

**INTERIM REPORT**  
**WEB BASED SALON MANAGEMENT**  
**SYSTEM**



Prepared by

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**March 2023**

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## **Acknowledgements**

I would like to express my sincere appreciation to all those who provided me the possibility to carrying the project work and completing this report. A special gratitude I offer towards my final year project supervisor, Ms. Samanthi Wickremasinghe, who will guide me throughout the project development in contribution of stimulating suggestions and encouragement, to coordinate the work successfully especially in writing this report.

I am highly indebted to CODL of University of Moratuwa for their guidance and constant supervision as well as for providing necessary information regarding the project & their support in each and every phase of project developing cycle to be professionalize in the IT field. As well as many thanks go to the Mrs. Saranga Jayalath the module coordinator for project in course module, who gave her full effort in guiding us in achieving the goal. I have to appreciate the guidance given by other evaluators in the panels of evaluation for their comment and advice as especially I had adapt my project according to their comments and my supervisor's advice.

Also My sincere appreciation goes to the The Rush Hair (Pvt) Ltd. owners Mr. Sachin Wijenanda, Mr. Rakitha Daraniyagala and staff, who enlightened me about the processes and functionalities of the salon and co-operated in the course of development of the project.

Last by not least I would like to express my gratitude towards my parents & friends for their kind support and encouragement which help me in the past procedures of this project.

## **Abstract**

The Rush Hair Salon is a well-known salon in the Nugegoda and Colombo areas. However, the salon lacks an automated salon management system, which leads to many issues, such as redundant customer information, a slow booking process, and unreliable sales record-keeping. To address these issues, a Web-based Salon Management System (WSMS) is proposed to manage the salon's process, keep track of customer and staff records, and maintain sales records. The proposed system will enable the staff to enter customer information, desired services, date and time, and payment details online or offline. The system will also generate receipts upon completion of services, and the manager can view daily or monthly reports of the salon management via the WSMS. The system will provide a hassle-free accounting and inventory management system for the salon, improve customer service, and make work processes more efficient. The objectives of the project are to convert the manual process of salon management into an online platform, design a user-friendly environment for the management of the salon, its staff, and customers, provide timely and accurate reports, and secure the records in the proper implementation and design of the database. The proposed system will enhance the salon's performance and improve customer satisfaction.

## Table of Contents

Table of Contents .....	iv
List of Tables .....	v
List of Figures .....	vi
1    Introduction.....	7
1.1    Background .....	7
1.2    Problem Statement .....	8
1.3    Motivation and Significance of Project.....	8
1.4    Aims and Objectives .....	9
1.4.1    Aim.....	9
1.4.2    Objectives.....	10
2    Literature Review.....	11
2.1    Existing Systems .....	11
2.1.1    Fresha - Salon Management System.....	11
2.1.2    Salon IRIS - Salon Management System .....	13
2.1.3    Phorest - Salon Management Software .....	16
2.1.4    MioSalon - Salon Management Software .....	18
2.1.5    Salon Ultimate - Salon Management Software .....	21
2.2    System Comparison .....	24
3    Project Plan and Initial Design.....	25
3.1    Components of the system .....	25
3.1.1    Software Components and Tasks .....	25
3.1.2    Database Component .....	37
3.1.3    Hardware Component .....	38
3.2    Proposed Methodology .....	39
3.3    Technologies Adapted.....	40
3.3.1    PHP Programing Language.....	40
3.3.2    Web Server – Apache.....	40
3.3.3    XAMPP .....	40
3.3.4    HTML .....	41
3.3.5    Bootstrap .....	41
3.3.6    CSS.....	42
3.3.7    MySQL.....	42
3.3.8    JavaScript .....	42

3.4	Test and Deployment plan .....	43
3.4.1	Testing.....	43
3.4.2	Test Cases of some system part .....	44
4	References.....	47
5	Appendix.....	48
5.1	Timeline .....	48
5.2	Use Case Diagrams for System.....	49
5.3	Use Case Diagrams (Module Wise).....	53
5.4	Activity Diagrams .....	60
5.5	ERD.....	64
5.6	SRS.....	64

## List of Tables

Table 1:System Comparison .....	24
<i>Table 2: User Requirements .....</i>	26
<i>Table 3 : Booking Management .....</i>	28
Table 4 : Service Management.....	28
Table 5:Billing Management.....	29
Table 6:Customer Management.....	29
Table 7: Inventory Management .....	31
Table 8: Income and Expenses Management.....	32
Table 9:Promotion Management.....	33
Table 10:Generate Reports.....	33
Table 11:Loyalty Point System.....	34
Table 12:Gift Voucher Management .....	34
Table 13: Customer Feedback Module .....	35
Table 14: Notification .....	35
Table 15:Salon Dashboard .....	36
Table 16: Test Cases for some features.....	47

## List of Figures

Figure 1: Fresha Salon management System .....	12
Figure 2: Fresha Salon management System Dashboard .....	13
Figure 3: Salon Iris Web site.....	15
Figure 4: Login Page of Salon IRIS .....	15
Figure 5: Phorest Salon Management Software.....	17
Figure 6: Some Features of Phorest Salon Management Software .....	18
Figure 7:MioSalon - Salon Management Software.....	20
Figure 8: MioSalon Dashboard .....	20
Figure 9:Salon Ultimate - Salon Management Software .....	22
Figure 10: Salon Ultimate Features & Pricing .....	23
Figure 11:Login Interface .....	26
Figure 12: Create User UI .....	27
Figure 13: Appointment Interface .....	28
Figure 14:Customer Registration .....	30
Figure 15: Create Supplier UI .....	31
Figure 16: GRN UI .....	32
Figure 17:Salon Dashboard Possible View .....	36
Figure 18: Gantt Chart .....	48
Figure 19: Use case diagram of Admin prospective .....	49
Figure 20: Use case diagram of Manager prospective .....	50
Figure 21:Use case diagram of Staff prospective .....	51
Figure 22:se case diagram of Talent Staff prospective .....	51
Figure 23:Use case diagram of Customer prospective.....	52
Figure 24: Use Case of User Management .....	53
Figure 25: Use Case of Customer Management.....	53
Figure 26: Use Case of Inventory Management.....	54
Figure 27: Use Case of Booking Management .....	55
Figure 28:Use Case of Service Management .....	56
Figure 29:Use Case of Promotion Management .....	57
Figure 30: Use Case of Loyalty Point Module.....	58
Figure 31: Use Case of Income and Expenses Module.....	59
Figure 32: Activity Diagram of Booking Management .....	60
Figure 33: Activity Diagram of User Management .....	61
Figure 34: Activity Diagram of Product and Category Management .....	62
Figure 35: Activity digram of Billing Management.....	63
Figure 36: ER Diagram .....	64

## **1 Introduction**

In today's modern world, technology has made life easier and more convenient for people, particularly in the realm of managing businesses. The beauty industry is no exception, with more and more salons turning to technology to improve their management systems. The Rush Hair Salon (TRH), located in the heart of Nugegoda, is a well-established salon with a good reputation. However, TRH currently lacks an automated salon management system, which is becoming increasingly necessary as the salon's customer base expands. The existing manual system of recording bookings and maintaining sales records is time-consuming, unreliable, and prone to errors. To address these issues, we propose the implementation of a Web-based Salon Management System (WSMS) that will enable TRH to manage their salon operations more efficiently and provide customers with easy access to the salon's services. This system will be designed to convert the manual process of salon management into an online platform, provide a user-friendly environment for staff and customers, generate timely and accurate reports, and organize and secure records through proper implementation and design of the database. By implementing the WSMS, TRH will be able to streamline its operations, improve customer experience, and ensure the reliability and security of its data.

### **1.1 Background**

The modern beauty culture is becoming increasingly popular, especially among the young generation. This trend is expected to continue. They also frequently visit a beauty salon or barbershop for their beauty needs. For this reason, salon owners strive to maintain their customers' loyalty by consistently delivering superior service. In this scenario, they want to know how to better manage their salons and keep clients interested in visiting them. Located in the heart of Nugegoda, The Rush Hair Salon has a good reputation. About 14 years ago, with just one person, the salon opened in the town of Embuldeniya junction a. There are currently 10 people working for them

(Stylists) and now the Salon is well established in Colombo. The company's customer base is expanding steadily, and the existing manual system can't keep up with the need for fast, dependable service. Because appointments are so vital to the regular operation of a salon, it's crucial that their management be handled reliably, and that any relevant data be compiled into reports.

## 1.2 Problem Statement

The Rush Hair Salon (TRH) currently lacks an automated salon management system and relies on manual processes for customer bookings, sales records, and data management. This results in duplication of customer information, the possibility of lost data, and time-consuming processes for staff and clients. As a result, TRH needs a Salon Management System that can automate manual processes, store and secure data, provide accurate reports, and create a user-friendly environment for the management of the salon, staff, and customers. The proposed web-based Salon Management System (WSMS) will be designed using web development technologies such as PHP, HTML, JavaScript, and MySQL, and will aim to improve the salon's operations, efficiency, and customer service.

## 1.3 Motivation and Significance of Project

The proposed project of implementing a web-based Salon Management System for The Rush Hair Salon is motivated by the need for a reliable and efficient system that can manage the salon's daily operations, keep track of customer information, and provide a user-friendly interface for both staff and customers. The current manual system used by the salon is time-consuming and prone to errors, which affects the salon's reputation and customer satisfaction. By implementing the proposed system, The Rush Hair Salon can improve their salon management process by automating their booking and billing systems, reducing manual data entry, and maintaining an organized and secure database. The proposed system will also provide a hassle-free

accounting and inventory management system, generating timely and accurate reports that can help the salon's management make informed decisions.

The significance of this project is that it will enable The Rush Hair Salon to keep up with the increasing demand for its services, enhance its customer experience, and remain competitive in the beauty industry. The proposed system will not only benefit the salon's management and staff but also their customers who can make appointments easily and quickly, track their salon visit history, and receive timely notifications and reminders.

Overall, the implementation of a Web-based Salon Management System for The Rush Hair Salon will improve their operational efficiency, increase customer satisfaction, and ultimately lead to business growth and success.

## **1.4 Aims and Objectives**

### **1.4.1 Aim**

The aim of this project is to develop and implement a Web-based Salon Management System (WSMS) for The Rush Hair Salon, with the goal of replacing their current manual system. The WSMS will address the inefficiencies and time-consuming nature of the existing system, allowing for efficient appointment management, seamless tracking of customer information, and improved overall productivity. By providing a user-friendly interface and automating various business operations, the WSMS will enhance the experience for both customers and staff, resulting in a more streamlined and productive salon management process.

#### 1.4.2 Objectives

- To create an automated platform for managing all aspects of the salon's operations, including customer bookings, staff scheduling, inventory management, and financial reporting.
- To design a user-friendly and intuitive interface for customers and staff to interact with the system, reducing the time and effort required for managing salon appointments and related tasks.
- To ensure accurate and timely reporting by generating daily, weekly, and monthly reports on sales, inventory, customer feedback, and other key performance metrics.
- To centralize all salon data in a secure and organized database system, reducing the risk of lost or duplicated records, and improving data accessibility and retrieval.
- To streamline salon processes, reducing wait times for customers, and enhancing the overall salon experience to promote customer loyalty and retention.
- To develop and implement various promotional methods, including bank-wise promotions, to attract and retain customers for The Rush Hair Salon.

## **2 Literature Review**

### **2.1 Existing Systems**

#### **2.1.1 Fresha - Salon Management System.**

Salon management systems have become an integral part of modern-day salons and spas, streamlining operations, improving customer experience, and enhancing overall efficiency. Fresha is one such salon management system that claims to offer comprehensive features and benefits to salon owners. This report aims to critically analyze the Fresha salon management system, evaluating its key features, usability, and overall effectiveness.

Fresha offers a range of features designed to assist salon owners in managing their business effectively. These features include appointment scheduling, online booking, client management, staff management, inventory management, point of sale (POS) functionality, and reporting. The appointment scheduling and online booking system allows clients to book appointments conveniently, reducing the workload on salon staff. Client management enables the storage and retrieval of client information, while staff management assists in organizing schedules and tracking employee performance. The POS functionality helps streamline payments, and the reporting feature provides insights into business performance.

The usability of a salon management system is crucial for its successful adoption. Fresha offers a user-friendly interface with a clean design and intuitive navigation. The system allows for easy customization to suit individual salon requirements. The online booking system is simple for clients to use, providing a seamless booking experience. However, some users have reported occasional glitches and slow loading times, which can disrupt workflow and cause frustration. Improvements in system stability and speed would greatly enhance the overall usability of Fresha.

The effectiveness of Fresha as a salon management system can be evaluated based on its ability to streamline operations, enhance customer experience, and improve overall business performance. The system's appointment scheduling and online booking

features simplify the booking process for both salon staff and clients, saving time and reducing errors. The client management functionality allows for personalized service and easy access to customer history. However, some users have reported occasional synchronization issues between the online and offline versions of the system, leading to confusion and inconvenience. Moreover, the reporting feature could be more comprehensive, providing detailed insights into key business metrics. Enhancements in these areas would make Fresha a more effective salon management solution.

Fresha is a salon management system with a range of features aimed at improving salon operations and customer experience. While the system offers several benefits, there are areas that could be improved to enhance usability, customer support, and overall effectiveness. Addressing technical glitches, optimizing system speed, and providing responsive customer support would greatly enhance the user experience. Additionally, improvements in data synchronization and the reporting feature would enable salon owners to make more informed business decisions. Despite these areas for improvement, Fresha remains a viable option for salon owners seeking a comprehensive salon management system. One of the system's drawbacks is that it may not be suitable for salons with complex needs.

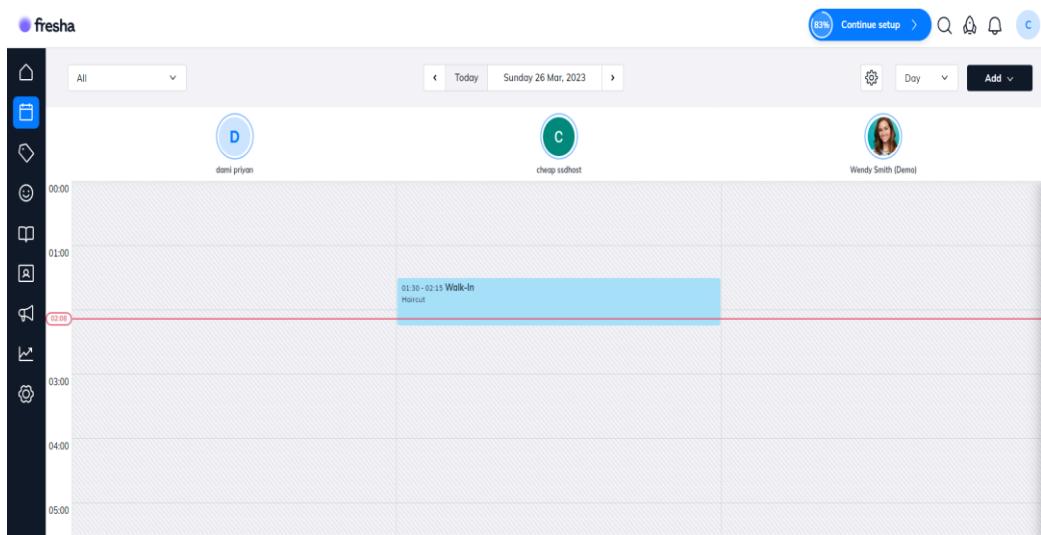


Figure 1: Fresha Salon management System

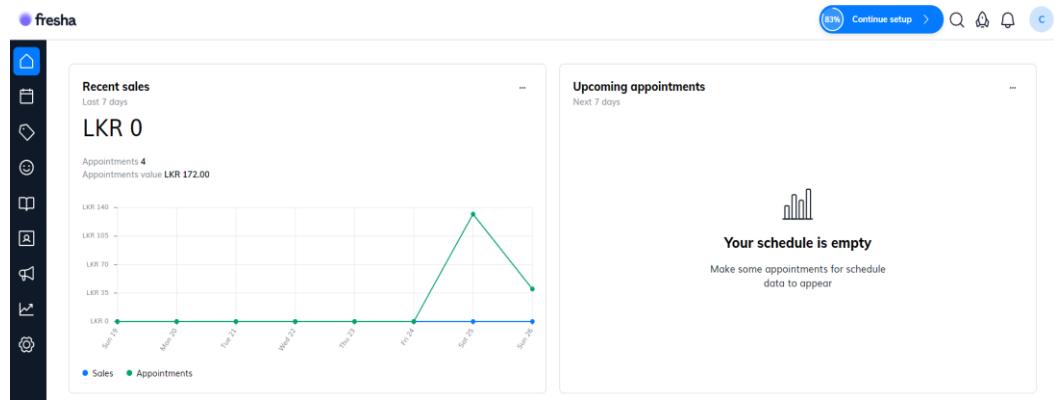


Figure 2: Fresha Salon management System Dashboard

### 2.1.2 Salon IRIS - Salon Management System

Salon management systems have revolutionized the way salons and spas operate, providing a comprehensive solution for efficient business management. Salon IRIS is a popular salon management system that claims to offer a wide range of features and benefits to salon owners. This report critically analyzes the Salon IRIS salon management system, evaluating its key features, usability, and overall effectiveness.

Salon IRIS boasts a plethora of features designed to streamline salon operations and enhance customer experience. These features include appointment scheduling, online booking, client management, staff management, inventory management, point of sale (POS) functionality, and reporting. The appointment scheduling and online booking system facilitate easy appointment management and enable clients to book appointments conveniently. Client management allows for the storage and retrieval of client information, while staff management assists in organizing schedules and tracking employee performance. The POS functionality simplifies payment processing, and the reporting feature provides valuable insights into business performance.

Usability is a critical aspect of any salon management system, as it directly affects user satisfaction and productivity. Salon IRIS offers a user-friendly interface with an intuitive design and straightforward navigation. The system is highly customizable, allowing salon owners to tailor it to their specific needs. The online booking system is

user-friendly for clients, offering a seamless booking experience. Additionally, the system provides smooth integration with popular accounting software, easing financial management. However, some users have reported occasional lagging and slow response times, which can hinder workflow efficiency. Improving system performance and addressing these technical issues would enhance the overall usability of Salon IRIS.

The effectiveness of Salon IRIS as a salon management system can be evaluated based on its ability to streamline operations, enhance customer experience, and improve overall business performance. The appointment scheduling and online booking features simplify the booking process for salon staff and clients, reducing manual efforts and minimizing errors. The client management functionality enables personalized service and easy access to client information, leading to enhanced customer satisfaction. However, some users have reported occasional syncing issues between the online and offline versions of the system, causing inconvenience and confusion. Moreover, while the reporting feature provides essential business insights, it could benefit from more advanced analytics and customizable reporting options. Improvements in data synchronization and reporting capabilities would make Salon IRIS an even more effective salon management solution.

Salon IRIS is a feature-rich salon management system that offers numerous benefits to salon owners. While the system provides valuable features and customization options, there are areas that could be improved to enhance usability, customer support, and overall effectiveness. Addressing performance issues, ensuring responsive customer support, and enhancing data synchronization capabilities would significantly enhance the user experience. Additionally, adding advanced reporting and analytics features would enable salon owners to make more informed business decisions. Despite these areas for improvement, Salon IRIS remains a viable salon management solution for businesses seeking an all-in-one system. However, the system's high cost may make it less accessible to small salon owners.

Figure 3: Salon Iris Web site

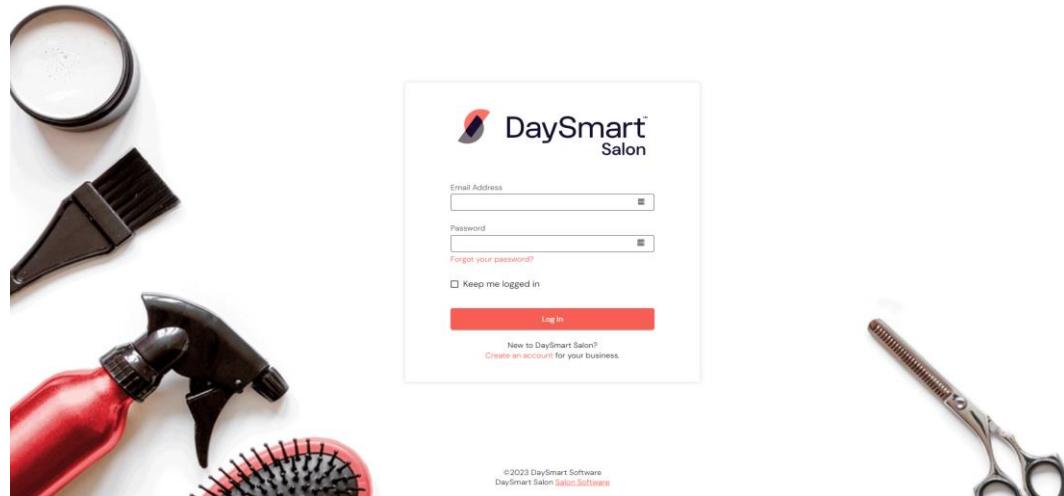


Figure 4: Login Page of Salon IRIS

### **2.1.3 Phorest - Salon Management Software**

Salon management software has become essential for efficient salon operations, providing a range of features to streamline processes and enhance customer experience. Phorest is a prominent salon management software that claims to offer comprehensive solutions to salon owners. This report critically analyzes the Phorest salon management software, evaluating its key features, usability, and overall effectiveness.

Phorest boasts an extensive array of features designed to optimize salon management. These features include appointment scheduling, online booking, client management, staff management, inventory management, point of sale (POS) functionality, marketing tools, and reporting. The appointment scheduling and online booking system allow for seamless appointment management and convenient online bookings. The client management feature enables the storage and organization of client information, while staff management helps in scheduling and tracking employee performance. The POS functionality facilitates easy payment processing, and the marketing tools assist in promoting the salon's services. The reporting feature provides valuable insights into business performance.

Usability is a crucial factor for salon management software, as it directly impacts user satisfaction and productivity. Phorest offers a user-friendly interface with a clean and intuitive design. The system is highly customizable, allowing salon owners to tailor it to their specific needs. The online booking system is user-friendly for clients, providing a smooth and hassle-free booking experience. Additionally, the software integrates with popular accounting software, simplifying financial management. However, some users have reported occasional system lagging and slow loading times, which can impede workflow efficiency. Addressing these performance issues would significantly enhance the overall usability of Phorest.

The effectiveness of Phorest as a salon management software can be assessed based on its ability to streamline operations, enhance customer experience, and improve overall business performance. The appointment scheduling and online booking features simplify the booking process, reducing manual effort and minimizing errors.

The client management functionality allows for personalized service and easy access to client information, resulting in improved customer satisfaction. Moreover, the marketing tools help in promoting services and increasing customer engagement. However, some users have reported occasional synchronization issues between the online and offline versions of the software, leading to inconsistencies in data. Additionally, while the reporting feature provides essential business insights, it could benefit from more advanced analytics and customization options. Improving data synchronization and expanding reporting capabilities would make Phorest an even more effective salon management solution.

Phorest is a feature-rich salon management software that offers numerous benefits to salon owners. While the software provides valuable features and customization options, there are areas that could be improved to enhance usability, customer support, and overall effectiveness. Addressing performance issues, ensuring responsive customer support, and improving data synchronization capabilities would significantly enhance the user experience. Furthermore, enhancing reporting capabilities and providing more advanced analytics features would empower salon owners to make informed business decisions. Despite these areas for improvement, Phorest remains a competitive salon management software option for businesses seeking comprehensive salon management solutions. However, the system's pricing structure may make it less accessible to small salon owners.

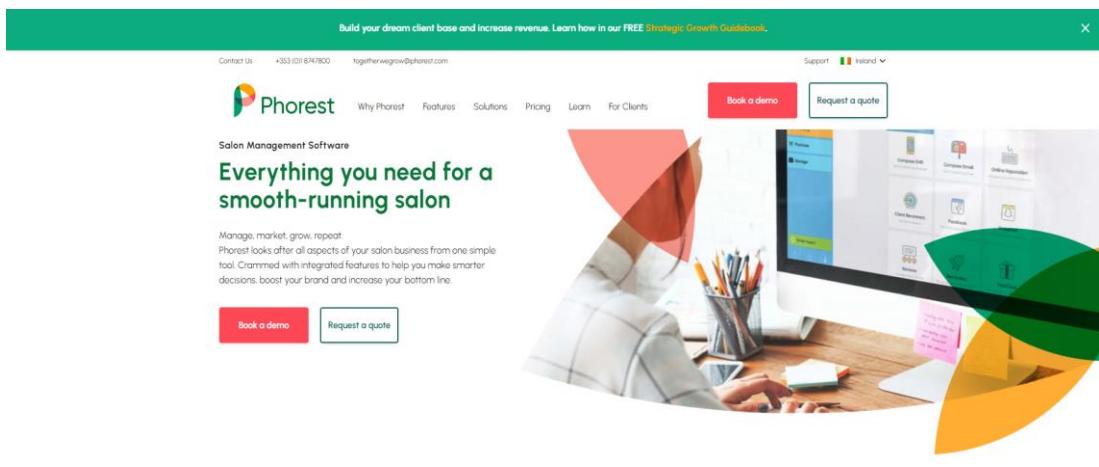


Figure 5: Phorest Salon Management Software

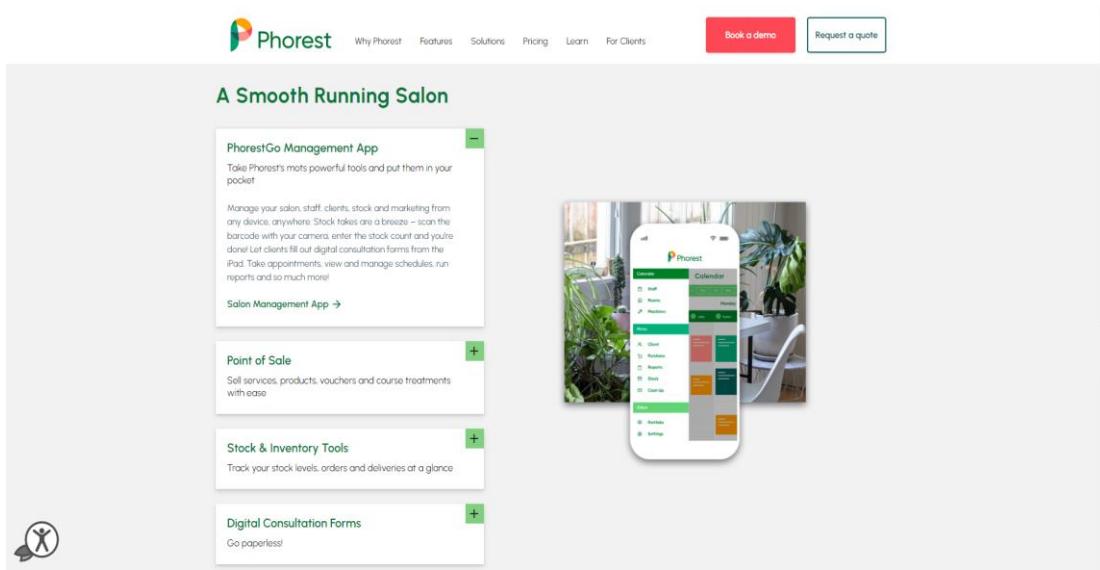


Figure 6: Some Features of Phorest Salon Management Software

#### 2.1.4 MioSalon - Salon Management Software

Salon management software has become an essential tool for modern-day salons and spas, streamlining operations, enhancing customer experience, and improving overall efficiency. MioSalon is a salon management software that claims to offer comprehensive features and benefits to salon owners. This report aims to critically analyze the MioSalon software, evaluating its key features, usability, and overall effectiveness.

MioSalon offers a range of features designed to assist salon owners in managing their business effectively. These features include appointment scheduling, online booking, client management, staff management, inventory management, point of sale (POS) functionality, marketing tools, and reporting. The appointment scheduling and online booking system allow clients to book appointments conveniently, reducing the workload on salon staff. The client management feature facilitates the storage and retrieval of client information, while staff management assists in organizing schedules and tracking employee performance. The POS functionality streamlines payments, and the marketing tools help in promoting salon services. The reporting feature provides insights into business performance.

Usability is a critical aspect of salon management software, as it affects user satisfaction and productivity. MioSalon offers a user-friendly interface with a clean and intuitive design. The system is customizable to adapt to specific salon requirements. The online booking system is user-friendly for clients, providing a seamless booking experience. Additionally, the software integrates with popular accounting software, simplifying financial management. However, some users have reported occasional system glitches and slow loading times, which can disrupt workflow and cause frustration. Improvements in system stability and speed would significantly enhance the overall usability of MioSalon.

The effectiveness of MioSalon as a salon management software can be evaluated based on its ability to streamline operations, enhance customer experience, and improve overall business performance. The appointment scheduling and online booking features simplify the booking process, reducing manual effort and minimizing errors. The client management functionality allows for personalized service and easy access to client information, contributing to improved customer satisfaction. The marketing tools help in promoting services and engaging with customers. However, some users have reported occasional synchronization issues between the online and offline versions of the software, leading to inconsistencies in data. Additionally, while the reporting feature provides business insights, it could benefit from more advanced analytics and customizable reporting options. Enhancements in data synchronization and reporting capabilities would make MioSalon a more effective salon management solution.

MioSalon is a salon management software with a range of features aimed at improving salon operations and customer experience. While the software offers several benefits, there are areas that could be improved to enhance usability, customer support, and overall effectiveness. Addressing technical glitches, optimizing system speed, and providing responsive customer support would significantly improve the user experience. Additionally, improvements in data synchronization and reporting capabilities would enable salon owners to make more informed business decisions. Despite these areas for improvement, MioSalon remains a viable option for salon

owners seeking a comprehensive salon management software. But does not meet all of requirements of the TRH Salon.

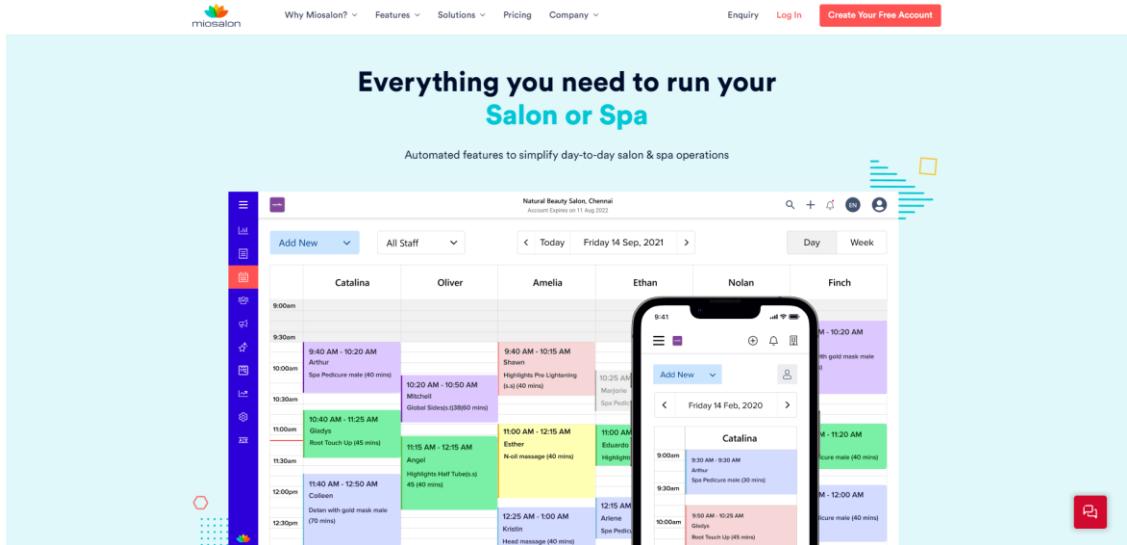


Figure 7:MioSalon - Salon Management Software

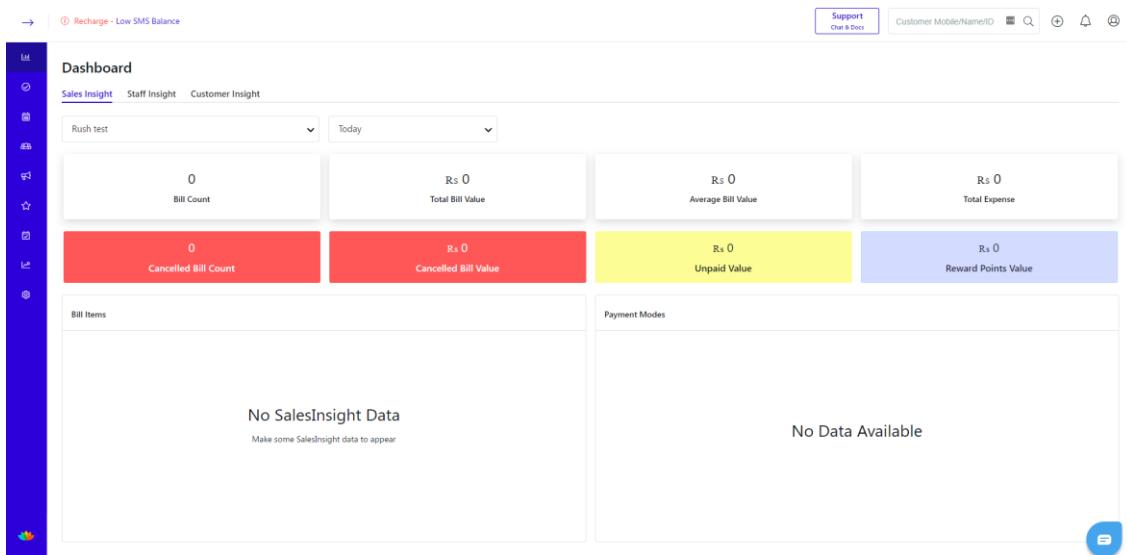


Figure 8: MioSalon Dashboard

### **2.1.5 Salon Ultimate - Salon Management Software**

Salon management software has become an essential tool for modern salons, helping to streamline operations, enhance customer experience, and improve overall efficiency. Salon Ultimate is a popular salon management software that claims to offer a wide range of features and benefits to salon owners. This report critically analyzes Salon Ultimate, evaluating its key features, usability, and overall effectiveness.

Salon Ultimate offers a comprehensive set of features designed to facilitate salon management. These features include appointment scheduling, online booking, client management, staff management, inventory management, point of sale (POS) functionality, marketing tools, and reporting. The appointment scheduling and online booking system enable convenient appointment management and booking for clients. The client management feature allows for the storage and organization of client information, while staff management assists in scheduling and tracking employee performance. The POS functionality streamlines payment processing, and the marketing tools aid in promoting salon services. The reporting feature provides insights into business performance.

Usability is a critical aspect of any salon management software, as it directly affects user satisfaction and productivity. Salon Ultimate offers a user-friendly interface with an intuitive design and easy navigation. The system can be customized to meet the specific needs of each salon. The online booking system is user-friendly for clients, providing a seamless and convenient booking experience. Moreover, the software integrates with popular accounting software, simplifying financial management. However, some users have reported occasional system glitches and slow response times, which can disrupt workflow and impact efficiency. Enhancing system stability and speed would significantly improve the overall usability of Salon Ultimate.

The effectiveness of Salon Ultimate as a salon management software can be evaluated based on its ability to streamline operations, enhance customer experience, and improve overall business performance. The appointment scheduling and online booking features simplify the booking process, reducing manual effort and minimizing errors. The client management functionality enables personalized service and easy

access to client information, leading to improved customer satisfaction. The marketing tools help in promoting salon services and engaging with clients. However, some users have reported occasional synchronization issues between the online and offline versions of the software, causing data inconsistencies. Additionally, while the reporting feature provides valuable business insights, it could benefit from more advanced analytics and customizable reporting options. Enhancements in data synchronization and reporting capabilities would make Salon Ultimate a more effective salon management solution.

Salon Ultimate is a feature-rich salon management software that offers numerous benefits to salon owners. While the software provides valuable features and customization options, there are areas that could be improved to enhance usability, customer support, and overall effectiveness. Addressing system glitches, optimizing response times, and providing responsive customer support would significantly improve the user experience. Furthermore, improving data synchronization and expanding reporting capabilities would empower salon owners to make informed business decisions. Despite these areas for improvement, Salon Ultimate remains a competitive salon management software option for businesses seeking comprehensive salon management solutions. But does not meet all of requirements of the TRH Salon.

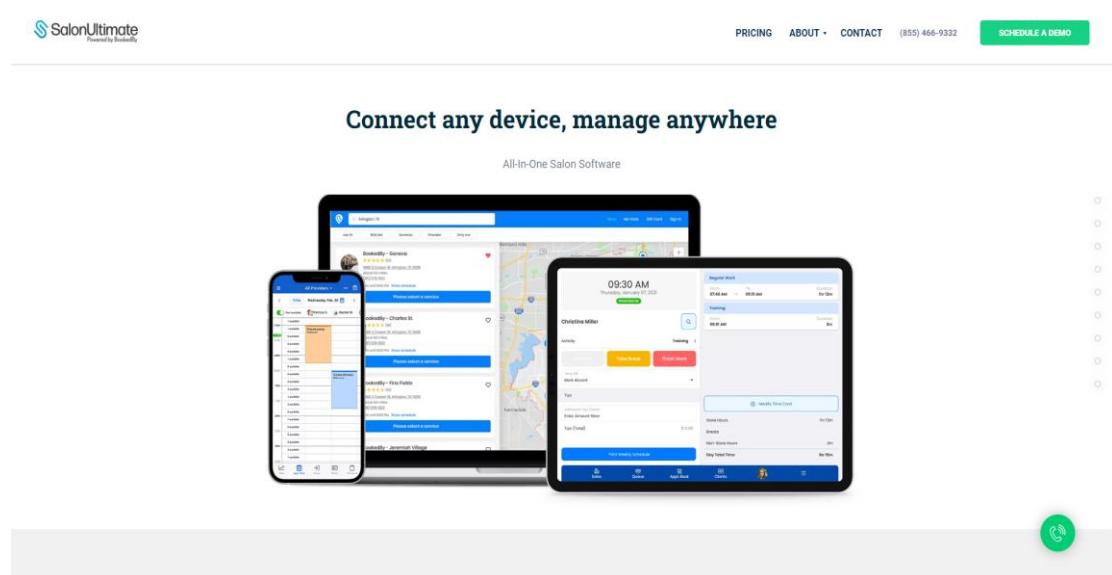
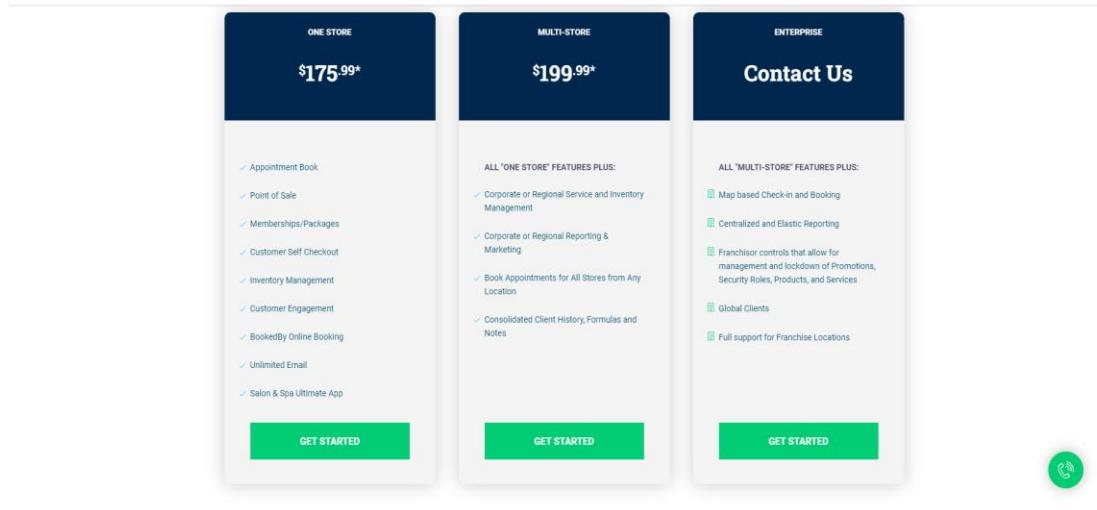


Figure 9:Salon Ultimate - Salon Management Software



The screenshot shows the pricing section of the SalonUltimate website. It features three main plans: 'ONE STORE' (\$175.99\*), 'MULTI-STORE' (\$199.99\*), and 'ENTERPRISE'. Each plan has a dark blue header with its name and price. Below each price is a list of features. At the bottom of each plan section is a green 'GET STARTED' button. To the right of the 'ENTERPRISE' section is a circular icon with a phone receiver symbol.

ONE STORE	MULTI-STORE	ENTERPRISE
\$175.99*	\$199.99*	Contact Us
<ul style="list-style-type: none"><li>✓ Appointment Book</li><li>✓ Point of Sale</li><li>✓ Memberships/Packages</li><li>✓ Customer Self Checkout</li><li>✓ Inventory Management</li><li>✓ Customer Engagement</li><li>✓ BookedBy Online Booking</li><li>✓ Unlimited Email</li><li>✓ Salon &amp; Spa Ultimate App</li></ul>	<ul style="list-style-type: none"><li>✓ Corporate or Regional Service and Inventory Management</li><li>✓ Corporate or Regional Reporting &amp; Marketing</li><li>✓ Book Appointments for All Stores from Any Location</li><li>✓ Consolidated Client History, Formulas and Notes</li></ul>	<ul style="list-style-type: none"><li>✓ Map based Check-in and Booking</li><li>✓ Centralized and Elastic Reporting</li><li>✓ Franchisor controls that allow for management and lockdown of Promotions, Security Roles, Products, and Services</li><li>✓ Global Clients</li><li>✓ Full support for Franchise Locations</li></ul>
<a href="#">GET STARTED</a>	<a href="#">GET STARTED</a>	<a href="#">GET STARTED</a>

Figure 10: Salon Ultimate Features & Pricing

## 2.2 System Comparison

After reviewing multiple salon management systems, we can compare them based on the features they provided.

S1 – Fresha - Salon Management System.

S2 – Salon IRIS - Salon Management System

S3 – Phorest - Salon Management Software

S4 – MioSalon - Salon Management Software

S5 – Salon Ultimate - Salon Management Software

PS – Proposed System.

Features	S1	S2	S3	S4	S5	PS
Appointment Scheduling	Yes	Yes	Yes	Yes	Yes	Yes
Customer Management	Yes	Yes	Yes	Yes	Yes	Yes
Inventory Management	Yes	Yes	Yes	Yes	Yes	Yes
User/Employee Management	Yes	Yes	Yes	Yes	Yes	Yes
Billing Management (Invoicing)	Yes	Yes	Yes	Yes	Yes	Yes
Income and Expenses Management	Yes	Yes	Yes	Yes	Yes	Yes
Reports and Marketing Tools (Discount, and SMS notification)	Yes	Yes	Yes	Yes	Yes	Yes
Assign more than one employee to the service	No	No	No	No	No	Yes
Bank and card type wise promotion Setup	No	No	No	No	No	Yes
Mobile Apps	Yes	Yes	Yes	Yes	Yes	No*

Table 1: System Comparison

\*System will be mobile friendly, but it does not contain specific mobile app.

In conclusion, there are various salon management systems available in the market with different features and limitations. The proposed Online Salon Management System (OSMS) for TRH Salon aims to provide a comprehensive and user-friendly system that meets the specific needs of TRH Salon.

### **3 Project Plan and Initial Design.**

Project Plan Attached in the Appendix 5.1.

#### **3.1 Components of the system**

Software, hardware, and a Database are the three primary components of a system. In this project, the software and database components play a significant role.

##### **3.1.1 Software Components and Tasks**

The proposed system software disclosed incorporates multiple hardware and software components and interfaces with external systems. While the software components cover the majority of the system's functionality, it relies on a number of external interfaces for persistence and unhandled activities, as well as for interacting physically with humans.

### 3.1.1.1 User Management

User Management is the most important feature that the system has. It maintains the users of the system. Each user has specific different abilities and skills in the system. Because of this user account maintenance, system continuously works with proper maintenance.

Requirement	Description
UM 01	The system shall allow users to create an account by entering user details such as name, email, and password.
UM 02	The system shall allow authenticate user to login to the system.
UM 03	The system shall allow user to update the account details.
UM 04	The system shall allow user to change the password.
UM 05	The system shall allow user to logout from the system.

Table 2: User Requirements

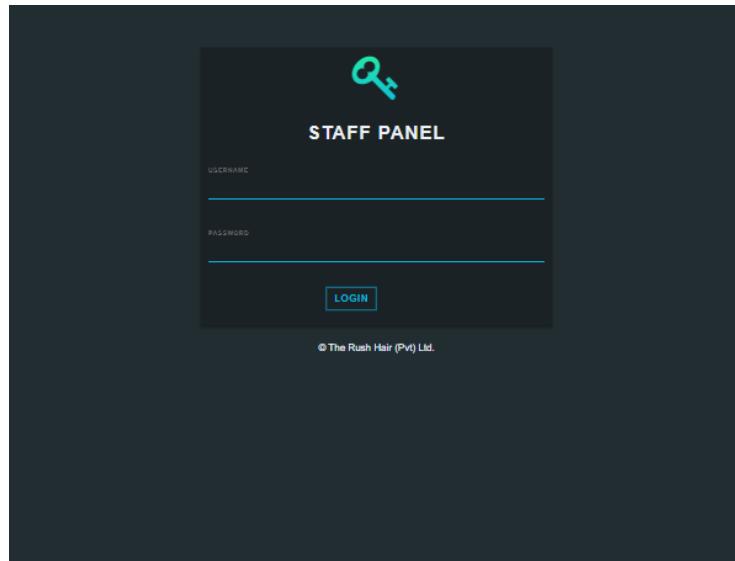


Figure 11: Login Interface

The screenshot shows a web-based application titled "Create Account" for "TheRushHair.lk". The URL in the browser is "office.therushhair.lk". The form contains the following fields:

- User code: [Text input]
- User Password: [Text input]
- Full Name: [Text input]
- Status: Active (checkbox checked)
- Email: [Text input]
- User Type: Select (dropdown menu)
- Gender: Male (radio button selected) Female (radio button)
- Date of Join: 01/01/1900 [Text input]
- NIC: [Text input]
- Emp Address: [Text input]
- Emp Address2: [Text input]
- City: [Text input]
- Phone No: [Text input]

At the bottom are two buttons: "Back" and "Save".

Figure 12: Create User UI

### 3.1.1.2 Booking Management

Customers can phone the salon directly, via WhatsApp or other social media to book the appointment. the salon's operator will arrange a booking for them with the appropriate service and time. In addition, booking can assign staff.

Requirement	Description
BM 01	The system shall allow admin, manager, staff to create appointment with one or more stylist
BM 02	The system shall allow admin, manager, staff to edit and cancel appointment.
BM 03	The system shall allow admin, manager, staff to take advance payment in the same window if needed.
BM 04	The system shall allow admin, manager, staff to select the source customer make appointment.
BM 05	The system shall allow admin, manager, staff to employe special time slot blocking on appointment creation.
BM 06	The system shall allow admin, manager, staff to multiple service in one booking window

Table 3 : Booking Management

Client: <input type="text"/>	Contact: <input type="text"/>	Date: <input type="text"/>
Job 01: <input type="text"/>	Time: <input type="text"/>	Talent: <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>
Job 02: <input type="text"/>	Time: <input type="text"/>	Talent: <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>
Job 03: <input type="text"/>	Time: <input type="text"/>	Talent: <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>
Job 04: <input type="text"/>	Time: <input type="text"/>	Talent: <input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>
Remarks: <input type="text"/>		
Source: <input type="text"/>	Taken by: <input type="text"/>	<input type="button" value="Re-Schedule"/>
Advance: <input type="text"/> Pay Mode: <input type="text"/>		

Figure 13: Appointment Interface

### 3.1.1.3 Service Management

Every salon has to provide beauty culture-related services with veracity. The salon must maintain a price and service description list for each service. It is also beneficial for salon personnel to interact with clients. Especially when drafting legislation. This manage service module will be introduced to the system to fulfil this need.

Requirement	Description
SM 01	The system shall allow admin, manager to create, update, Inactive and view service category.
SM 02	The system shall allow admin, manager, staff to create, update, Inactive and view services under the category.
SM 03	The system shall allow staff to view service category.

Table 4 : Service Management

#### **3.1.1.4 Billing Management (Invoicing)**

Customers had to pay the full billed amount when the service was received. In this case, the salon's front desk should be able to generate bills for customers. And the payment details for the bill should be recorded in the system.

Requirement	Description
BMI 01	The system shall allow admin, manager, staff to give service by service discount manually on the invoice window (Line discount Manually).
BMI 02	The system shall allow admin, manager, staff to give Total bill discount manually on the invoice window (Net discount Manually).
BMI 03	The system shall allow admin, manager, staff to accept Cash, Bank Card and Gift voucher payment.
BMI 04	The system shall allow admin, manager, staff to Identify item using barcode.
BMI 05	The system shall allow admin, manager, staff to use give promotion in invoice window. (Automatic calculation by system)
BMI 06	The system shall allow admin, manager, staff to sell product in this module.

*Table 5: Billing Management*

#### **3.1.1.5 Customer Management**

Their customers are mostly regular basis. So, they are planning to keep historical data to evaluate who got services and products from their salons. For this, they need to keep customers' details against the issued reports' historical data.

Requirement	Description
CM 01	The system shall allow admin, manager, staff to Create, edit, delete customers.
CM 02	The system shall allow admin, manager to Manage Customer Credit Level.
CM 03	The system shall allow admin, manager, staff to Update their skin and hair details on the system.

*Table 6: Customer Management*

The screenshot shows a web-based customer registration form titled "Customer Registration". The form fields include: Customer code (text input), Customer Name (text input), Customer Email (text input), Gender (radio buttons for Male and Female, with Male selected), Birthday (date input showing 01/01/1900), Customer NIC (text input), Customer Address (text input), Customer Address2 (text input), City (text input), and Phone No (text input). At the bottom right are "Back" and "Save" buttons.

Figure 14:Customer Registration

### 3.1.1.6 Inventory Management

Each day salon expends a lot of products and equipment in their activities. So, it should be managed to prevent run-out of stocks. General reorder points for those items are set into the system and the system will manage messages to indicate before stock ran out.

Requirement	Description
IM 01	The system shall allow admin, manager to view the category.
IM 02	The system shall allow admin, manager to Create, Edit, view and Inactive the Product.
IM 03	The system shall allow admin, manager, staff to create, Edit and Inactive the Brand
IM 04	The system shall allow admin, manager, staff to Create, Edit and Inactive Suppliers.

IM 05	The system shall allow admin, manager, staff to Create, Edit and view Good Receive Note
IM 06	The system shall allow admin, manager, staff to Create, Edit and view Supplier Return Note
IM 07	The system shall allow admin, manager, staff to Create, Edit and view Stock Adjustment Note
IM 08	The system shall allow admin, manager, staff to Create, Edit and view Sales Return.
IM 09	The system shall allow admin, manager, staff to Create, Edit and view Store Issue.
IM 10	The system shall allow admin, manager, staff to Create, Edit and view Supplier.
IM 11	The system shall allow admin, manager, staff to Create, Edit and view reorder level.

Table 7: Inventory Management

The screenshot shows a web-based application window titled "Create Supplier". The URL in the address bar is "office.therushhair.lk". The form fields are as follows:

- Sup code: [Text input field]
- Full Name: [Text input field]
- Email: [Text input field]
- Status: Active (checkbox checked)
- NIC/BRC No: [Text input field]
- Address: [Text input field]
- Address2: [Text input field]
- City: [Text input field]
- Phone No: [Text input field]

At the bottom of the form are two buttons: "Back" and "Save".

Figure 15: Create Supplier UI

The screenshot shows a web-based application window titled "GRN". At the top, there are input fields for "GRN code:" and "Sup code:", both currently empty. To the right of these is a date field set to "03/20/2023". Below the input fields is a 4x3 grid table with the following data:

▼ Head 1	▼ Head 2	▼ Head 3
Cell 1	Cell 2	Cell 3 0
Cell 4	Cell 5	Cell 6 0
Cell 7	Cell 8	Cell 9 0
Cell 10	Cell 11	Cell 12 0

Below the grid, the text "Total: 00000.00" is displayed. At the bottom of the screen are two buttons: "Back" and "Save".

Figure 16: GRN UI

### 3.1.1.7 Income and Expenses Management

Every salon has Expenses and Some Extra incomes, in here we can record expenses and income on the system.

Requirement	Description
IEM 01	The system shall allow admin, manager, staff to Create, Edit and view Payment Vouchers to Pay supplier and other Expenses.
IEM 02	The system shall allow admin, manager, staff to Create, Edit and view Income Receipt to Maintain the Salon Incomes.
IEM 03	The system shall allow admin, manager, staff to Income and expenses using cash, card and etc.

Table 8: Income and Expenses Management

### **3.1.1.8 Promotion Management**

Special Promotions and Bank Card wise promotion will be Configured under this module. The Promotions will apply automatically when conditions are fulfilled.

Requirement	Description
PM 01	The system shall allow admin, manager to Create, Edit and view Bank Credit and Debit Card wise Promotion.
PM 02	The system shall allow admin, manager to Create, Edit and view Category wise Promotion.
PM 03	The system shall allow admin, manager to Create, Edit and view Service wise Promotion.

*Table 9:Promotion Management*

### **3.1.1.9 Generate reports.**

System reports are most important for owners to get valuable decisions and predictions in management. Many types of reports are allowed in the system. Daily summary of payment details, summary of booking, monthly summary of them, and most requested report types by salon owner, and so on.

Requirement	Description
RG 01	The system shall allow admin, manager to generate summary reports
RG 02	The system shall allow admin, manager to generate sales reports
RG 03	The system shall allow admin, manager to generate stock reports
RG 04	The system shall allow admin, manager to generate promotion reports
RG 05	The system shall allow admin, manager to generate prediction reports
RG 06	The system shall allow admin, manager to generate many types of reports

*Table 10:Generate Reports*

### **3.1.1.10 Loyalty Point System**

A loyalty point system can be a useful feature in a salon management system, as it allows the salon to reward loyal customers and incentivize repeat business. By using a loyalty point system, salons can encourage customer loyalty, increase engagement, and drive repeat business. The module can also help the salon to track customer behavior and preferences, and tailor marketing efforts accordingly.

Requirement	Description
LPS 01	The system shall allow admin, manager to Create, Edit and view Member type
LPS 02	The system shall allow admin, manager to Create, Edit and view Member point range
LPS 03	The system shall allow admin, manager to Create, Edit and view Discount Percentage of each membership range.
LPS 04	The system shall allow to discount automatically according to membership package.

*Table 11:Loyalty Point System.*

### **3.1.1.11 Gift Voucher Management**

A gift voucher module can be a useful feature to add to a salon management system, as it allows salons to sell and track gift vouchers, which can help generate additional revenue and attract new customers.

Requirement	Description
GVM 01	The system shall allow admin, manager to Create and view Gift Voucher
GVM 02	The system shall allow admin, manager, staff to Sell and Redeem Voucher at Invoice Stage

*Table 12:Gift Voucher Management*

### **3.1.1.12 Customer Feedback Module**

A customer feedback feature can be a valuable addition to a salon management system, as it allows salons to gather feedback from their customers and use this information to

improve their services and customer experience. By using a customer feedback module, salons can gain valuable insights into their customers' experiences, identify areas for improvement, and ultimately improve customer satisfaction and retention. The module can also help the salon to respond promptly to any negative feedback, showing customers that their opinions are valued and taken seriously.

Requirement	Description
CFM 01	The system shall allow customer to give a feedback based on service.
CFM 02	The system shall allow admin, manager to view customer feedback

*Table 13: Customer Feedback Module*

### **3.1.1.13 Notification**

With the notification system plan to send the SMS Notification to the customers and employees regarding service and invoicing. By using a notification module, salons can improve communication with customers and employees, increase engagement, and reduce missed appointments.

Requirement	Description
NO 01	The system shall allow automatically send SMS to customer when make, update, cancel the appointment.
NO 02	The system shall allow automatically send SMS to customer when finished the Invoicing.
NO 03	The system shall allow automatically send SMS to Stylish when make, update, cancel the appointment.

*Table 14: Notification*

### 3.1.1.14 Salon Dashboard

A salon dashboard is a visual representation of the salon's performance and provides a quick overview of important metrics such as appointments, product sales, staff performance, and more.

Requirement	Description
SD 01	The system shall allow admin, manager to view Salon Dashboard.
SD 02	The system shall allow admin, manager to access and view Salon Dashboard report and chart.

Table 15:Salon Dashboard

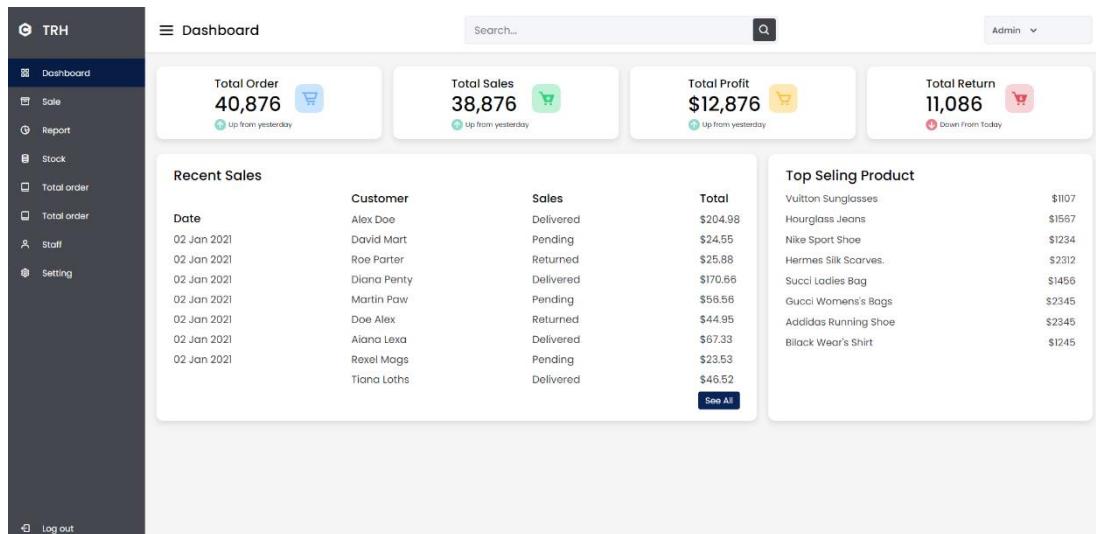


Figure 17:Salon Dashboard Possible View

### **3.1.2 Database Component**

The database component is a critical component of the proposed salon management system. It will save all information about customers, appointments, services, staff, inventory, and other facts. MySQL, an open-source relational database management system, will be used to design the database.

ER Diagram attached on appendix 5.5.

Database Table:

- Adjustment
- Adjustment details
- Advance
- Appointment
- Brand
- Customer
- Employee
- Expenses
- Feedback
- Giftvoucher
- GRN
- GRN Details
- Income
- Invoice
- Invoice details
- Invoice pay details.
- Job
- Job Catogery
- Labour\_Charges
- Loyalty\_membership
- Payment type
- Product

- Promotion
- Salary Advance
- Sales\_Return
- sales\_return Details
- SMS
- Store\_issue
- Store\_issue\_details
- Supplier
- supplier retund details
- Supplier Return

### **3.1.3 Hardware Component**

The hardware components of the operating environment include the computers, servers, printers, and other devices required to run the system. These devices should be powerful enough to support the software and network components of the system.

Processor	2.0 gigahertz (GHz) x86- or x64-bit dual core processor
Memory	4GB RAM or higher
Hard disk	25 GB free hard disk or higher
Display	Intel graphic or VGA with a resolution of 1024 x 768 or more support
Internet	Dedicated connection to the internet

### **3.2 Proposed Methodology**

The primary objective of the proposed web-based salon management system is to facilitate salon owners in managing their operations efficiently. The system will enable salon owners to manage appointments, inventory, employees, and other aspects of their business from a single platform. Salon owners can register with the system and log in to access their account dashboard. From there, they can view appointments, manage employee schedules, and track inventory levels. The system will also provide them with the option to connect with multiple vendors simultaneously, thereby allowing them to source supplies and equipment easily.

Customers can book appointments with their preferred stylists through the system. They can view available time slots and select the one that best suits them. Once the appointment is confirmed, customers will receive a notification. The system will also allow salon owners to organize and manage events and promotions through the platform. They can create event listings, invite customers, and manage registrations all within the system. To ensure that salon owners are selecting the right employees, the system will enable them to evaluate employee performance based on customer feedback. Additionally, employees can access the system to manage their schedules and view their performance metrics.

The suggested software development methodology for this system is the iterative waterfall model. The model provides feedback loops from every phase to its preceding phases, allowing for modifications and improvements to be made at each iteration. This approach will enable the system to evolve with new functional capabilities as the needs of the salon and its customers change. It will also enable salon owners to test the system's functionality before moving on to more detailed features.

### **3.3 Technologies Adapted**

#### **3.3.1 PHP Programming Language**

PHP is an open-source server-side scripting language that is widely used for web development. It was first released in 1995 and has since become one of the most popular programming languages on the web. PHP is particularly suited to building dynamic websites and web applications that require database interaction, such as content management systems and e-commerce platforms. It is easy to learn and has a vast library of functions and extensions, making it a versatile language for a range of web development tasks. PHP code is typically embedded directly into HTML pages, allowing it to generate dynamic content and interact with databases on the server side. It remains a widely used and actively maintained programming language with a large community of developers and online resources available.

#### **3.3.2 Web Server – Apache**

Apache Web Server is designed to create Web servers that have the ability to host one or more HTTP-based websites. Notable features include the ability to support multiple programming languages, server-side scripting, an authentication mechanism and database support. Apache Web Server can be enhanced by manipulating the code base or adding multiple extensions.

#### **3.3.3 XAMPP**

XAMPP stands for Cross-Platform (X), Apache (A), MySQL (M), PHP (P) and Perl (P). It is a simple, lightweight Apache distribution that makes it extremely easy for developers to create a local web server for testing purposes. Everything you need to set up a web server application (Apache), database (MySQL), and scripting language (PHP) – is included in a simple extractable file. XAMPP is also cross-platform, which means it works equally well on Linux, Mac and Windows.

### **3.3.4 HTML**

HTML (Hypertext Markup Language) is the standard markup language used for creating web pages and other online content. It is a key technology that enables the creation of the World Wide Web, allowing users to access information and interact with online services. HTML is used to define the structure, content, and presentation of web pages, using a series of tags and attributes that define various elements and their properties. This allows web designers and developers to create rich, interactive content, including text, images, videos, forms, and more. HTML is designed to be easy to learn and use and is supported by all major web browsers. It is also continually evolving, with new versions and updates being released regularly to keep pace with the latest web technologies and standards. Overall, HTML is an essential tool for anyone involved in web development or online content creation.

### **3.3.5 Bootstrap**

Bootstrap is an open-source front-end framework that is widely used for building responsive and mobile-first websites and web applications. It was developed by Twitter and released in 2011, and has since become one of the most popular frameworks for web development. Bootstrap provides a collection of pre-built HTML, CSS, and JavaScript components that can be easily customized and combined to create modern and professional-looking websites. These components include things like navigation menus, buttons, forms, modals, and much more. Bootstrap also includes a powerful grid system that enables designers and developers to create complex layouts that adapt to different screen sizes and devices. This makes it easy to create websites that look great on desktops, tablets, and mobile phones. Overall, Bootstrap is a powerful tool for web developers and designers, enabling them to create high-quality and responsive web content quickly and efficiently.

### **3.3.6 CSS**

CSS (Cascading Style Sheets) is a styling language used for describing the presentation and layout of web pages. It allows developers to separate the presentation of a website from its content, making it easier to manage and maintain. CSS is used to style HTML elements, including fonts, colors, backgrounds, borders, and more. It also allows developers to create complex layouts, including multi-column designs and responsive layouts that adjust to different screen sizes and devices. CSS works by applying rules and styles to HTML elements, with cascading and inheritance used to determine the final appearance of each element. With CSS, developers can create visually appealing and engaging websites that are both functional and easy to navigate. CSS is an essential part of modern web development and is supported by all major web browsers.

### **3.3.7 MySQL**

MySQL is an open-source relational database management system that is widely used for storing and managing structured data. It was first released in 1995 and has since become one of the most popular database systems on the web. MySQL supports a wide range of features, including multi-user access, transactions, and foreign key support. It is also highly scalable, making it suitable for both small and large-scale applications. MySQL can be accessed using a variety of programming languages, including PHP, Java, and Python, and is commonly used for powering content management systems, e-commerce platforms, and other web-based applications. MySQL is known for its reliability, performance, and ease of use, and is supported by a large and active community of developers and users.

### **3.3.8 JavaScript**

JavaScript is a popular programming language used for creating interactive and dynamic web content. It was first introduced in 1995 and has since become one of the most widely used programming languages in the world. JavaScript is a client-side

language that is executed by web browsers, allowing developers to create interactive user interfaces, perform form validation, and manipulate the content of web pages. It can also be used on the server-side with Node.js to build scalable and high-performance web applications. JavaScript is a versatile and powerful language that is used by millions of developers worldwide, and its popularity continues to grow with the rise of web and mobile applications.

## **3.4 Test and Deployment plan**

### **3.4.1 Testing**

#### **3.4.1.1 Unit Testing**

Unit testing is a software testing technique where individual units or components of a software application are tested in isolation from the rest of the system to ensure that they are working as expected. These units are typically the smallest testable parts of an application, such as functions or methods. Unit testing is important because it helps catch bugs early in the development process, reduces the cost of fixing defects, and makes it easier to maintain and extend the codebase over time. By automating the testing of individual units, developers can ensure that their code is working correctly and can easily identify and fix any issues that arise.

#### **3.4.1.2 Integration Testing**

Integration testing is a software testing technique where multiple individual components or units of an application are combined and tested as a group to ensure that they work together as expected. The goal of integration testing is to identify any defects or issues that may arise when the units are integrated. Integration testing is performed after unit testing and before system testing. It helps to identify issues related to the interactions between different units and ensures that the overall functionality of the system is working as intended. This type of testing can be done in a variety of ways, including top-down integration testing, bottom-up integration testing, and hybrid integration testing. Integration testing is essential for ensuring the quality of a

software application and reducing the risk of issues arising during the later stages of development.

### 3.4.1.3 System Testing

System testing is a software testing technique where the entire system is tested as a whole to ensure that it meets the specified requirements and performs as intended in a real-world environment. This type of testing is typically performed after unit testing and integration testing have been completed. System testing focuses on testing the system as a whole, rather than individual components or units, and ensures that all components work together seamlessly to achieve the desired results. It involves a range of tests, including functional testing, performance testing, and security testing, to ensure that the system is reliable, efficient, and secure. System testing is critical for identifying defects and issues in the system and ensuring that the final product meets the customer's expectations and requirements.

### 3.4.2 Test Cases of some system part

Test Case ID	Test Case Name	Prerequisite	Test Step	Input Data	Expected Result
TC_staff_001	Staff login check valid Email and password	Should be a registered Staff member	1)First go to Backoffice(back-end) page. 2)Displayed login page 3) Enter valid Email and password . 5)Finally click on Login button.	Input valid Email Input valid Password	Successful Login

TC_staff_002	Staff login check valid Email and invalid password	Should be a registered Staff member	1)First go to Backoffice(back-end) page. 2)Displayed login page 3) Enter valid Email and invalid password . 5)Finally click on Login button.	Input valid Email Input invalid Password	Displayed "Invalid Email or Password" error message
TC_staff_003	Staff login check invalid Email and valid password	Should be a registered Staff member	1)First go to Backoffice(back-end) page. 2)Displayed login page 3) Enter invalid Email and valid password . 5)Finally click on Login button.	Input invalid Email Input valid Password	Displayed "Invalid Email or Password" error message
TC_staff_004	Staff login check invalid Email and password	Should be a registered Staff member	1)First go to Backoffice (back-end) page. 2)Displayed login page 3) Enter invalid Email and password. 5)Finally click on Login button.	Input invalid Email Input invalid Password	Displayed "Invalid Email or Password" error message

TC_backProAd d_001	Add product check fill the required field and with image	Should be a registered Staff member	1)Login to the back office(back-end). 2)Select product in the side bar. 3)Fill the all details and image. 4) click save button.	Fill the all required data and image	Displayed "File uploaded successfully" successfull message
TC_backProAd d_002	Add product check fill the required field and without image	Should be a registered Staff member	1)Login to the back office(back-end). 2)Select product in the side bar. 3)Fill the all details and without image. 4) click save button.	Fill the all required data and without image	Displayed "Please select an image file to upload empty " error message
TC_backProAd d_003	Add product check not fill the required field and with image	Should be a registered Staff member	1)Login to the back office(back-end). 2)Select product in the side bar. 3)Not fill the all details and with image. 4) click save button.	Not fill the all required data and with image	Displayed "Please fill out this field " error message
TC_backProAd d_004	Add product check not fill the required field and without image	Should be a registered Staff member	1)Login to the back office(back-end). 2)Select product in the side bar. 3)Not fill the all details	Not fill the all required data and without image	Displayed "Please fill out this field " error message and "Please select an image file to upload

		and without image. 4) click save button.		empty " error message
--	--	---	--	-----------------------

*Table 16: Test Cases for some features*

#### 4 References

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## 5 Appendix

### 5.1 Timeline

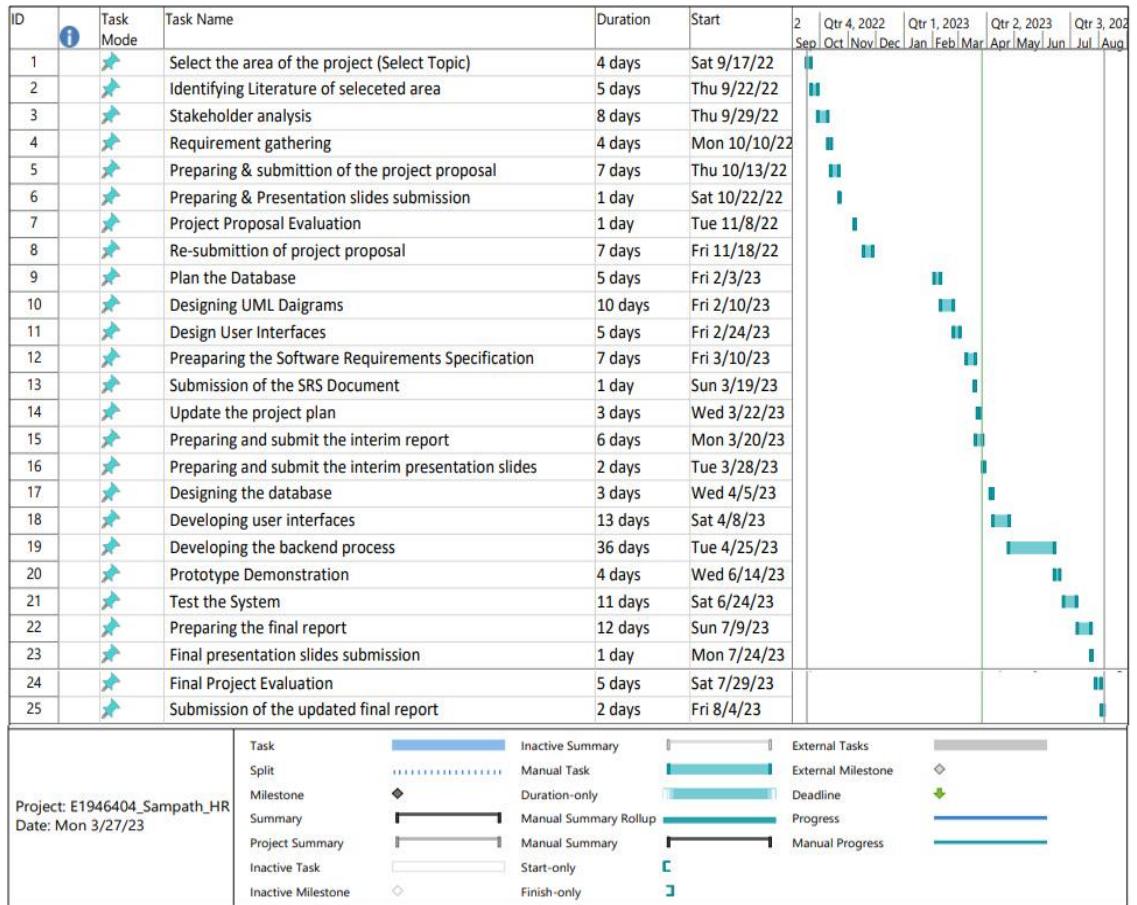


Figure 18: Gantt Chart

## 5.2 Use Case Diagrams for System

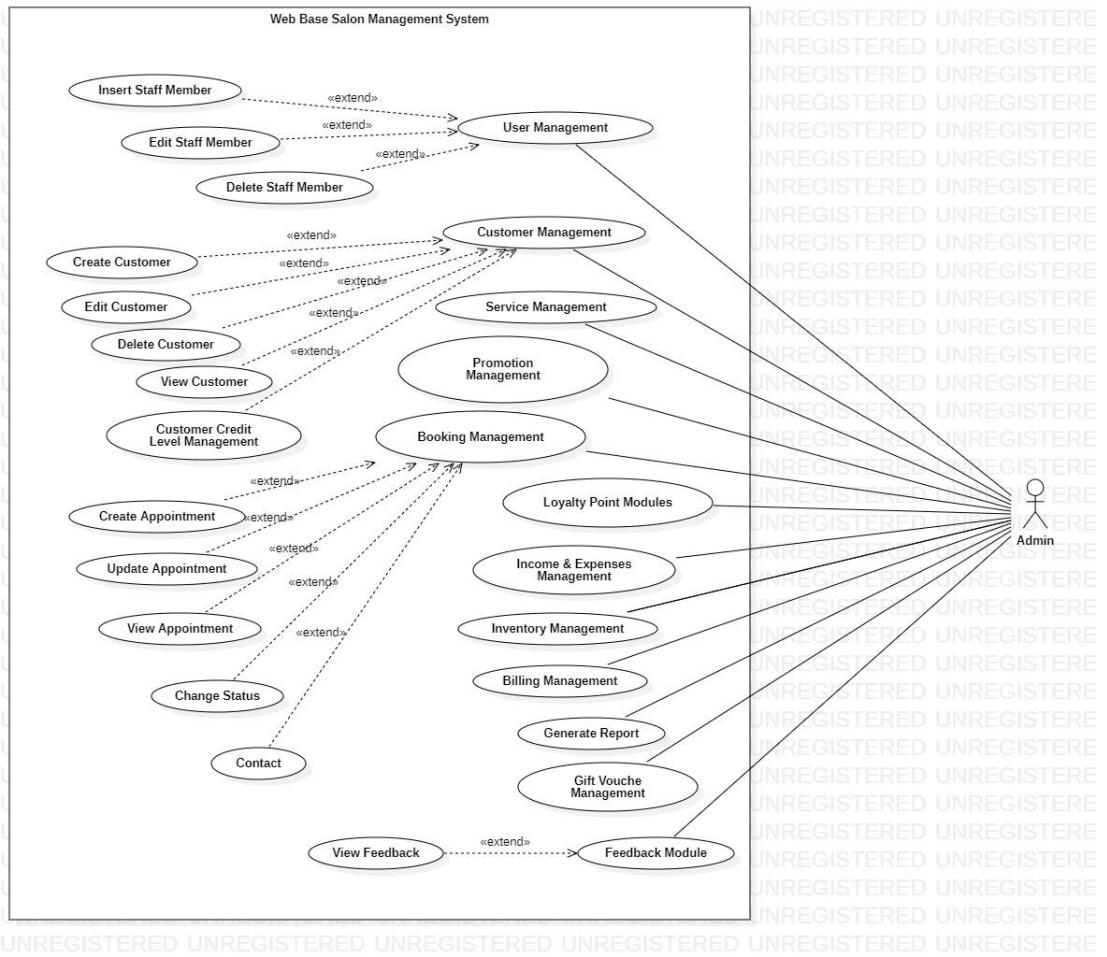
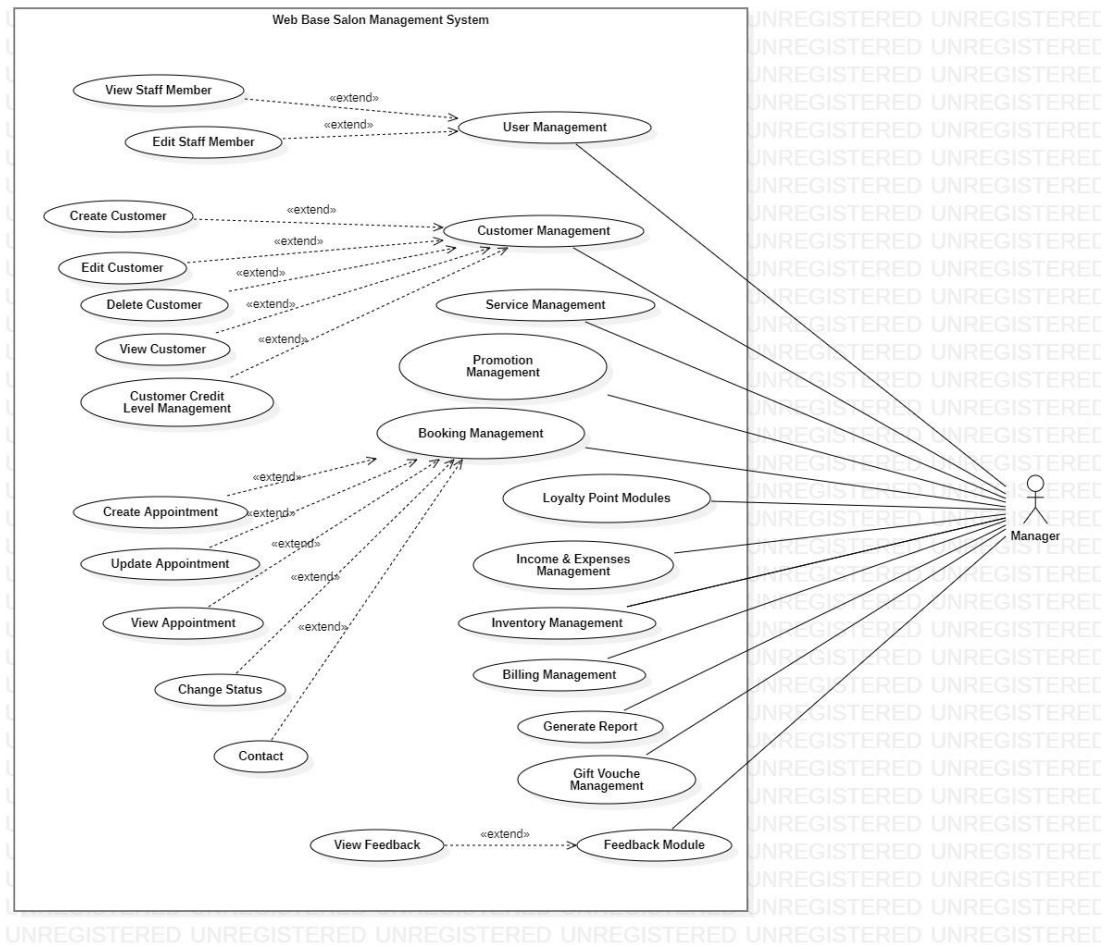


Figure 19: Use case diagram of Admin prospective



*Figure 20: Use case diagram of Manager prospective*

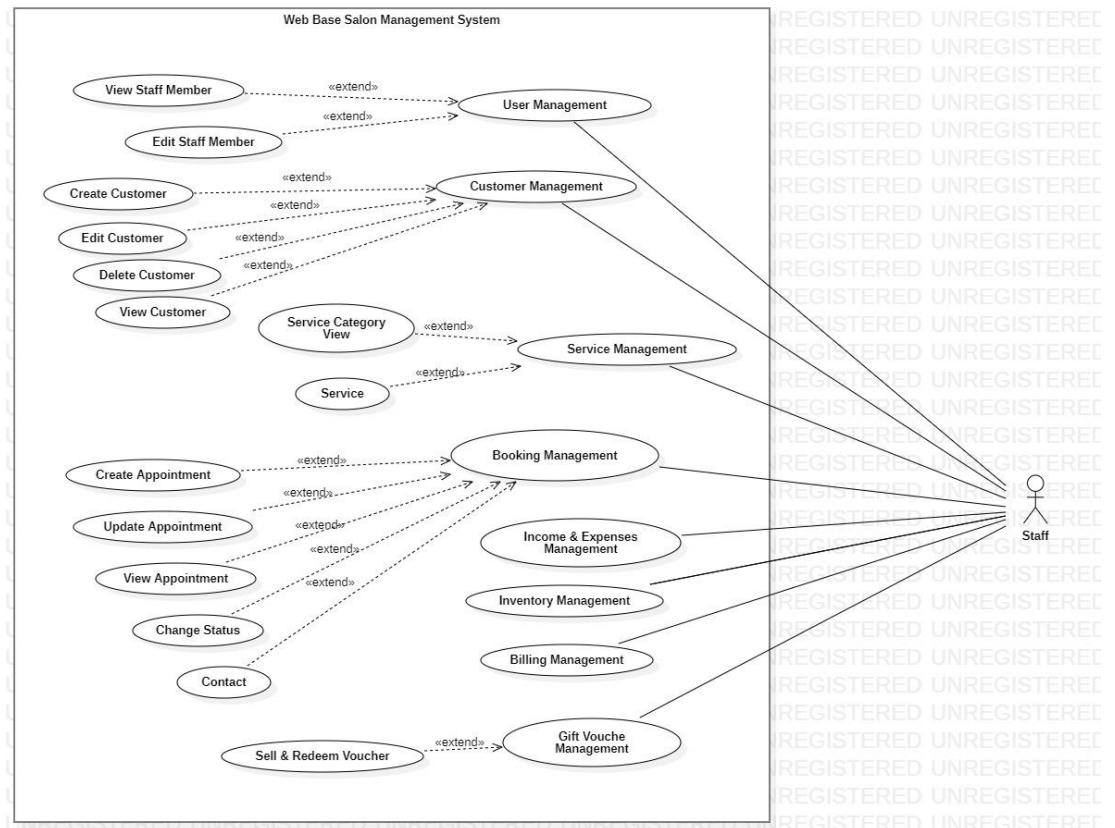


Figure 21: Use case diagram of Staff prospective

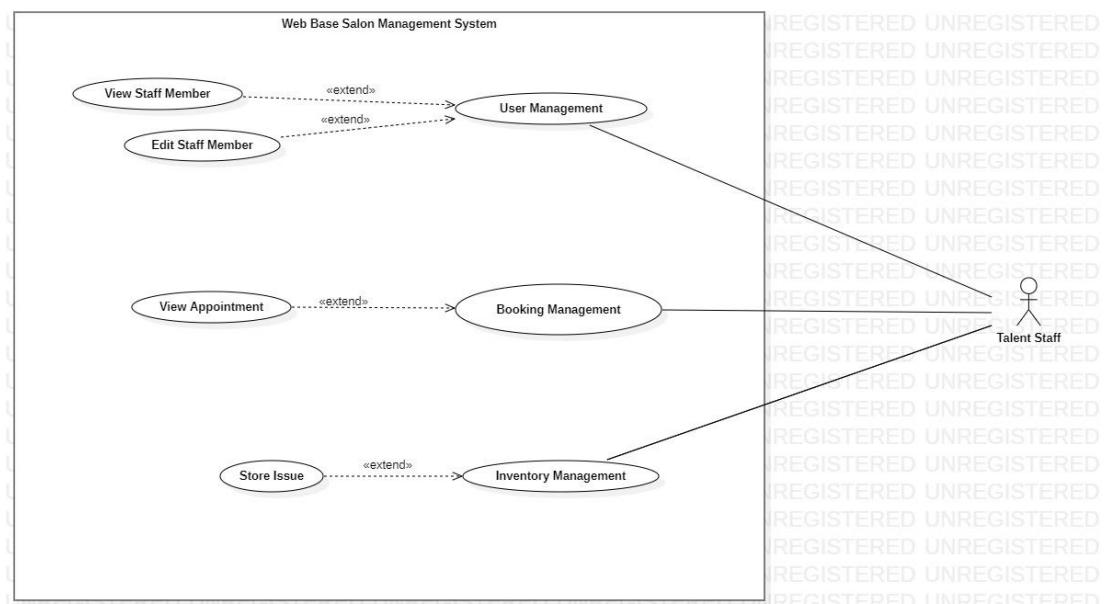


Figure 22: Use case diagram of Talent Staff prospective

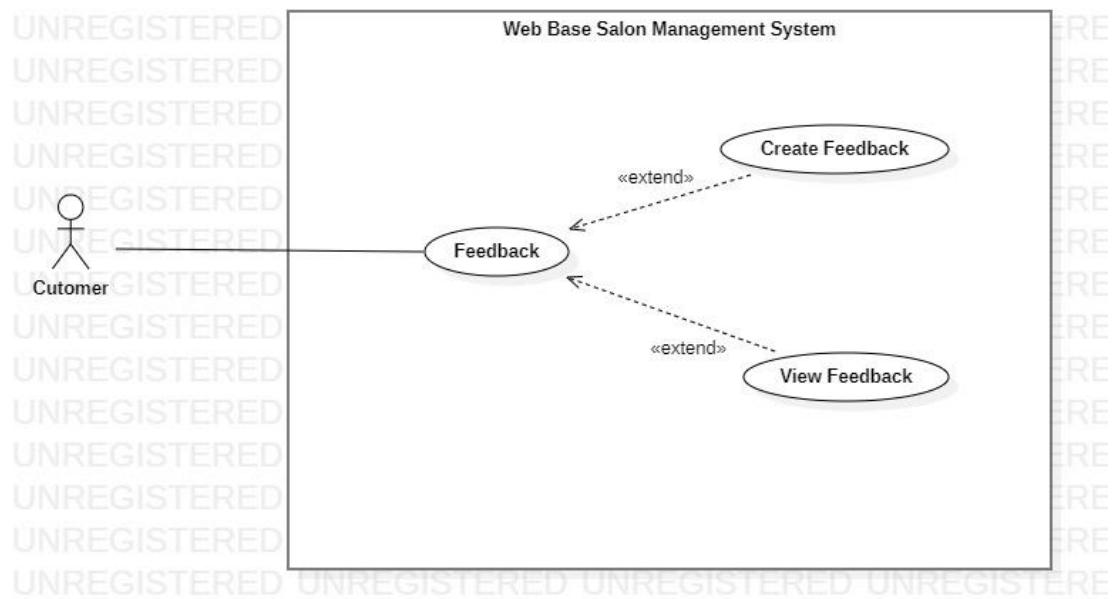


Figure 23: Use case diagram of Customer prospective

### 5.3 Use Case Diagrams (Module Wise)

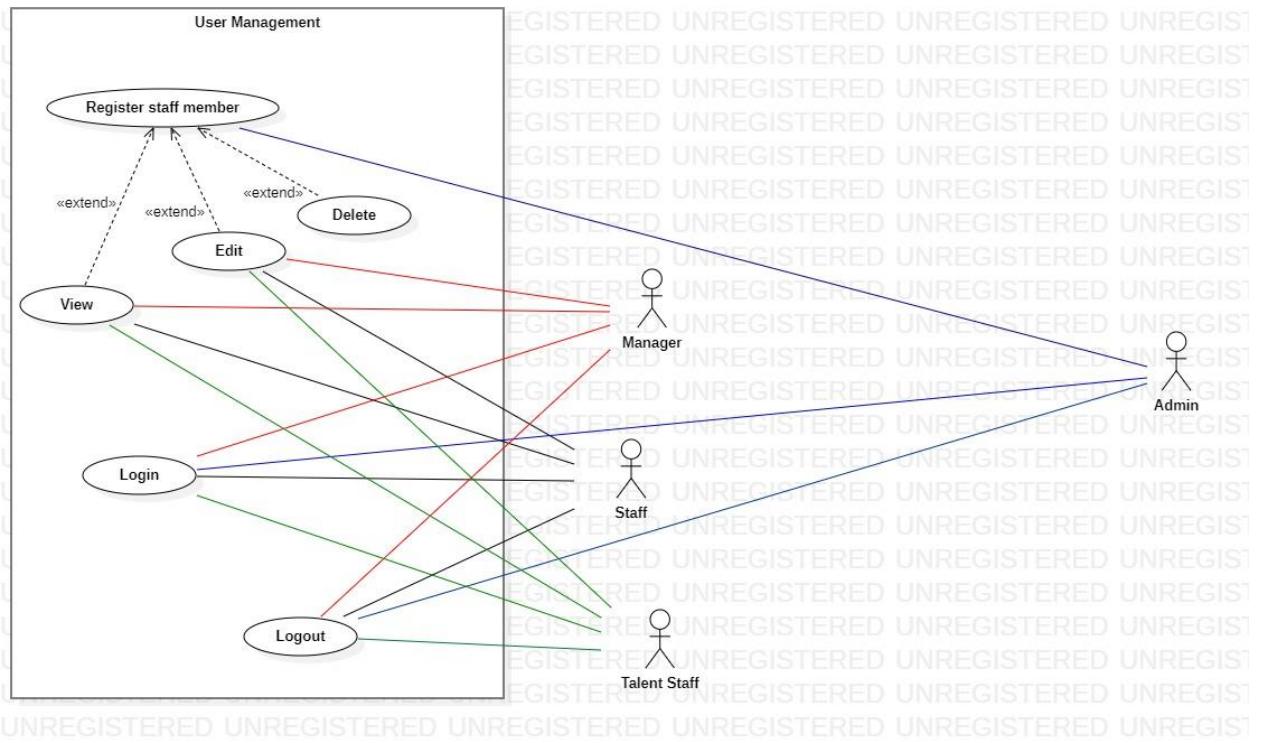


Figure 24: Use Case of User Management

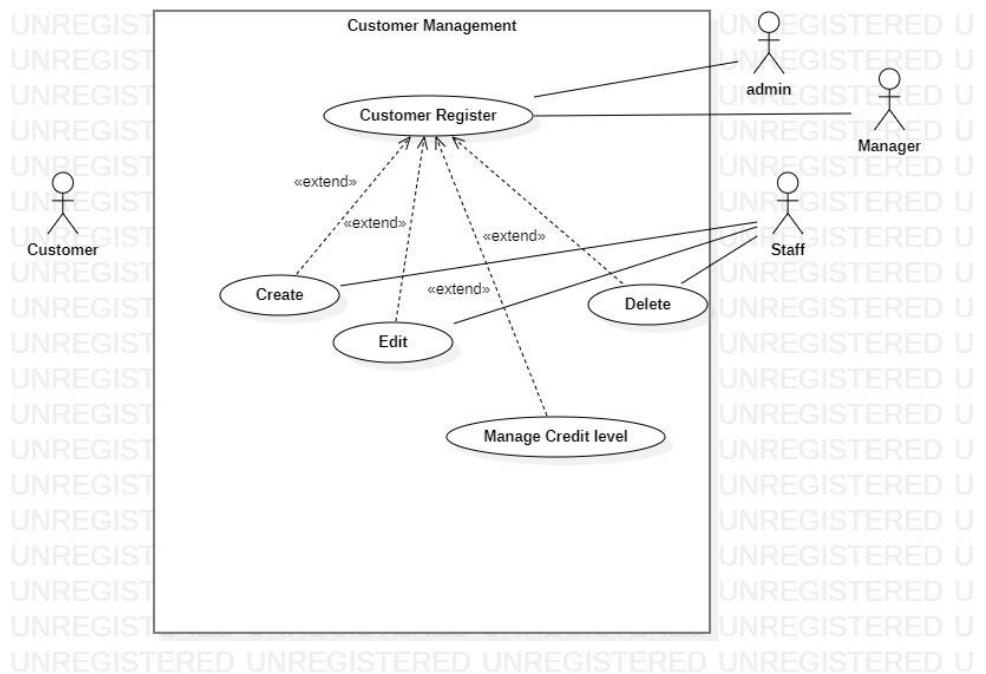


Figure 25: Use Case of Customer Management

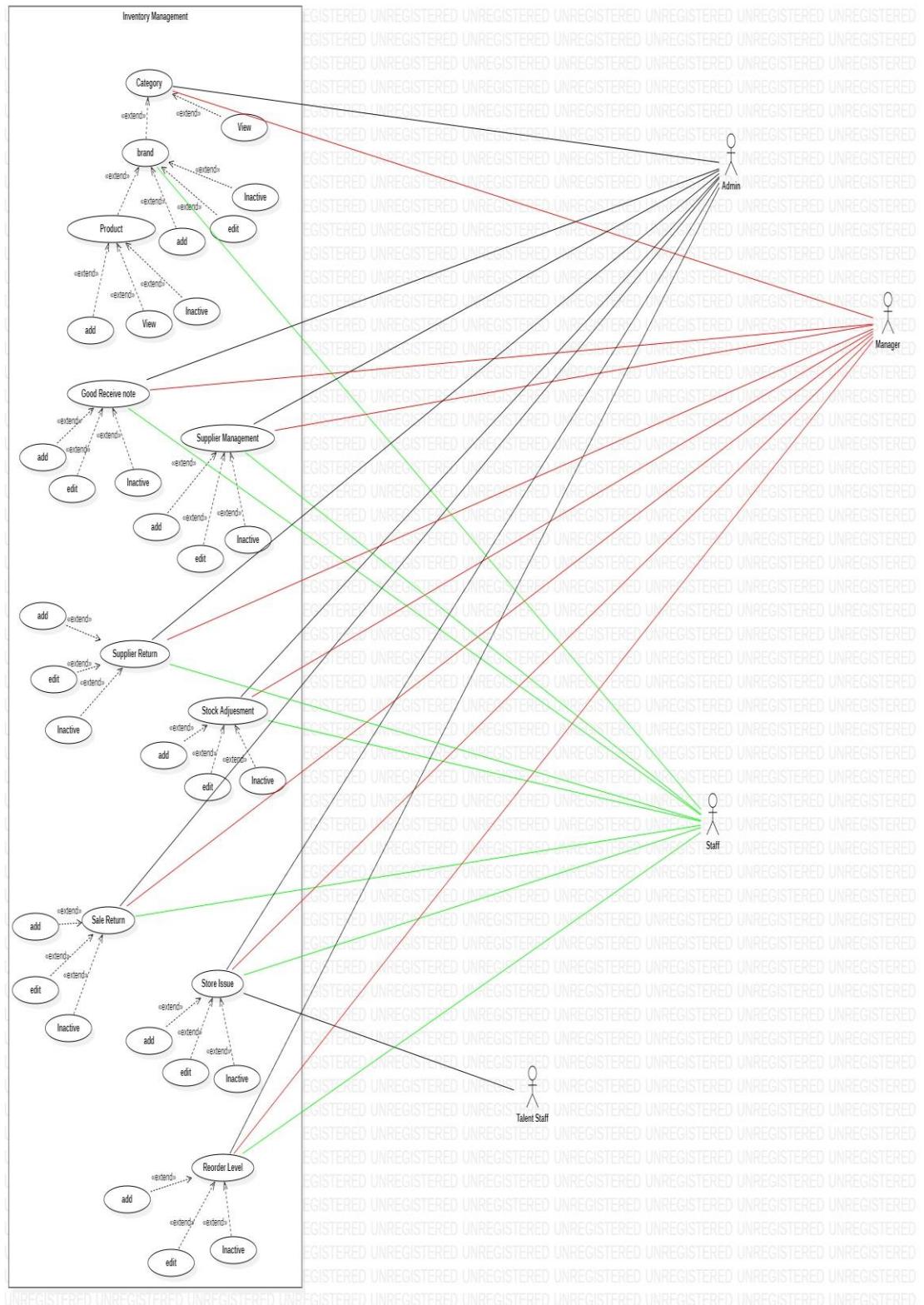


Figure 26: Use Case of Inventory Management

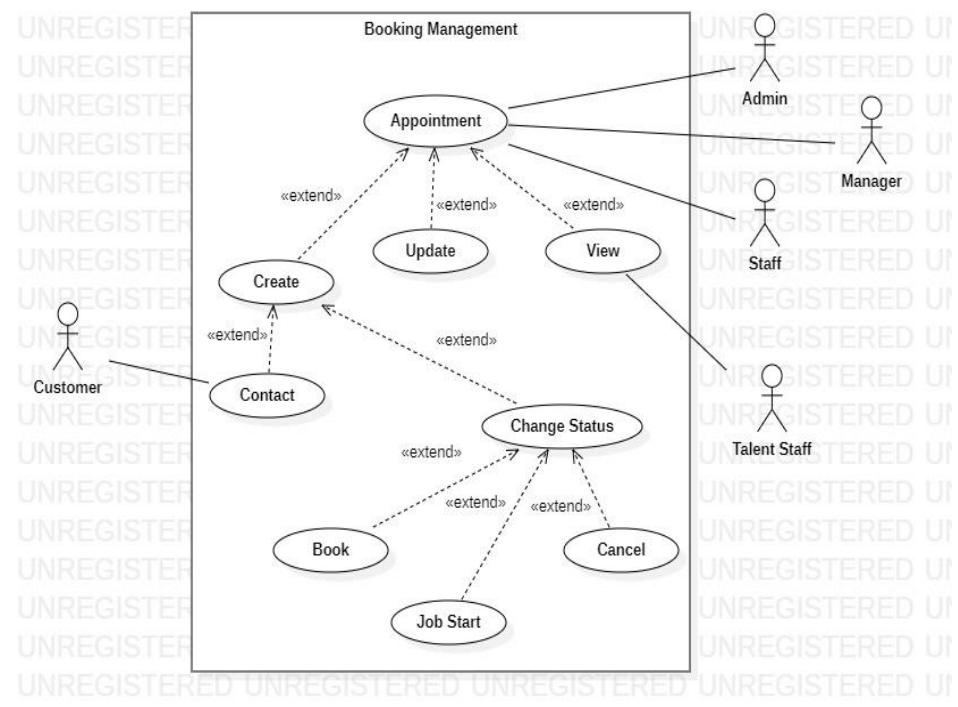


Figure 27: Use Case of Booking Management

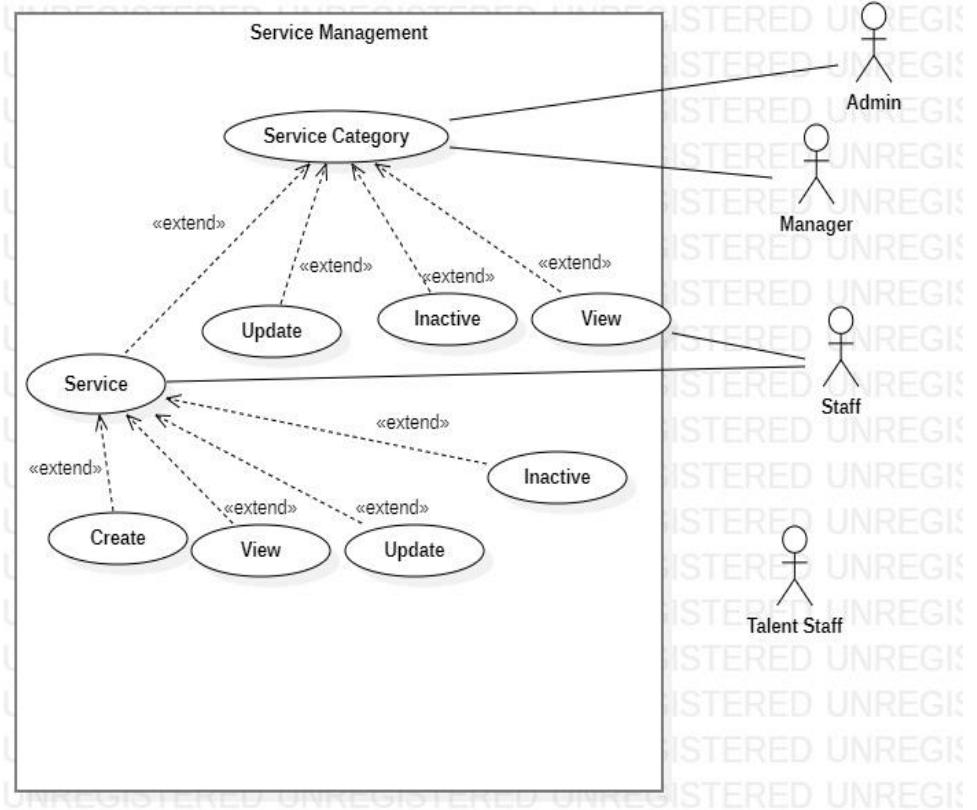


Figure 28: Use Case of Service Management

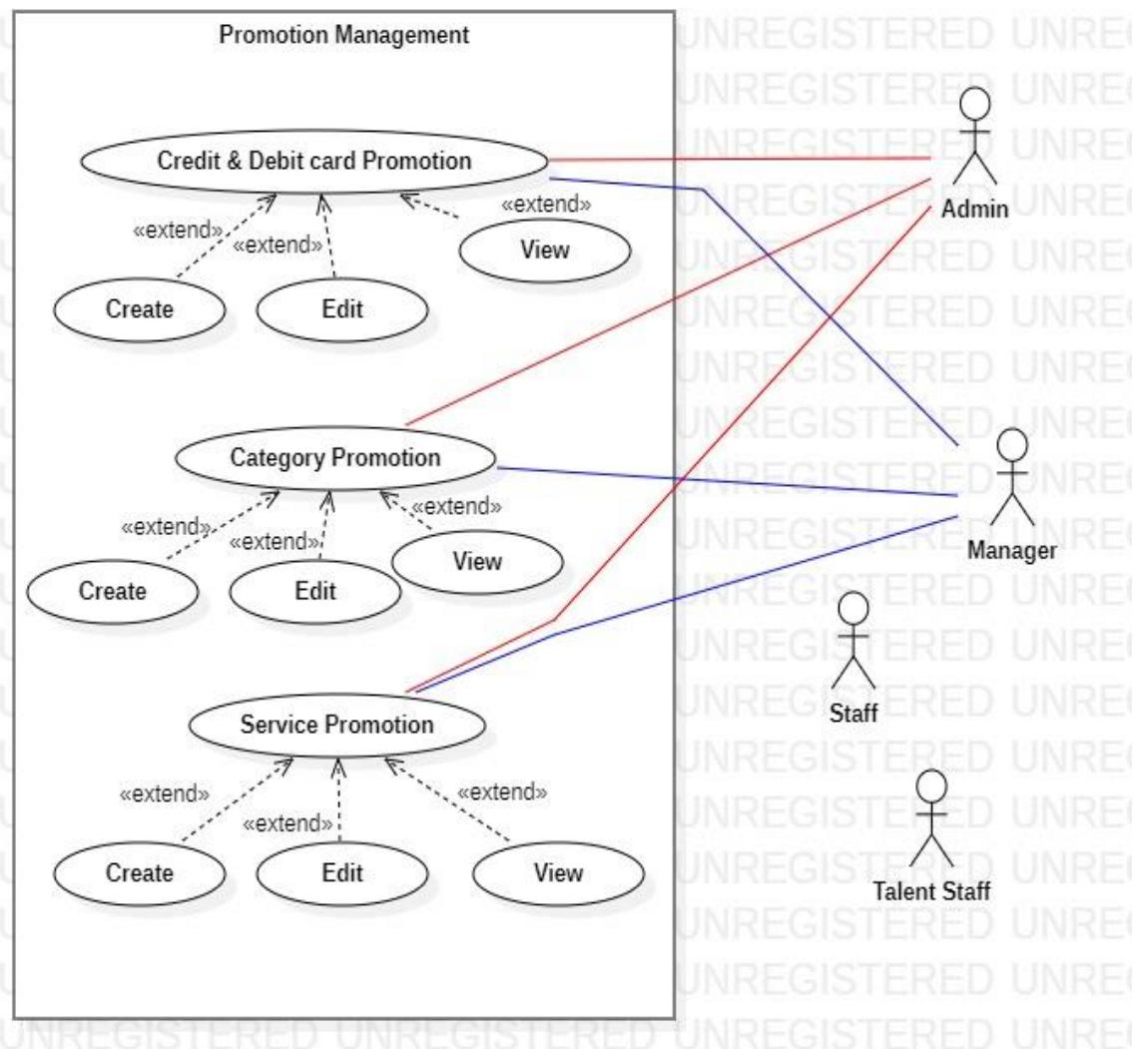


Figure 29: Use Case of Promotion Management

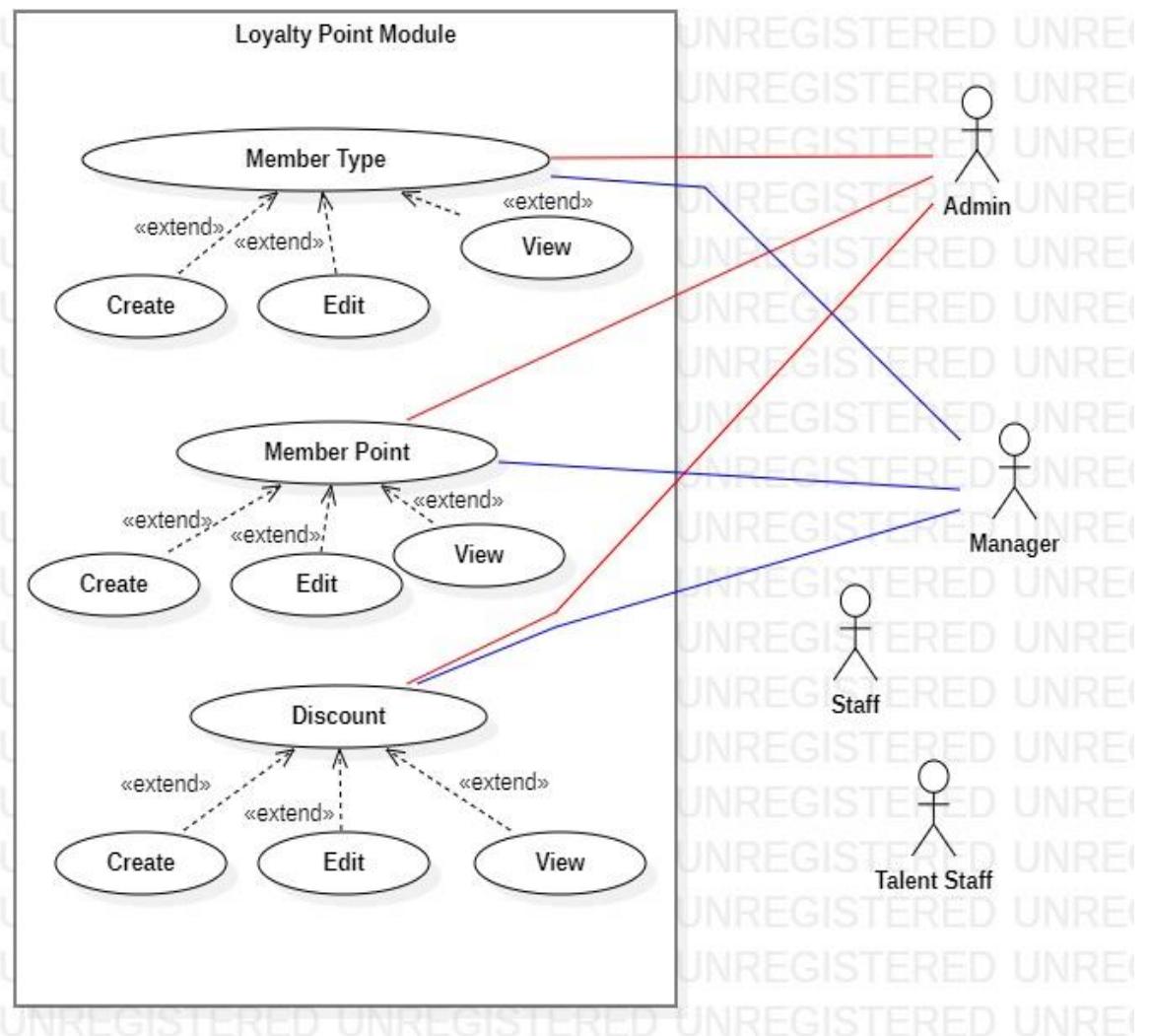


Figure 30: Use Case of Loyalty Point Module

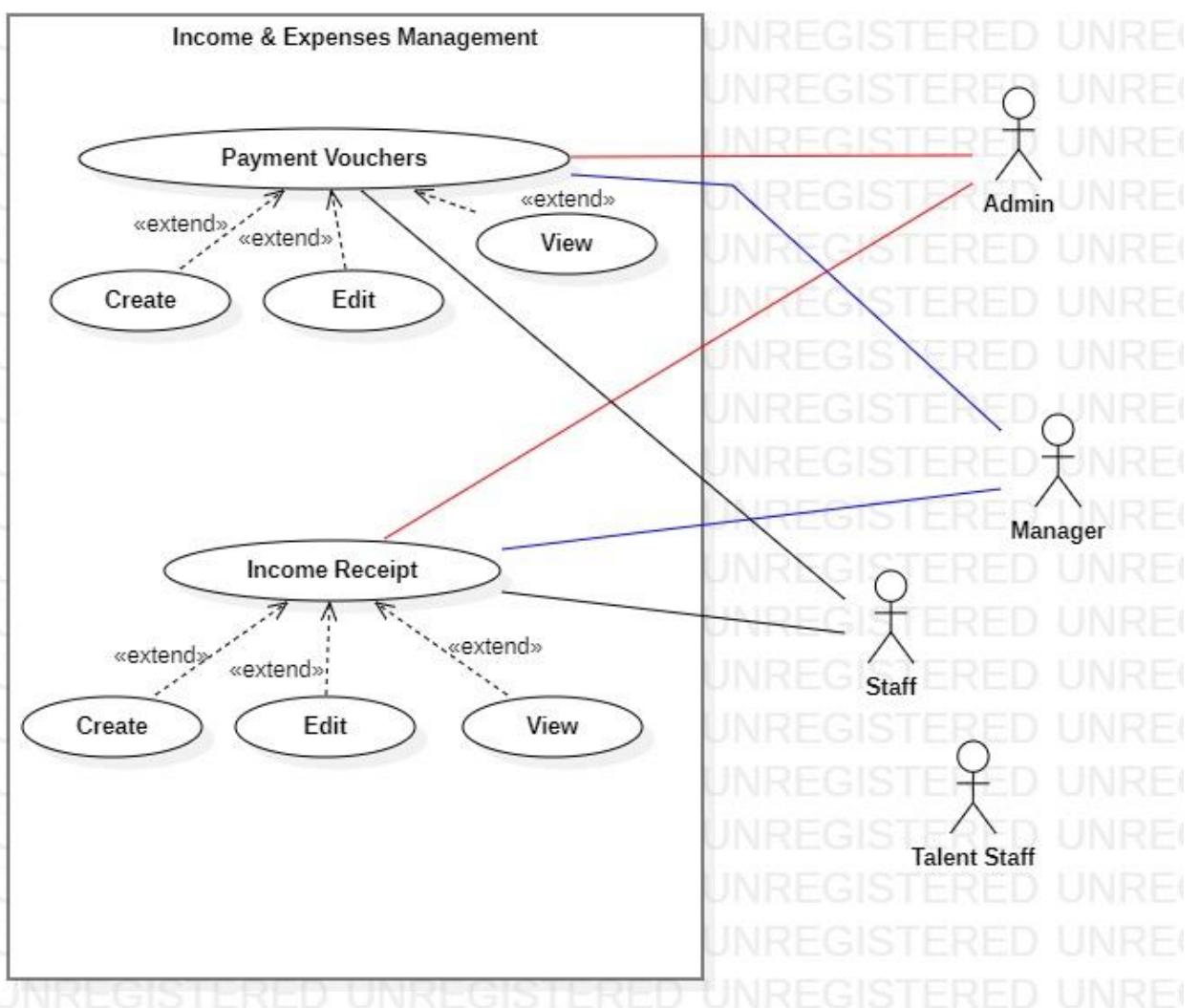


Figure 31: Use Case of Income and Expenses Module

## 5.4 Activity Diagrams

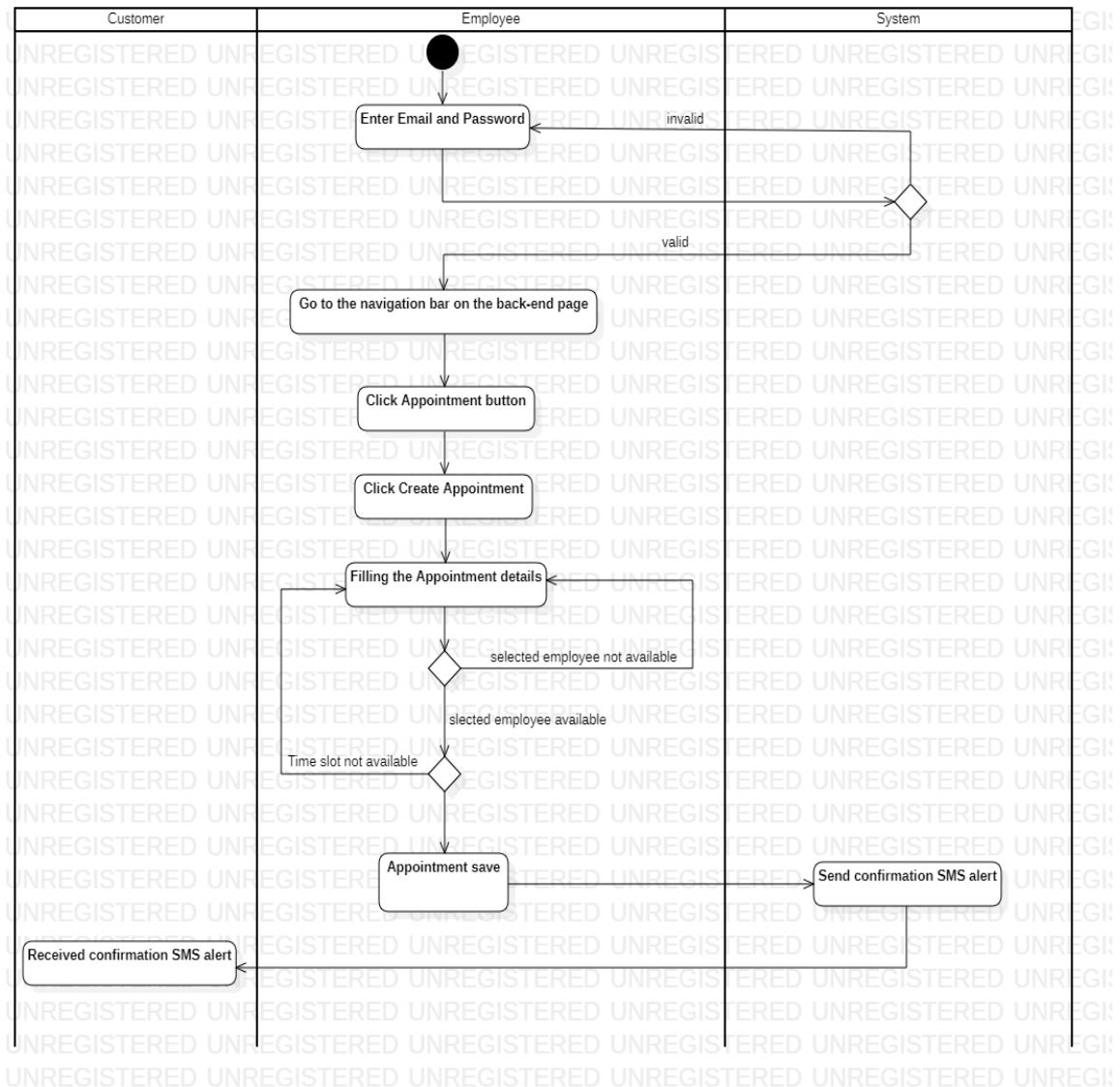


Figure 32: Activity Diagram of Booking Management

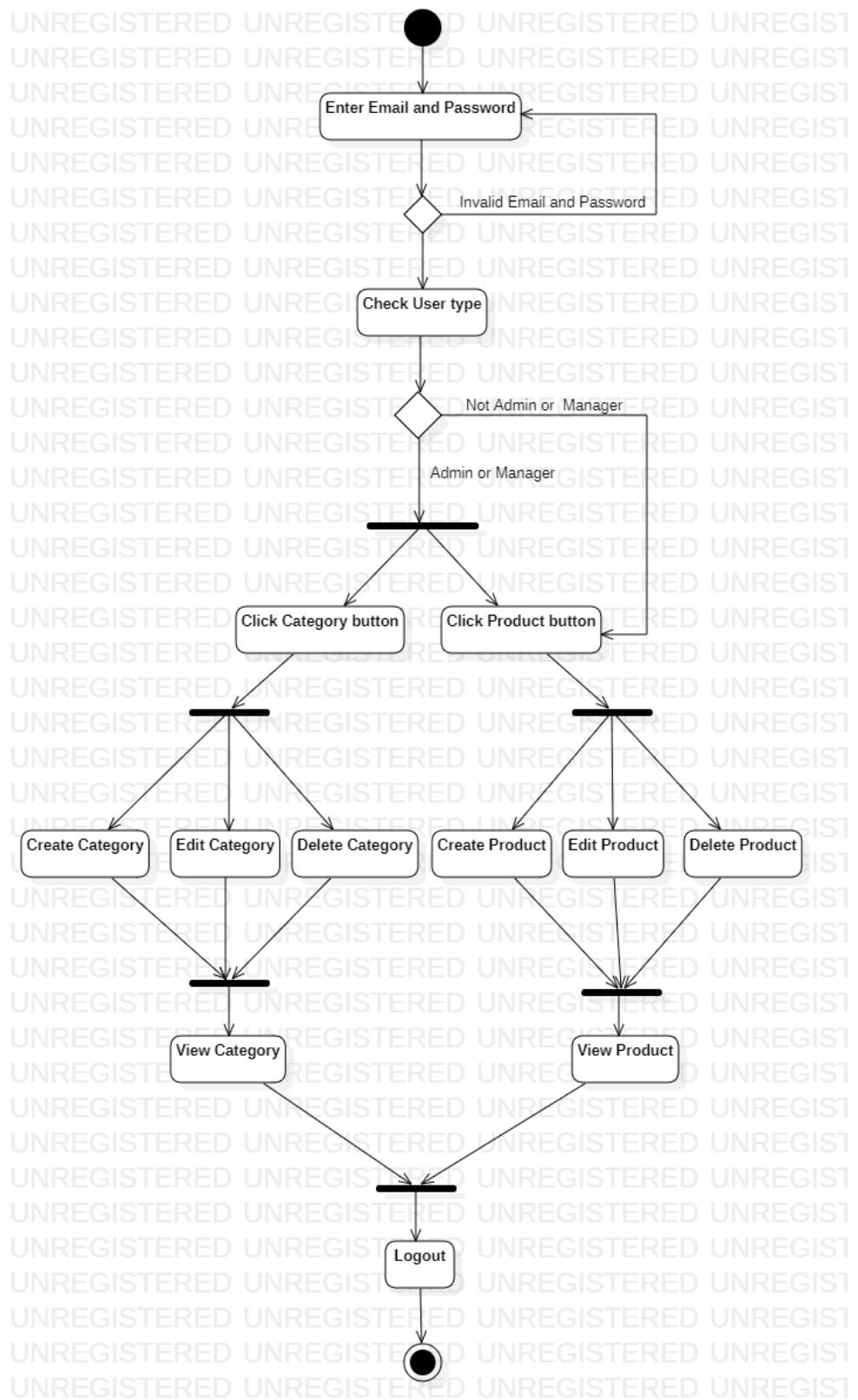


Figure 33: Activity Diagram of User Management

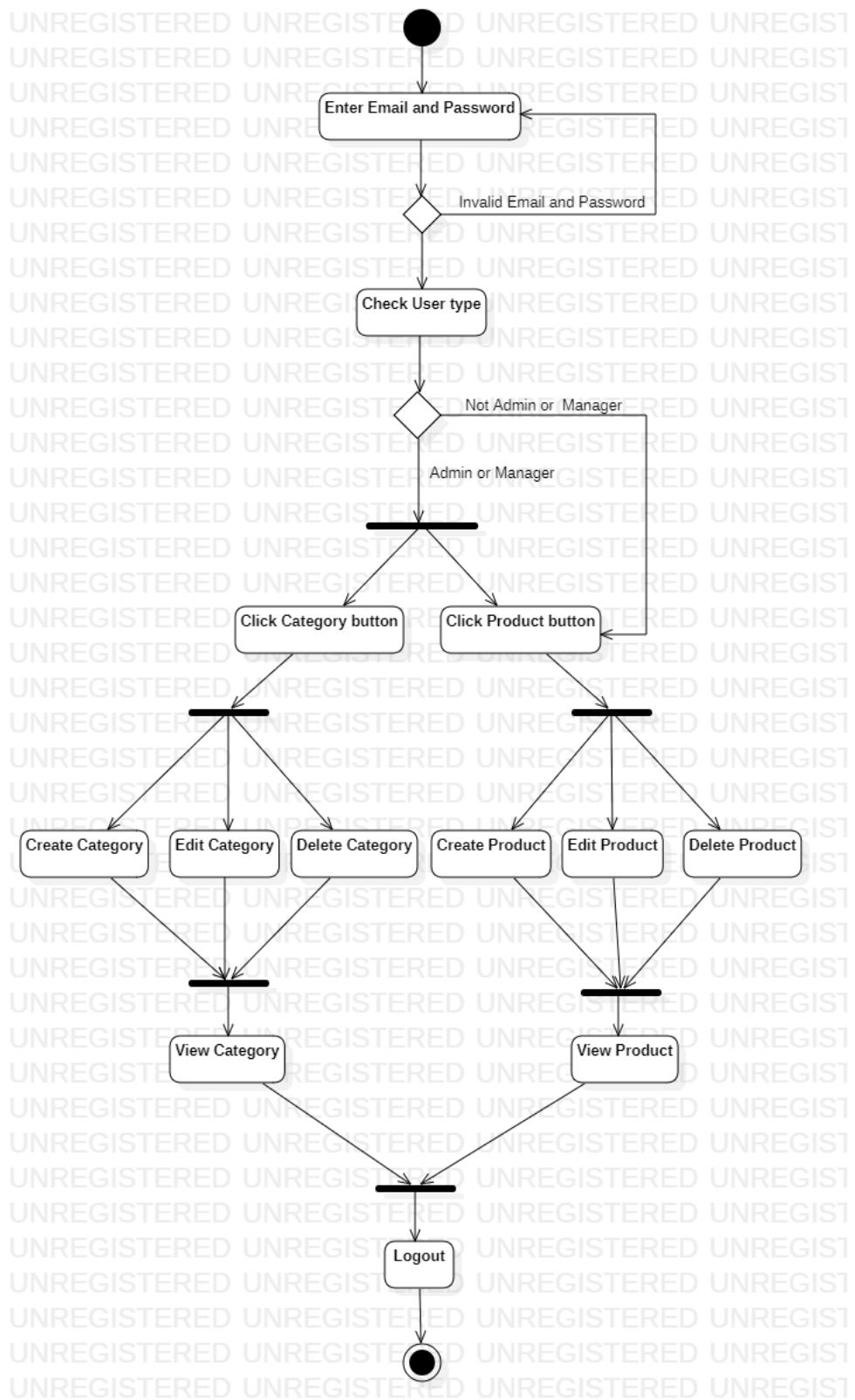
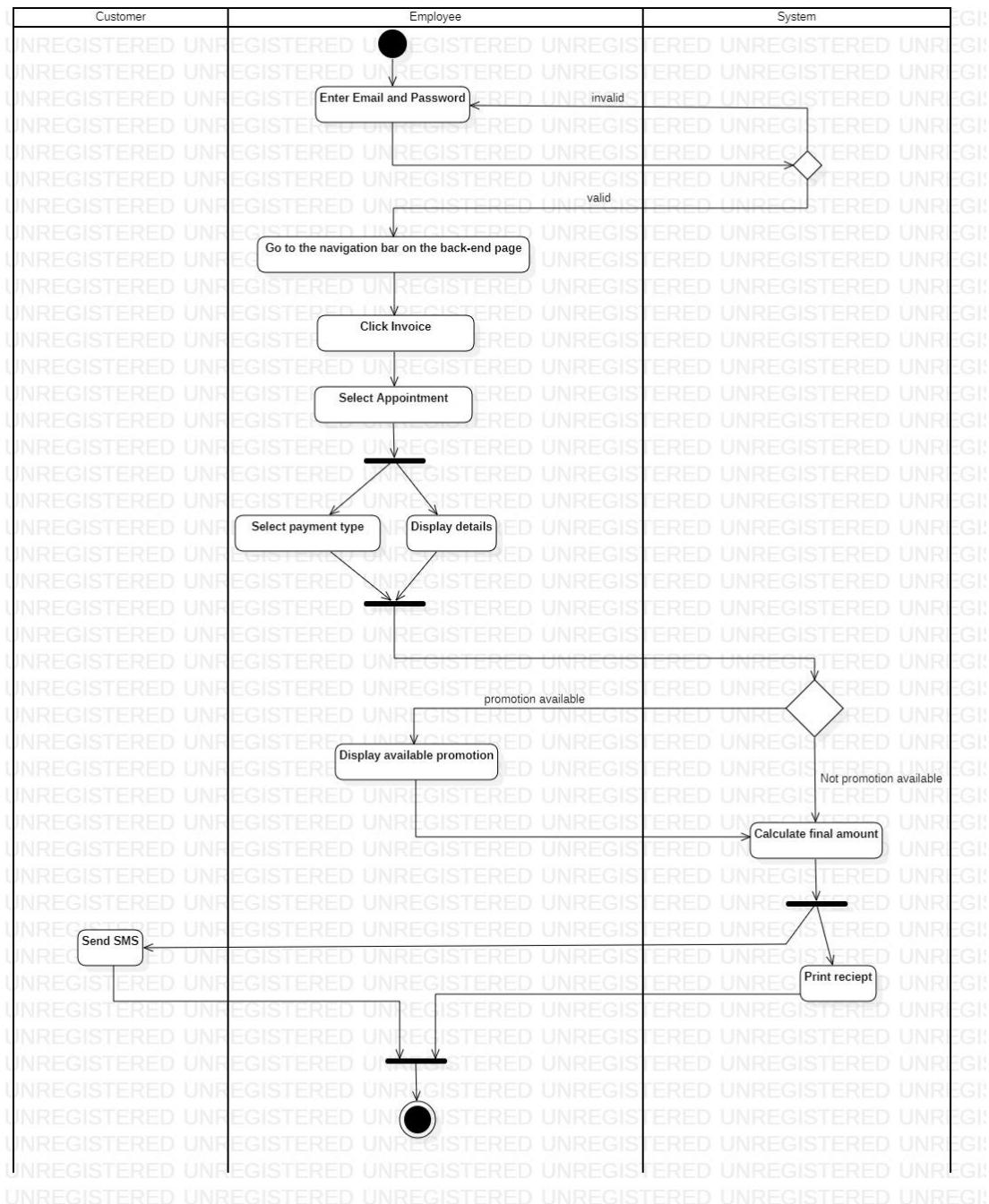


Figure 34: Activity Diagram of Product and Category Management



*Figure 35: Activity diagram of Billing Management*

## 5.5 ERD

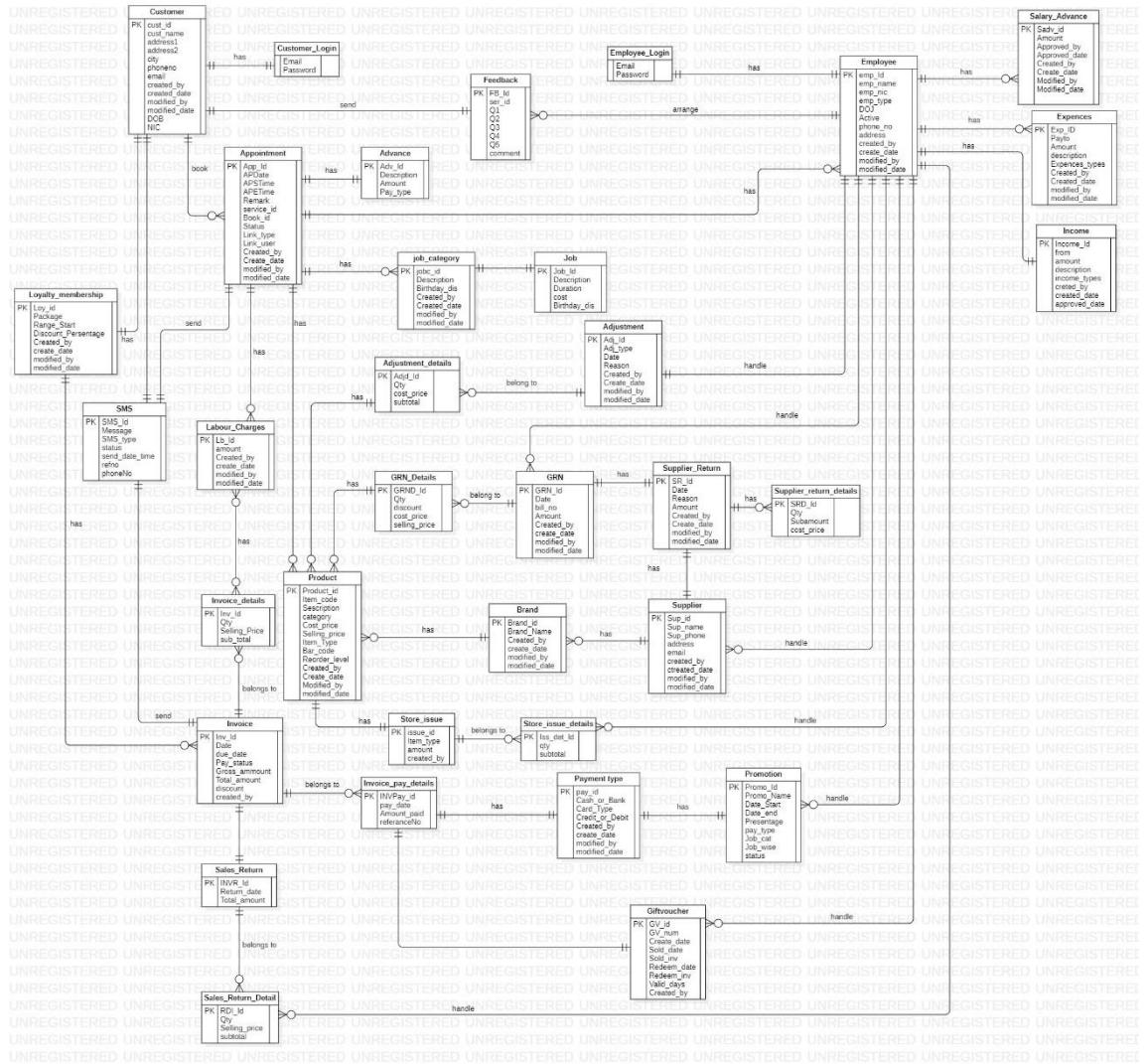


Figure 36: ER Diagram

## 5.6 SRS

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# **Software Requirements Specification**

**for**

## **Web Based Salon Management System**

**Version 1.0**

**Prepared by Sampath HRC**

**Supervised by Ms. Samanthi Wickramasinghe**

**University of Moratuwa BIT**

**13/03/2023**

# Table of Contents

<b>Table of Contents .....</b>	<b>ii</b>
<b>Revision History .....</b>	<b>iii</b>
<b>1. Introduction.....</b>	<b>67</b>
1.1 Purpose.....	67
1.2 Document Conventions.....	67
1.3 Intended Audience and Reading Suggestions.....	68
1.3.1 Intended Audience .....	68
1.3.2 Reading Suggestions - Definitions, abbreviations, and acronyms .....	68
1.4 Project Scope .....	69
1.5 Overview.....	69
1.6 References.....	69
<b>2. Overall Description.....</b>	<b>70</b>
2.1 Product Perspective.....	70
2.2 Product Features.....	70
2.3 User Classes and Characteristics.....	72
2.4 Operating Environment.....	73
2.4.1 Hardware Environment.....	73
2.4.2 Software Environment .....	73
2.4.3 Network Environment.....	74
2.5 Design and Implementation Constraints.....	74
2.5.1 Hardware Limitation .....	74
2.5.2 Software Limitation .....	75
2.6 User Documentation .....	75
2.7 Assumptions and Dependencies.....	75
<b>3. System Features .....</b>	<b>76</b>
3.1 Functional Requirements .....	76
3.1.1 User Management .....	76
3.1.2 Booking Management .....	76
3.1.3 Service Management.....	77
3.1.4 Billing Management (Invoicing).....	77
3.1.5 Customer Management .....	78
3.1.6 Inventory Management .....	78
3.1.7 Income and Expenses Management.....	79
3.1.8 Promotion Management.....	79
3.1.9 Generate reports.....	79
3.1.10 Loyalty Point System .....	80
3.1.11 Gift Voucher Management.....	80
3.2 Non-functional Requirements .....	81
3.2.1 Customer Feedback Module .....	81
3.2.2 Notification .....	81
3.2.3 Salon Dashboard .....	81
<b>4. External Interface Requirements .....</b>	<b>82</b>

4.1	User Interfaces .....	82
4.2	Hardware Interfaces .....	84
4.3	Software Interfaces .....	84
4.4	Communications Interfaces.....	84
<b>5.</b>	<b>Other Nonfunctional Requirements.....</b>	<b>84</b>
5.1	Performance Requirements .....	84
5.2	Reliability Requirements.....	84
5.3	Security Requirements.....	85
5.4	Compatibility Requirements .....	85
5.5	Software Quality Attributes .....	85
<b>6.</b>	<b>Other Requirements .....</b>	<b>86</b>
6.1	Logical database requirements.....	86
6.2	Relational Schema for proposed System .....	86
<b>7.</b>	<b>Appendix A: Glossary.....</b>	<b>88</b>
<b>8.</b>	<b>Appendix B: Analysis Models .....</b>	<b>89</b>
8.1	Class Diagram of the system.....	89
8.2	Use Case of User Management.....	90
8.3	Use Case of Booking Management.....	90
8.4	Use Case of Customer Management.....	91
8.5	Use Case of Service Management .....	92
8.6	Use Case of Inventory Management.....	93
<b>9.</b>	<b>Appendix C: Issues List.....</b>	<b>93</b>

## Revision History

Name	Date	Reason For Changes	Version
Sampath_HRC	19/03/2023	Draft	1.0

## 1. Introduction

This Software Requirement Specification document provides a complete description of all the functionalities and the specifications of the Web Based Salon Management System. The developers and the testers can use this document as a reference for developing the design and test plan documents.

### 1.1 Purpose

The Rush Hair Salon is a well-known and esteemed salon in the Nugegoda and Colombo region. Nevertheless, they lack an automated salon management system to oversee their operations. Owing to this difficulty, the salon encounters a variety of circumstances that can be avoided by using an automated system. Some examples include: the staff taking a considerable amount of time to book customer appointment slots when reserving dates and times, the stylists having to constantly check the paper sheet that updates with each appointment, the salon products and equipment records not being systematic and the information not being reliable, there being no proper way to keep track of customers and also employees, the files stored on the computers being susceptible to being infected by viruses, and more time being spent on administrative tasks. As a result, I propose a Web-based Salon Management System (WSMS) that will save staff and customers time and improve workflow.

This Software Requirements Specification (SRS) document is intended to specify the features and requirements of a proposed Web-based Salon Management System (WSMS) for The Rush Hair Salon. The SRS document will describe the system's functions, capabilities, and expected performance, as well as its limits and limitations. The WSMS attempts to automate the salon management process and address the problems caused by the manual system, including lengthy appointment booking times, inconsistent record-keeping of clients, personnel, products, and equipment, and an increased risk of virus assaults on stored files. The technology will give a dependable and efficient means of streamlining the salon's operation and improving its service quality to meet consumer expectations. The SRS document will serve as a guide for the development and QA team as they design and construct the WSMS to satisfy The Rush Hair Salon's particular objectives and specifications.

### 1.2 Document Conventions

Category	Description
Font	Times New Roman
Font Size for Main Heading (Heading 1)	14
Font Size for Subheading (Heading 2)	12
Font Size for Paragraph	11
Line & paragraph spacing	1.15
Style	Normal
Color	Black

## 1.3 Intended Audience and Reading Suggestions

### 1.3.1 Intended Audience

The intended audience of this Software Requirements Specification (SRS) document is the development and QA team responsible for designing, evaluating, and developing the web-based salon management system (WSMS) proposed for The Rush Hair Salon. The document is also intended for The Rush Hair Salon's management team, which will review and approve the SRS document to ensure that the system meets their specific needs and requirements. Additionally, stakeholders, such as the salon's employees, clients, and vendors, may also have an interest in the WSMS and may refer to the SRS document for information on the system's capabilities and features.

### 1.3.2 Reading Suggestions - Definitions, abbreviations, and acronyms

#### 1.3.2.1 Definitions

- End users/Staff : End users are customer who uses the system for the ordering purposes and admin user and the management users who are given separate authentication to the Salon Management System
- .
- QA team: Group that testing the system.
- Item/Product: Beauty Products
- Chemicals – Products That use for Hair Treatment and color.
- Customer: Who use the system to get the hair and beauty related service.

#### 1.3.2.2 Acronyms

Term	Definition
WSMS	Web Based Salon Management System
TRH	The Rush Hair
SRS	Software Requirements Specification
QA	Quality Assurance
DBMS	Database Management System
ER	Entity-Relationship
IDE	Integrated Development Environment
RAM	Random Access Memory
HDD	Hard Disk Drive
GB	Giga byte
CSS	Cascading Style Sheets
SQL	Structured Query Language

Figure 1:Acronyms

## 1.4 Project Scope

The project aims to develop a Web-Based salon management system that will replace the traditional manual process. The system will be designed using web development technologies such as PHP, HTML, JavaScript, MySQL, and others.

The objectives of the project are to provide an easy-to-use and hassle-free platform for salon management, staff, and customers. The system will include a comprehensive accounting and inventory management module that will enable the salon to efficiently manage their financial records and inventory. The user interface will be intuitive and user-friendly, allowing for easy navigation and use of the system. The system will also provide timely and accurate reports that will aid in decision-making and help to track the salon's progress. The database will be designed and implemented in a manner that ensures the security and organization of records.

Moreover, the system will also include a feature that allows for bank-wise promotions and other discounts to attract more customers. The goal of this feature is to increase customer attraction and retention.

## 1.5 Overview

The online salon management system aims to provide a comprehensive solution for managing and operating a salon. This section provides an overview of the system's features, user classes and characteristics, operating environment, design and implementation constraints, user documentation, and assumptions and dependencies. Additionally, it outlines the system features, external interface requirements, non-functional requirements, and other requirements.

## 1.6 References

[1]

“10 Tips How to Improve Salon Staff Management | zolmi.com,” ZOLMI.  
<https://zolmi.com/salon-staff-management> (accessed Oct. 22, 2022).

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“Guidelines for Writing Project Proposals - Undergraduate Scholars Program | Montana State University.” <https://www.montana.edu/usp/apply/research-proposals.html> (accessed Oct. 22, 2022).

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“IBISWorld - Industry Market Research, Reports, and Statistics.”  
<https://www.ibisworld.com/default.aspx> (accessed Oct. 22, 2022).

[4]

“Insight Salon Software | Spa & Salon Management Software.” <https://salon-software.com/> (accessed Oct. 22, 2022).

## 2. Overall Description

### 2.1 Product Perspective

The web-based salon management system is a software product designed to provide a comprehensive solution for managing and operating a salon. The system will replace the traditional manual process of salon management and provide a hassle-free, efficient and user-friendly environment for the management of salon staff, customers, inventory and accounting. The system will be designed and developed using web development technologies such as PHP, HTML, JavaScript, and MySQL. It will be a web-based application accessible from any device with an internet connection, including desktops, laptops, tablets, and smartphones.

The system will have features such as appointment scheduling, customer management, staff management, inventory management, accounting, reporting, and promotional features such as bank-wise promotions and discounts. It will provide a user-friendly interface for the different user classes such as salon managers, staff, and customers. The product's architecture will be modular and scalable, allowing for future enhancements and additions. The database will be designed and implemented using MySQL, providing a secure and reliable data management system. The system's benefits include an efficient and accurate accounting and inventory management module, timely and accurate reporting, increased customer satisfaction, and reduced operational costs. The web-based nature of the product will provide real-time access to data, making it easy to manage the salon from anywhere and at any time.

In conclusion, the web-based salon management system will be a modern and innovative solution for managing and operating a salon. It will provide a comprehensive and user-friendly environment for the management of salon staff, customers, inventory and accounting. The system's web-based nature will provide real-time access to data, allowing for efficient and effective management of the salon.

### 2.2 Product Features

- **Booking Management by Salon**

Customers can phone the salon directly, via WhatsApp or other social media to book the appointment. the salon's operator will arrange a booking for them with the appropriate service and time. In addition, booking can assign staff.

- **Service and Package Management**

Every salon has to provide beauty culture-related services with veracity. The salon must maintain a price and service description list for each service. It is also beneficial for salon personnel to interact with clients. Especially when drafting legislation. This manage service module will be introduced to the system to fulfil this need.

- **Billing Management (Invoicing)**

Customers had to pay the full billed amount when the service was received. In this case, the salon's front desk should be able to generate bills for customers. And the payment details for the bill should be recorded in the system.

- **Customer Management**

Their customers are mostly regular basis. So, they are planning to keep historical data to evaluate who got services and products from their salons. For this, they need to keep customers' details against the issued reports' historical data.

- **Inventory Management**

Each day salon expends a lot of products and equipment in their activities. So it should be managed to prevent run-out of stocks. General reorder points for those items are set into the system and the system will manage messages to indicate before stock ran out.

- **Income and Expenses Management**

Every salon has Expenses and Some Extra incomes, income and expenses is a crucial part of running a successful salon business. An efficient salon management system can help you keep track of your income and expenses and ensure that you're making a profit.

- **Salon Dashboard**

A salon dashboard is a visual representation of the salon's performance and provides a quick overview of important metrics such as appointments, product sales, staff performance, and more.

- **Notification**

With the notification system plan to send the SMS Notification to the customers and employees regarding service and invoicing. By using a notification module, salons can improve communication with customers and employees, increase engagement, and reduce missed appointments.

- **Promotion Management**

Special Promotions and Bank Card wise promotion will be Configured under this module. The Promotions will apply automatically when conditions are fulfilled.

- **Generate reports.**

System reports are most important for owners to get valuable decisions and predictions in management. Many types of reports are allowed in the system. Daily summary of payment details, summary of booking, monthly summary of them, and most requested report types by salon owner, and so on.

- **User Management**

System Users and Their permission will be manage under this section. In here manage user roles like as manager, staff, admin like that user role. By using a user management module, salons can ensure that their salon management system is secure, and that each user has access only to the features and data they need to perform their job.

- **Gift Voucher Module**

A gift voucher module can be a useful feature to add to a salon management system, as it allows salons to sell and track gift vouchers, which can help generate additional revenue and attract new customers.

- **Customer Feedback Option**

A customer feedback feature can be a valuable addition to a salon management system, as it allows salons to gather feedback from their customers and use this information to improve their services and customer experience. By using a customer feedback module, salons can gain valuable insights into their customers' experiences, identify areas for improvement, and ultimately improve customer satisfaction and retention. The module can also help the salon to respond promptly to any negative feedback, showing customers that their opinions are valued and taken seriously.

- **Loyalty Point System**

A loyalty point system can be a useful feature in a salon management system, as it allows the salon to reward loyal customers and incentivize repeat business. By using a loyalty point system, salons can encourage customer loyalty, increase engagement, and drive repeat business. The module can also help the salon to track customer behavior and preferences, and tailor marketing efforts accordingly.

- **Online payment gateway Integration**

By using an online payment module, salons can increase customer convenience, reduce manual processing time, and improve cash flow by receiving advance payments and credit sales.

## **2.3 User Classes and Characteristics**

In a salon management system, there are typically four main user classes,

- Admin: The admin is responsible for managing the overall system, including creating and managing user accounts, managing product and service offerings, managing customer information, and generating reports.
- Manager: The manager is responsible for managing the day-to-day operations of the salon, including scheduling appointments, managing staff schedules, managing inventory, and ensuring that the salon is running smoothly.
- Staff: The professionals who provide services to customers. They are responsible for performing services, managing customer interactions, and ensuring that customers are satisfied with their experience.
- Talent Staff: The staff includes hairstylists, beautician, and ensuring that customers are satisfied with their experience.
- Customer: The customer is the end-user of the salon management system. They use the system to provide feedback on their experience.

## 2.4 Operating Environment

### 2.4.1 Hardware Environment

The hardware components of the operating environment include the computers, servers, printers, and other devices required to run the system. These devices should be powerful enough to support the software and network components of the system.

Processor	2.0 gigahertz (GHz) x86- or x64-bit dual core processor
Memory	4GB RAM or higher
Hard disk	25 GB free hard disk or higher
Display	Intel graphic or VGA with a resolution of 1024 x 768 or more support
Internet	Dedicated connection to the internet

Table 1: Hardware Environment

### 2.4.2 Software Environment

The software components of the operating environment include the salon management system itself, as well as any additional software required to support the system, such as operating systems, databases, and security software.

Operating system	Cloud Linux, Ubuntu or Windows 8/ 10/ 11
Web server	Apache server
Web browser	Google Chrome, Microsoft Edge, Brave browser
Software	Xampp software for local development
IDE	Visual Code
Database	MySQL

Table 2:Software Environment

### 2.4.3 Network Environment

The network components of the operating environment include the local area network (LAN) and wide area network (WAN) infrastructure required to connect the different devices and systems used by the salon management system. This may include routers, switches, firewalls, and other networking devices.

## 2.5 Design and Implementation Constraints

### 2.5.1 Hardware Limitation

- Processor: The minimum processor requirement is a 2.0 GHz x86- or x64-bit dual-core processor. This means that the software may not run effectively or may be slow if the system has a processor that is lower than 2.0 GHz or has a single core processor.
- Memory: The minimum memory requirement is 4 GB RAM or higher. If the system has less than 4 GB of RAM, the software may not run effectively or may crash while in use.
- Hard Disk: The minimum hard disk space required is 25 GB of free space or higher. If the system has less than 25 GB of free space, the software may not install or run effectively.
- Display: The minimum display resolution required is 1024 x 768 or higher with Intel graphic or VGA support. If the system does not meet this display requirement, the software may not display properly or may be difficult to use.
- Internet: The software requires a dedicated connection to the internet. If the system does not have a reliable internet connection, the software may not be able to access online features or may have difficulty connecting to the internet.

### 2.5.2 Software Limitation

- The proposed system is developed using the Notepad++ and visual studio code. It should initially be accessible through the XAMPP as a server.
- There are some database limitations to access the database. Following table describes system privileges of each actor. Administrators have most privileges while other users have least access to the database.

User category	Self-change password	View all data	View own profile	Update other profiles	Update own profile
Administrator	Yes	Yes	Yes	Yes	Yes
Manager	Yes	No	Yes	No	Yes
Staff	Yes	No	Yes	No	Yes

Table 3: Database limitations

- The web-based salon management system's user interfaces were developed using language.
- Security and safety of the system like database security, effects of power failure; database backup procedure etc. will be the system operator's responsibility.

### 2.6 User Documentation

- User Training
- User Manual

### 2.7 Assumptions and Dependencies

- The server-side components of the software system must operate within a Windows 8, 10, 11 or Linux based operating systems environments.
- The Server should be installed Apache server and MySQL services.
- Full working of the system is dependent on the availability of 24-hour Internet connection.
- The Administrator will maintain user profiles and other configurations.
- The users should know the English language as the user interface will be provided in English.
- Appointment can be schedule from the back end staff, manager, admin user can have ability.

### 3. System Features

The following section presents the complete set of functional requirements identified for the subject Web-based Salon Management System. Functional requirements are listed by the features of the overall system, manager, Staff, and admin.

#### 3.1 Functional Requirements

##### 3.1.1 User Management

User Management is the most important feature that the system has. It maintains the users of the system. Each user has specific different abilities and skills in the system. Because of this user account maintenance, system continuously works with proper maintenance.

Requirement	Description
UM 01	The system shall allow users to create an account by entering user details such as name, email and password.
UM 02	The system shall allow authenticate user to login to the system
UM 03	The system shall allow user to update the account details
UM 04	The system shall allow user to change the password
UM 05	The system shall allow user to logout from the system

Table 4: User Requirements

##### 3.1.2 Booking Management

Customers can phone the salon directly, via WhatsApp or other social media to book the appointment. the salon's operator will arrange a booking for them with the appropriate service and time. In addition, booking can assign staff.

Requirement	Description
BM 01	The system shall allow admin, manager, staff to create appointment with one or more stylist
BM 02	The system shall allow admin, manager, staff to edit and cancel appointment.
BM 03	The system shall allow admin, manager, staff to take advance payment in the same window if needed.
BM 04	The system shall allow admin, manager, staff to select the source customer make appointment.

BM 05	The system shall allow admin, manager, staff to employee special time slot blocking on appointment creation.
BM 06	The system shall allow admin, manager, staff to multiple service in one booking window

*Table 5 : Booking Management*

### 3.1.3 Service Management

Every salon has to provide beauty culture-related services with veracity. The salon must maintain a price and service description list for each service. It is also beneficial for salon personnel to interact with clients. Especially when drafting legislation. This manage service module will be introduced to the system to fulfil this need.

Requirement	Description
SM 01	The system shall allow admin, manager to create, update, Inactive and view service category.
SM 02	The system shall allow admin, manager, staff to create, update, Inactive and view services under the category.
SM 03	The system shall allow staff to view service category.

*Table 6 : Service Management*

### 3.1.4 Billing Management (Invoicing)

Customers had to pay the full billed amount when the service was received. In this case, the salon's front desk should be able to generate bills for customers. And the payment details for the bill should be recorded in the system.

Requirement	Description
BMI 01	The system shall allow admin, manager, staff to give service by service discount manually on the invoice window (Line discount Manually).
BMI 02	The system shall allow admin, manager, staff to give Total bill discount manually on the invoice window (Net discount Manually).
BMI 03	The system shall allow admin, manager, staff to accept Cash, Bank Card and Gift voucher payment.
BMI 04	The system shall allow admin, manager, staff to Identify item using barcode.
BMI 05	The system shall allow admin, manager, staff to use give promotion in invoice window. (Automatic calculation by system)
BMI 06	The system shall allow admin, manager, staff to sell product in this module.

*Table 7 : Billing Management*

### 3.1.5 Customer Management

Their customers are mostly regular basis. So, they are planning to keep historical data to evaluate who got services and products from their salons. For this, they need to keep customers' details against the issued reports' historical data.

Requirement	Description
CM 01	The system shall allow admin, manager, staff to Create, edit, delete customers.
CM 02	The system shall allow admin, manager to Manage Customer Credit Level.
CM 03	The system shall allow admin, manager, staff to Update their skin and hair details on the system.

Table 8 : Customer Management

### 3.1.6 Inventory Management

Each day salon expends a lot of products and equipment in their activities. So, it should be managed to prevent run-out of stocks. General reorder points for those items are set into the system and the system will manage messages to indicate before stock ran out.

Requirement	Description
IM 01	The system shall allow admin, manager to view the category.
IM 02	The system shall allow admin, manager to Create, Edit, view and Inactive the Product.
IM 03	The system shall allow admin, manager, staff to create, Edit and Inactive the Brand
IM 04	The system shall allow admin, manager, staff to Create, Edit and Inactive Suppliers.
IM 05	The system shall allow admin, manager, staff to Create, Edit and view Good Receive Note
IM 06	The system shall allow admin, manager, staff to Create, Edit and view Supplier Return Note
IM 07	The system shall allow admin, manager, staff to Create, Edit and view Stock Adjustment Note
IM 08	The system shall allow admin, manager, staff to Create, Edit and view Sales Return.
IM 09	The system shall allow admin, manager, staff to Create, Edit and view Store Issue.
IM 10	The system shall allow admin, manager, staff to Create, Edit and view reorder level.

Table 9 : Inventory Management

### 3.1.7 Income and Expenses Management

Every salon has Expenses and Some Extra incomes, in here we can record expenses and income on the system.

Requirement	Description
IEM 01	The system shall allow admin, manager, staff to Create, Edit and view Payment Vouchers to Pay supplier and other Expenses.
IEM 02	The system shall allow admin, manager, staff to Create, Edit and view Income Receipt to Maintain the Salon Incomes.
IEM 03	The system shall allow admin, manager, staff to Income and expenses using cash, card and etc.

Table 10 : Income and Expenses Management

### 3.1.8 Promotion Management

Special Promotions and Bank Card wise promotion will be Configured under this module. The Promotions will apply automatically when conditions are fulfilled.

Requirement	Description
PM 01	The system shall allow admin, manager to Create, Edit and view Bank Credit and Debit Card wise Promotion.
PM 02	The system shall allow admin, manager to Create, Edit and view Category wise Promotion.
PM 03	The system shall allow admin, manager to Create, Edit and view Category wise Promotion.

Table 11 : Promotion Management

### 3.1.9 Generate reports.

System reports are most important for owners to get valuable decisions and predictions in management. Many types of reports are allowed in the system. Daily summary of payment details, summary of booking, monthly summary of them, and most requested report types by salon owner, and so on.

Requirement	Description
RG 01	The system shall allow admin, manager to generate summary reports
RG 02	The system shall allow admin, manager to generate sales reports
RG 03	The system shall allow admin, manager to generate stock reports
RG 04	The system shall allow admin, manager to generate promotion reports

RG 05	The system shall allow admin, manager to generate prediction reports
RG 06	The system shall allow admin, manager to generate many types of reports

*Table 12: Generate Reports*

### 3.1.10 Loyalty Point System

A loyalty point system can be a useful feature in a salon management system, as it allows the salon to reward loyal customers and incentivize repeat business. By using a loyalty point system, salons can encourage customer loyalty, increase engagement, and drive repeat business. The module can also help the salon to track customer behavior and preferences, and tailor marketing efforts accordingly.

Requirement	Description
LPS 01	The system shall allow admin, manager to Create, Edit and view Member type
LPS 02	The system shall allow admin, manager to Create, Edit and view Member point range
LPS 03	The system shall allow admin, manager to Create, Edit and view Discount Percentage of each membership range.
LPS 04	The system shall allow to discount automatically according to membership package.

*Table 13 : Loyalty Point System.*

### 3.1.11 Gift Voucher Management

A gift voucher module can be a useful feature to add to a salon management system, as it allows salons to sell and track gift vouchers, which can help generate additional revenue and attract new customers.

Requirement	Description
GVM 01	The system shall allow admin, manager to Create and view Gift Voucher
GVM 02	The system shall allow admin, manager to Sell and Redeem Voucher at Invoice Stage

*Table 14 : Gift Voucher Management.*

### 3.2 Non-functional Requirements

#### 3.2.1 Customer Feedback Module

A customer feedback feature can be a valuable addition to a salon management system, as it allows salons to gather feedback from their customers and use this information to improve their services and customer experience. By using a customer feedback module, salons can gain valuable insights into their customers' experiences, identify areas for improvement, and ultimately improve customer satisfaction and retention. The module can also help the salon to respond promptly to any negative feedback, showing customers that their opinions are valued and taken seriously.

Requirement	Description
CFM 01	The system shall allow customer to give a feedback based on service.
CFM 02	The system shall allow admin, manager to view customer feedback

Table 15 : Customer Feedback Module.

#### 3.2.2 Notification

With the notification system plan to send the SMS Notification to the customers and employees regarding service and invoicing. By using a notification module, salons can improve communication with customers and employees, increase engagement, and reduce missed appointments.

Requirement	Description
NO 01	The system shall allow automatically send SMS to customer when make, update, cancel the appointment.
NO 02	The system shall allow automatically send SMS to customer when finished the Invoicing.
NO 03	The system shall allow automatically send SMS to Stylish when make, update, cancel the appointment.

Table 16 : Notification

#### 3.2.3 Salon Dashboard

A salon dashboard is a visual representation of the salon's performance and provides a quick overview of important metrics such as appointments, product sales, staff performance, and more.

Requirement	Description
SD 01	The system shall allow admin, manager to view Salon Dashboard.
SD 02	The system shall allow admin, manager to access and view Salon Dashboard report and chart.

Table 17 : Salon Dashboard

## 4. External Interface Requirements

### 4.1 User Interfaces

The primary objective of interface design is to build a user interface that makes machine interaction easy, efficient, and user-friendly. Hence, the User interface is the primary and initial interaction between the user and the system. It should be user interactive. UI design focuses on what users anticipate from a system and ensuring that the interface's essential features are simple, accessible, and easy to use. Hence, minimum operator input is necessary to produce the desired output. Following design standards, the system was created using the smallest possible color palette. The majority of the time, users make errors; therefore, the system should be able to both limit these errors and recover from them.

A system should immediately display error messages whenever a user makes a mistake or enters incorrect data, which is especially important when the developer applies several UI design guidelines in the design process to achieve an excess of user uncertainty about system operations.

There are some user Interface in system below. Also Interface design can be changed in future.

- Login
- Salon Dashboard
- Invoice Interface
- Appointment Interface
- Manage Appointment
- Manage Users
- Manage Inventory

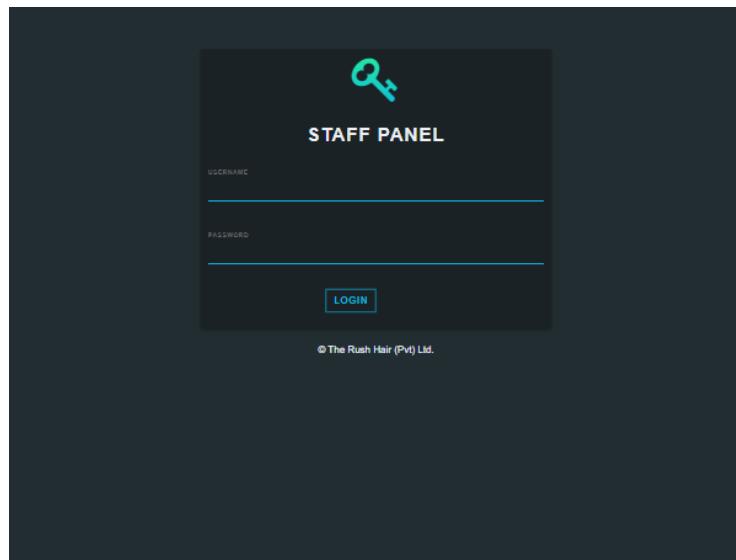


Figure 2: Login Interface

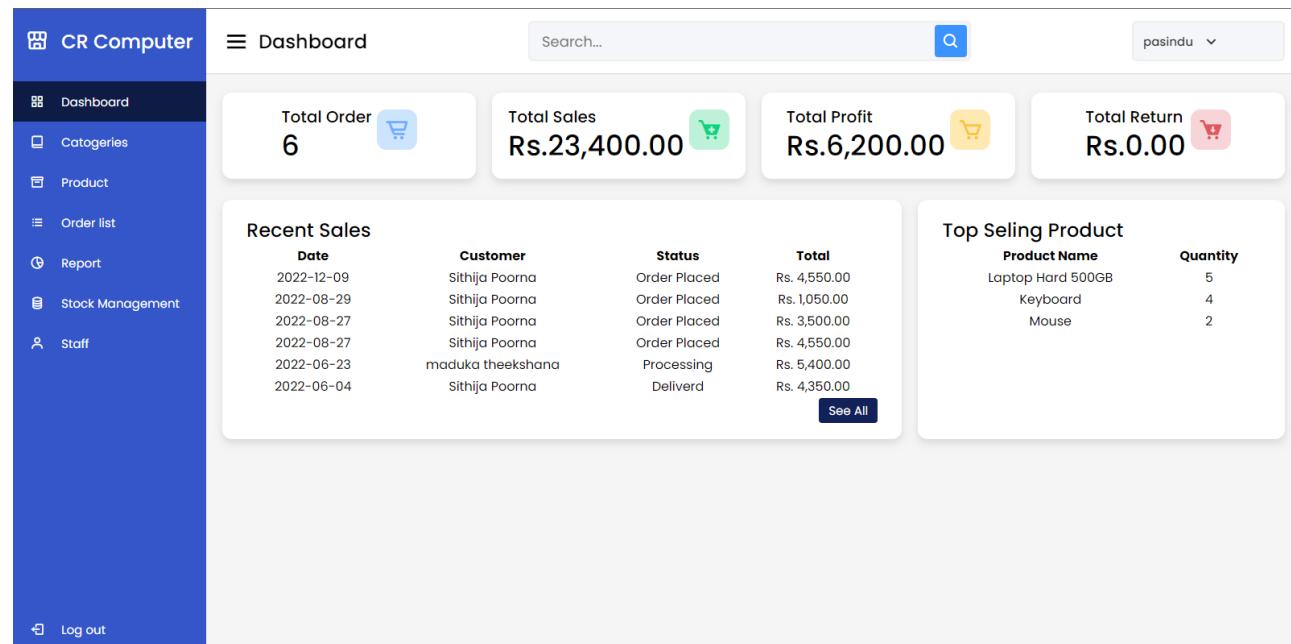


Figure 3: Salon Dashboard

This window allows modifying customer details. Fields include Customer Code, Customer Name, Address - No, Street, City, Telephone(Mobile), E-mail, Birthday (with a note about updating completed checkbox), Credit Limit, CrePeriod(Days), Emergency Contact, Cont Per Tel No, Blood Group, ID Number, Remarks, Consultant, Customer Type, Black List, and 1st ConDate. On the right, there are checkboxes for hair type (Straight, Wave, Curly, Short, Medium, Long, Fine, Medium, Thin, Very Pours, Pours, Normal), elasticity (Fine, Poor), hair condition (Dry, Normal, Oil, Damage, Gray, Dandruff), and treatments (Virgin Hair, Colour, Bleaching, Perm, Bonding, Relaxing, Keratin, Hana). Below the form are two stylized female head icons. At the bottom are buttons for Next >, Save, Print, and Close.

Figure 4: Customer adding.

## 4.2 Hardware Interfaces

The software has certain minimum hardware requirements that need to be met for optimal performance. The system should have a processor with a minimum speed of 2.0 GHz and a dual-core architecture, along with a minimum of 4 GB RAM and 25 GB of free hard disk space. The display resolution should be at least 1024 x 768 with Intel graphic or VGA support, and a reliable internet connection is required. Failure to meet these requirements may result in poor performance, crashes, or difficulty in accessing online features.

## 4.3 Software Interfaces

The system will require hosting on a web hosting platform to provide access to users. To run the system, the hosting platform must support PHP and MySQL, the server-side scripting language and database management system used in the development of the system. Web hosting will enable greater scalability and accessibility, allowing multiple users to access the system simultaneously and store and manage data centrally. The software interfaces used in the development of the system include free and open-source software such as Notepad++, Visual Studio Code, Xampp, MySQL, Bootstrap, jQuery, and JavaScript. Notepad++ and Visual Studio Code are used as IDEs, providing suggestions and debugging tools to improve developer efficiency. Xampp creates a localhost environment to run PHP, and Bootstrap is used as a CSS styling framework, combined with custom CSS to create unique styles for the interface. Finally, jQuery and JavaScript are used for calculations, validations, and animations within the system. Together, these software interfaces provide an efficient and comprehensive environment for developing and running the system application.

## 4.4 Communications Interfaces

This is a fully internet-based system. It needs active internet connection with 100KBps (800 kbps) and Latency must be under 75 ms to work best with this application.

# 5. Other Nonfunctional Requirements

## 5.1 Performance Requirements

The system should be optimized for high performance to ensure fast and responsive user experience. This includes minimizing load times and optimizing database queries.

## 5.2 Reliability Requirements

The system must be reliable and available at all times to ensure uninterrupted service. This includes implementing redundancy and backup mechanisms to prevent data loss and minimize downtime.

### **5.3 Security Requirements**

The system must provide high-level security features to protect against potential threats, such as unauthorized access and data breaches. This includes password encryption, user authentication, and secure data storage.

### **5.4 Compatibility Requirements**

The system should be compatible with a wide range of devices and browsers to ensure accessibility to users on different platforms. This includes testing the system on multiple devices and browsers to ensure compatibility.

### **5.5 Software Quality Attributes**

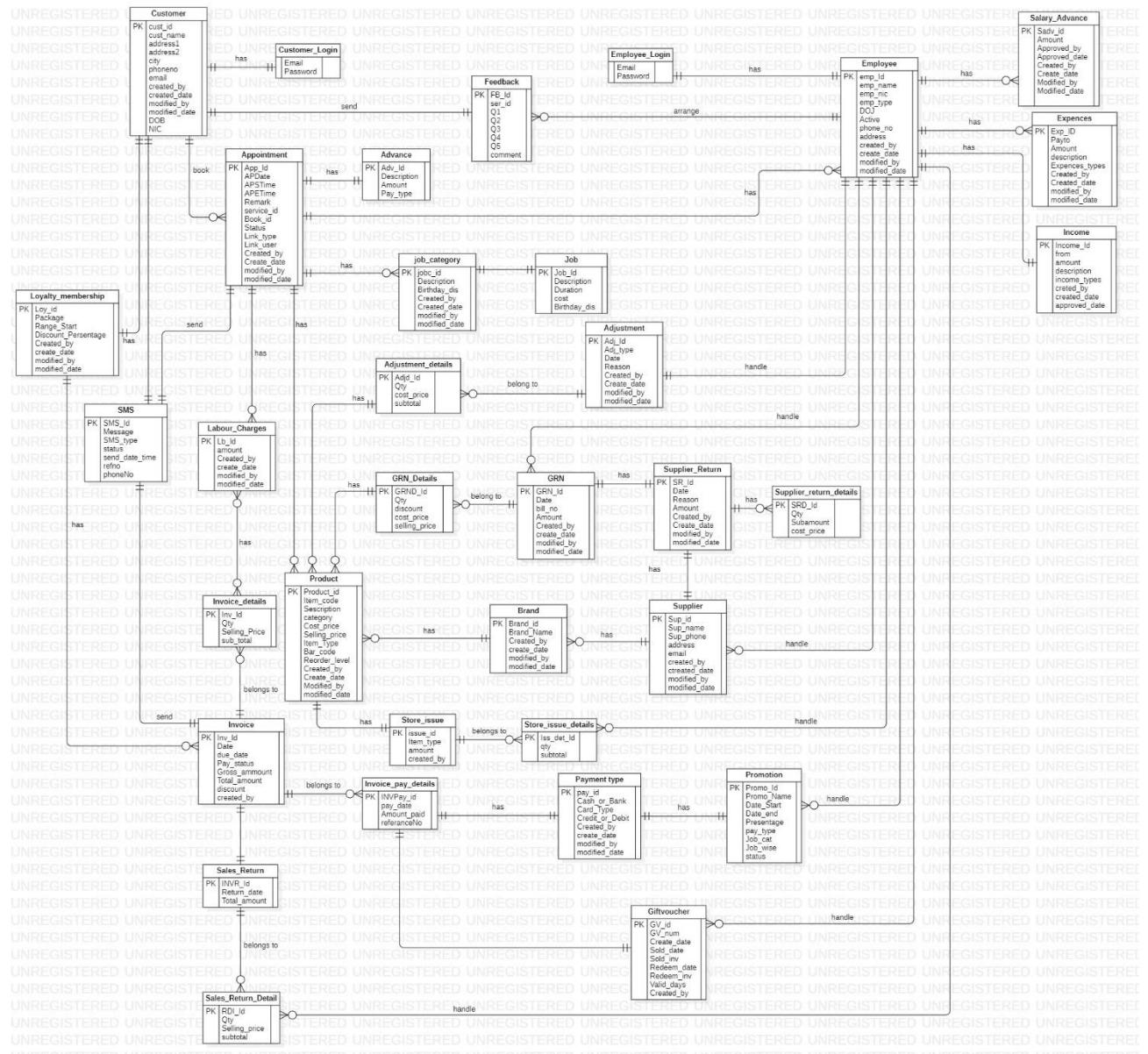
Software quality attributes are characteristics that determine the overall quality of software. They can be divided into two categories: functional and non-functional. Functional attributes relate to the functionality of the software and Non-functional attributes relate to how the software operates.

## 6. Other Requirements

### 6.1 Logical database requirements

### 6.2 Relational Schema for proposed System

Customer = cust\_id, cust\_name , address1 , address2,city, phoneno, email, created\_by,created\_date, modified\_by, modified\_date, DOB, NIC



Supplier = Sup\_id, Sup\_name, Sup\_phone, address, email, Created by, created\_date, modified\_by, modified\_date

Figure 5ER Daigram

Product = Product\_id, Item\_code, Description, Catogery, Cost\_price, Selling\_Price, Item\_Type, Bar\_code, Reorder\_level, Sup\_id, Created\_by, create\_date, modified\_by, modified\_date

GRN = GRN\_Id, Date, Sup\_id, bill\_no, Amount, Created\_by, create\_date, modified\_by, modified\_date

GRN Details = GRND\_Id, GRN\_Id, Product\_id, Qty, discount, cost\_price, Selleing\_price

Expenses = Exp\_ID, Payto, Amount, Expenses, Expences\_types, Created\_by, create\_date, modified\_by, modified\_date

Salary Advance = Sadv\_id, emp\_id, Amount, approved\_by, approved\_date, Created\_by, create\_date, modified\_by, modified\_date

Invoice = Inv\_Id, Cust\_id, Date, due\_date, Pay\_status, Gross amount, Total\_amount, discount, created\_by

Invoice details = Invd\_Id, Inv\_Id, Product\_id, Qty, Selleing\_price, sub\_total, labour

Invoice pay details = INVPay\_id, Inv\_Id, Pay\_date, Pay\_id, Amount\_paid, referenceNo

Adjustment = Adj\_Id, Adj\_type, Date, Reason, Created\_by, create\_date, modified\_by, modified\_date

Adjustment details = Adjd\_Id, Product\_id, Qty, cost\_price, subtotal, Adj\_Id,

Supplier Return = SR\_Id, Date, Sup\_id, Reason, Amount, Created\_by, create\_date, modified\_by, modified\_date

Supplier retund details = SRD\_Id, SR\_Id, Product\_Id, Qty, subamount

Sales\_Return = INVR\_id, Inv\_id, Cust\_id, Return\_date, Total\_amount

Sales\_return Details = RDI\_id, INVR\_id, Product\_id, Qty, Selleing\_price, subtotal

Appointment =

APP\_Id, APDate, APSTime, APETime, Remark, Cust\_id, emp\_id, job\_id, ser\_id, book\_id, Status, Link\_type, Link\_user, Created\_by, create\_date, modified\_by, modified\_date

Labour\_Charges = Lb\_Id, emp\_id, ser\_id, amount, Created\_by, create\_date, modified\_by, modified\_date

Job = Job\_id, Jobc\_id, Description, Duration, cost, Birthday\_dis

Store\_issue = Issue\_id, Item\_Type, ser\_id, amount, Created\_by

Store\_issue\_details = Iss\_det\_id, Issue\_id, product\_id, qty, subtotal

Job\_Catogery = Jobc\_id, Description, Birthday\_dis, Created\_by, create\_date, modified\_by, modified\_date

Advance = Adv\_Id, Cust\_id, Job\_id, Description, Amount, Pay\_type

Promotion = Promo\_Id, Promo\_Name, Date\_start, Date\_end, Presentage, Pay\_Id, pay\_type, Job\_cat, job\_wise, Status

Employee- emp\_id, emp\_name, emp\_nic,emp\_type, DOJ,Active ,phone\_no,address,Created by, create\_date, modified\_by, modified\_date, emp\_pass,token

Feedback = FB\_ID,Cust\_Id,ser\_id,Q1,Q2,Q3,Q4,Q5,comment

Loyalty\_membership= Loy\_id, Package,Range\_start,Discount\_percentage,Created by, create\_date, modified\_by, modified\_date

Payment type= Pay\_id , Cash/Bank, Card\_Type, Credit /Debit, Created by, create\_date, modified\_by, modified\_date

Brand=Brand\_id, Brand\_Name, Created by, create\_date, modified\_by, modified\_date

SMS = SMS\_ID,Message,SMS\_type, stauts, send\_date\_time,refno,phoneNo, Book\_Id

Giftvoucher = GV\_id, GV\_num, Create\_date, Sold\_date, Sold\_inv, Redeem\_date, Redeem\_inv, Valid\_days,Created by

Income - income\_ID, from, Amount, Expenses,Expences\_types, Created by, create\_date, approved\_by, approved\_date,cust\_id

## 7. Appendix A: Glossary

Term	Definition
WSMS	Web Based Salon Management System
TRH	The Rush Hair
SRS	Software Requirements Specification
QA	Quality Assurance
DBMS	Database Management System
ER	Entity-Relationship
IDE	Integrated Development Environment
RAM	Random Access Memory
HDD	Hard Disk Drive
GB	Giga byte
CSS	Cascading Style Sheets
SQL	Structured Query Language

Figure 6: Grossary

## 8. Appendix B: Analysis Models

### 8.1 Class Diagram of the system

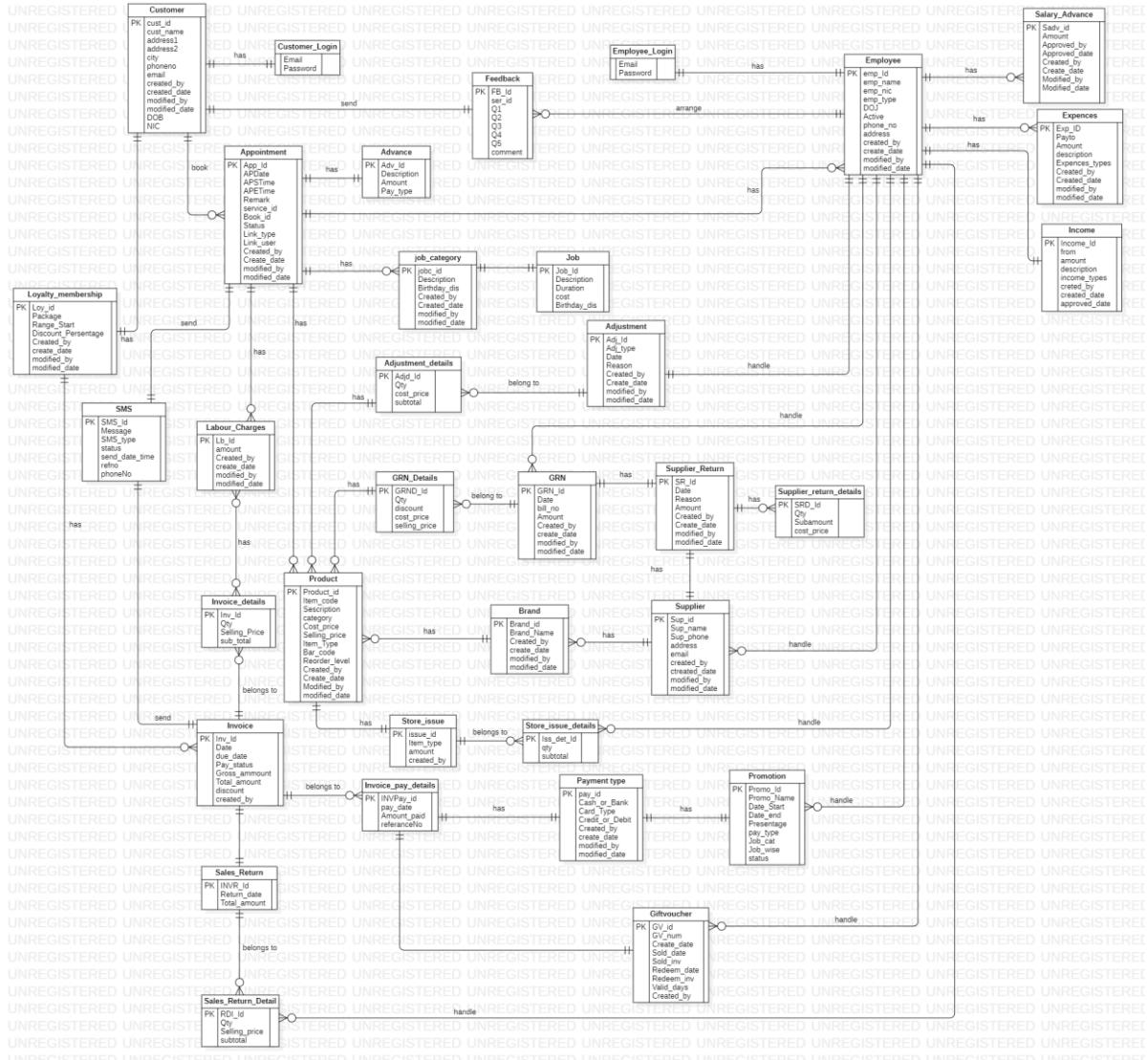


Figure 7: Class diagram of the System

## 8.2 Use Case of User Management

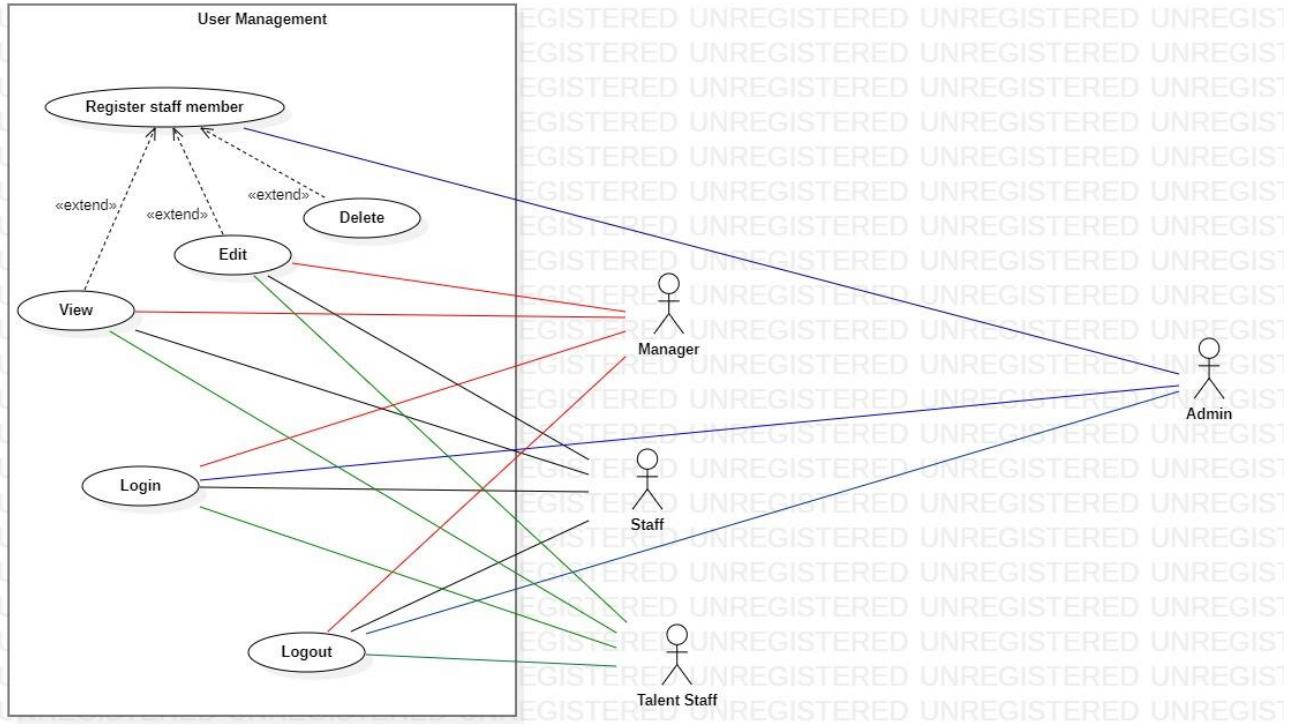


Figure 8: Use Case of User Management

## 8.3 Use Case of Booking Management

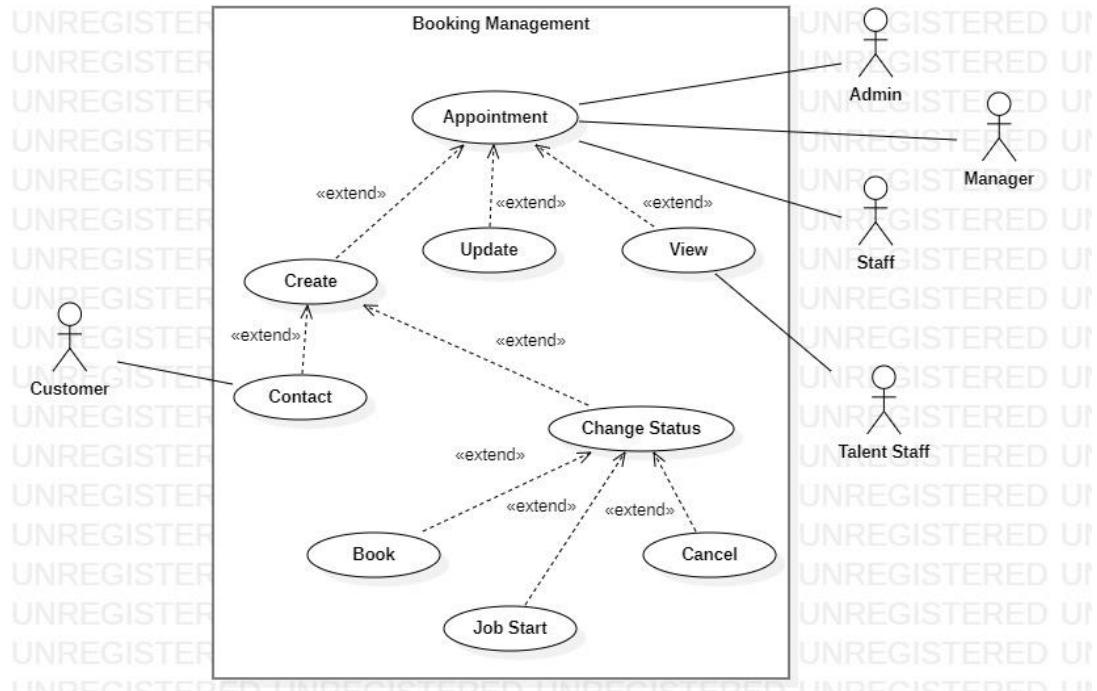


Figure 9: Use case of Booking Management

## 8.4 Use Case of Customer Management

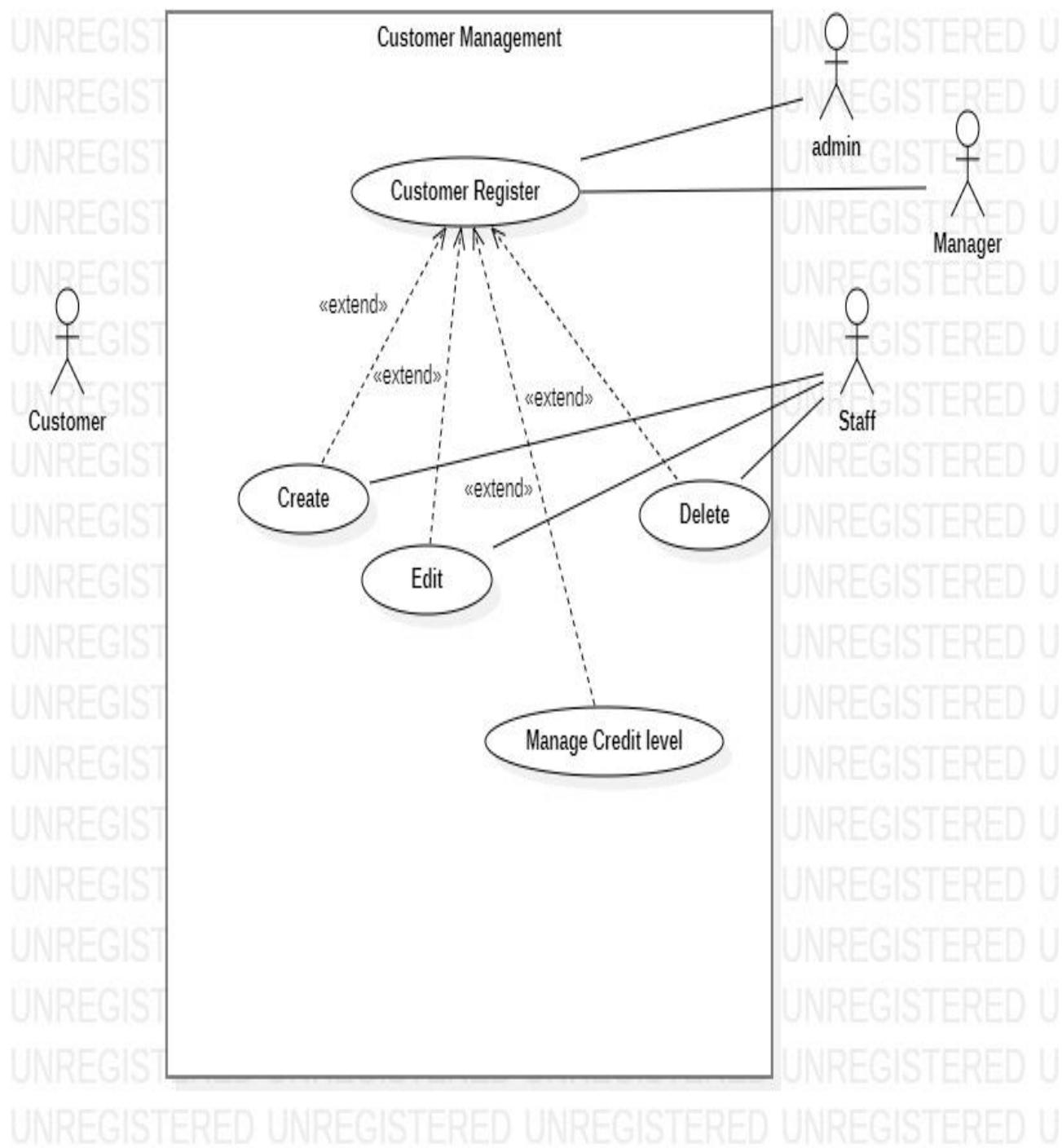


Figure 10: Use Case of Customer Management

## 8.5 Use Case of Service Management

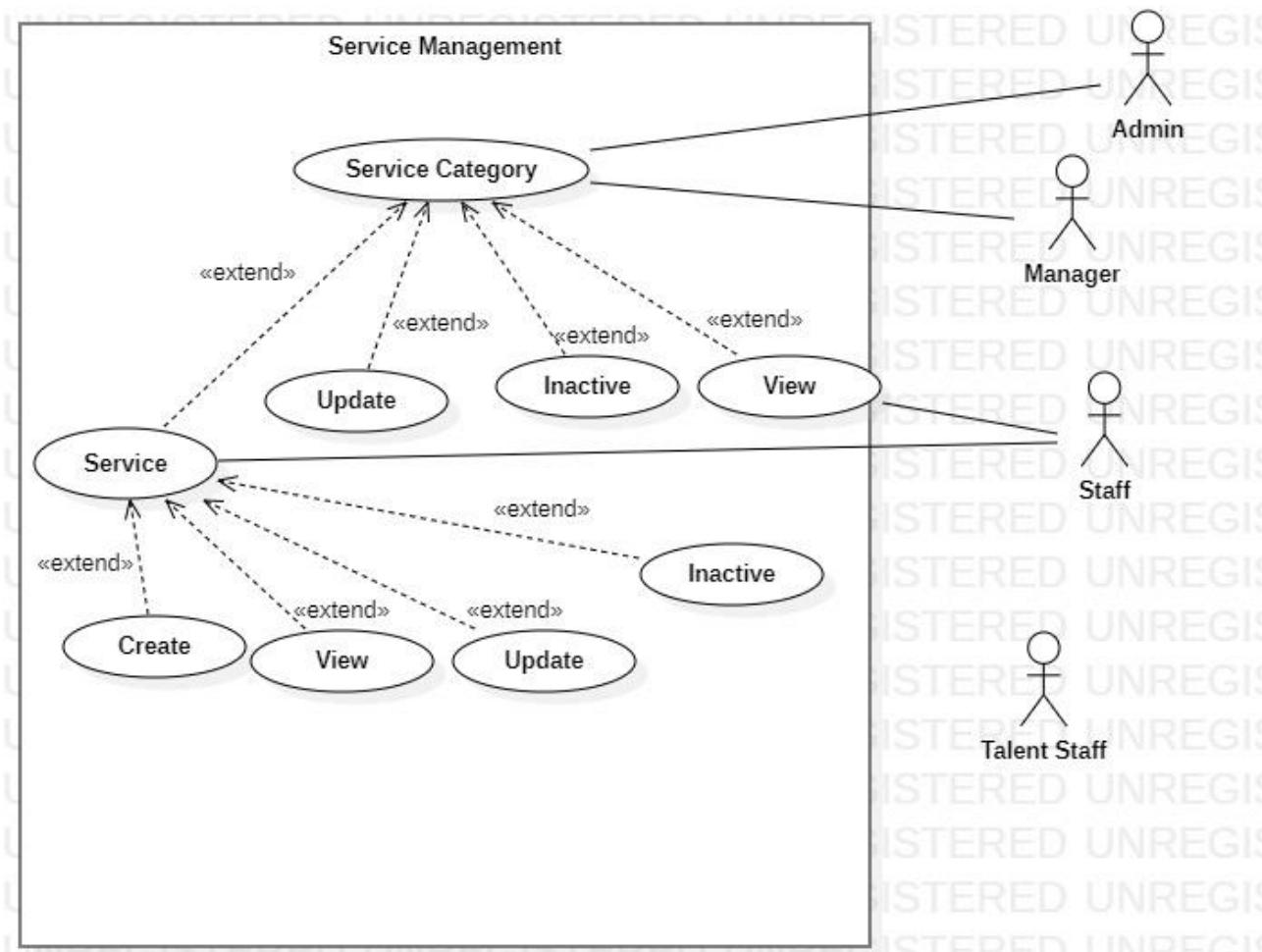


Figure 11:Service Management

## 8.6 Use Case of Inventory Management

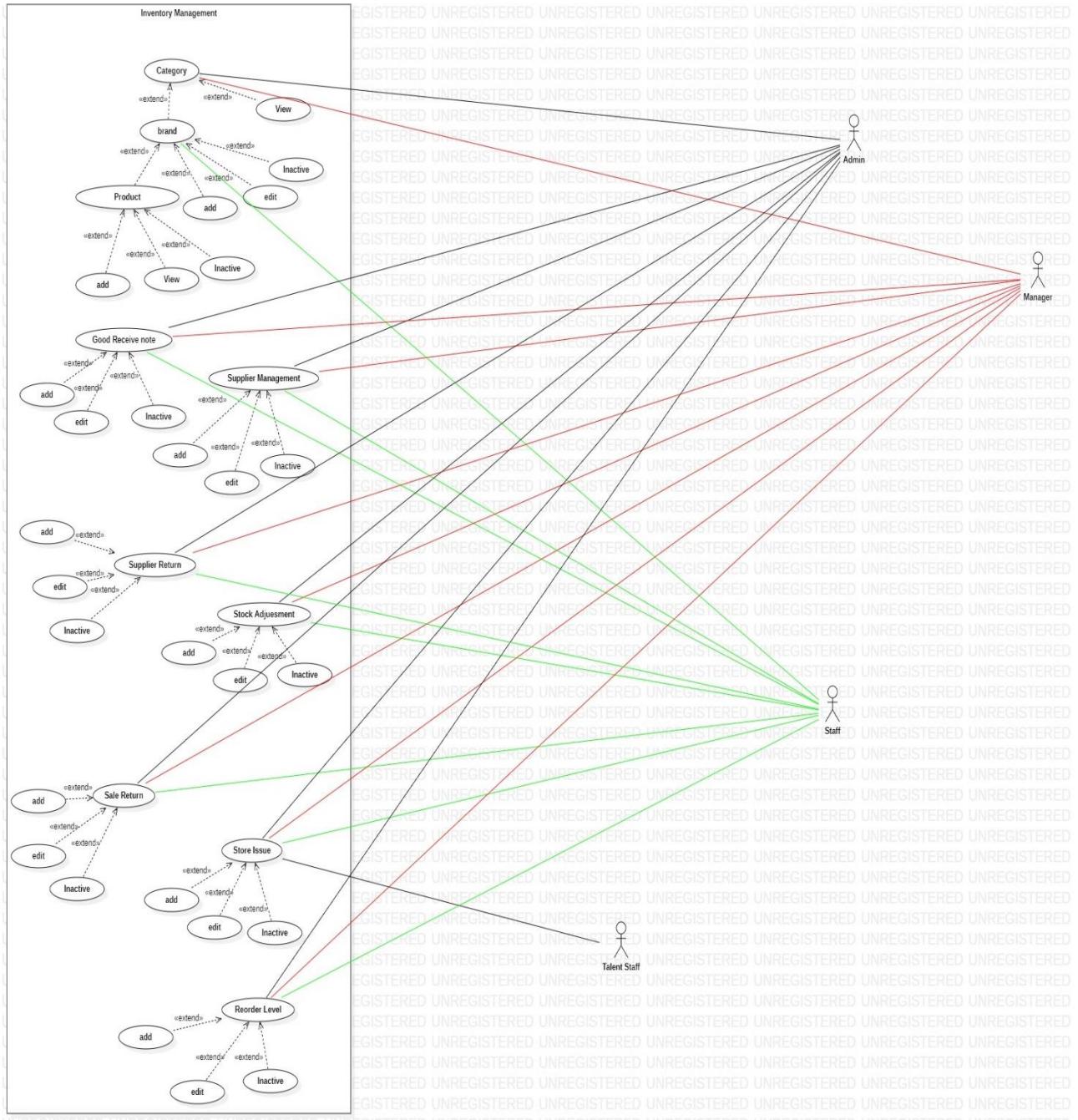


Figure 12: Use Case of Inventory Management:

## 9. Appendix C: Issues List