments
St_semester	Varchar	250	√			Container contain student semester of payments
Hall_fee	Int	30	√			Container contain hall fee of payments

TABLE 5.1.8 Database Details of Problems

Chart Name		Problems				
Chart Statement		This is chart container of problems record				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
P_description	Varchar	250	√			Container contain problem description of problems
St_id	Int	30	√		√	Container contain student id of problems

TABLE 5.1.9 Database Details of Replies

Chart Name		Replies				
Chart Statement		This is chart container of replies records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
St_reply	Varchar	250	√			Container contain student reply of replies
Problem_id	Int	30				Container contain problem id of replies

TABLE 5.1.10 Database Details of Rooms

Chart Name		Rooms				
Chart Statement		This is chart container of rooms records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
Room_num	Varchar	250	√			Container contain room name of rooms
Quantity	Int	30	√			Container contain quantity of rooms
Booked	Int	30	√			Container contain booked status of rooms
Building_id	Int	30	√		√	Container contain building id of rooms

TABLE 5.1.11 Database Details of Semester

Chart Name		Semester				
Chart Statement		This is chart container of semester records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	Int	30	√	√		Container contain supreme id (Self Increase)
Semester_name	Varchar	250	√			Container contain semester name of semester

TABLE 5.1.12 Database Details of Slider

Chart Name		Slider				
Chart Statement		This is chart container of slider records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
Id	BIG (INT)	30	√	√		Container contain supreme id (Self Increase)
Image	VARCHAR	250	√			Container contain image of slider

TABLE 5.1.13 Database Details of Student

Chart Name		Student				
Chart Statement		This is chart container of student records				
Area Name	Value Type	Volume	Not Null	PK	FK	Statement
St_id	Int	250	√	√		Container supreme id (Self Increase)
St_name	Varchar	250	√			Container contain student name of student
Email	Varchar	250	√			Container contain email of student
Password	Varchar	250	√			Container contain password of student
St_dept	Varchar	250	√			Container contain student department of student
Image	Varchar	250	√			Container contain mage of student
Room_id	Int	30	√		√	Container contain room id of student
Semester_id	Int	30	√		√	Container contain semester id of student

St_contact	Varchar	250	√			Container contain student contact of student
Remember_token	Varchar	250	√			Container contain remember token of student

TABLE 5.1.14 Database Details of User

Chart Name		User				
Chart Statement		This is chart container of user records				
Area Name	Value type	Volume	Not Null	PK	FK	Statement
Id	int	30	√	√		Container supreme id (Self Increase)
F_name	varchar	250	√			Container contain fast name of user
L_name	varchar	250	√			Container contain last name of user
Email	varchar	250	√			Container contain email of user
Contact	varchar	250	√			Container contain contact of user
Address	varchar	250	√			Container contain address of user
Email_verified_at	Timestamp					Container contain email verified time of user
Password	varchar	250	√			Container contain password of user
Remember_token	varchar	250	√			Container contain remember token of user

5.2 Test Case

TABLE 5.2.1 Login Page of Test Case Description

Serial No	Input/Action	Desired Value	Indeed Value	Comment
1	Permit the field empty	The field email and password required	Message “Email and password is required”	Granted
2	Taken ineffective Password	Password is incorrect	Message “Password is incorrect”	Granted
3	Taken ineffective email format	Please enter a valid email	Message “Please enter a valid email”	Granted
4	Taken acceptable user name or email	Accepted Value	Value accepted	Granted

TABLE 5.2.2 Registration Page of Test Case Description

Serial No	Activity	Desired Value	Indeed Value	Comment
1	Permit any field empty	This field is empty	Message “This field is empty”	Granted
2	Taken an ineffective email or already used	This email is invalid or try with another	Message “Enter a valid email or try with another”	Granted
3	Taken an ineffective phone number	Phone number is invalid	Message “Phone number is invalid”	Granted
4	Taken valid data	Accepted Value	Value accepted	Granted

CHAPTER 6

CONCLUSION AND FUTURE WORK

6.1 Future Works

We just want that our system will have been used in our university campus. Then in future if it is convenient to use by the users, we will try to make it as a versatile system. And the problems we have faced, in future we have planned to solve this problem. We have a well-planned idea about it. Cause it's so important to build a DIU Hall for educational system in our country. Most importantly we want to add payment gateway using API method in our project.

For the payment gateway, we will use:

- ❖ Bikash
- ❖ DBBL Rocket
- ❖ Nagad
- ❖ One Card and more payment gateway

6.2 Conclusion

This application is made by modern technologies such as PHP (Laravel Framework) as a backend programming language, HTML, CSS, Bootstrap, JavaScript, jquery for frontend. MySQL handles the whole data of my system. PHP is the most popular programming language all over the world. MySQL is the database used to develop the modern and latest applications. This application will serve you the best experience in the online hall management system.

REFERENCES

- [1] http://www.du.ac.bd/home/hall_admin/hall (*Dhaka University Hall Management Web Portal*)
- [2] <http://www.juniv.edu/hall/meer-mosharrof-hossain-hall> (*Jahangirnagar University*)
- [3] <http://www.sust.edu/campus-life/residence-hall> (*Shahjalal University of Science and Technology Hall*)
- [4] <http://www.kuet.ac.bd/index.php/welcome/khajahalldetails> (*Khulna University of Engineering and Technology*)