

**PROJECT FINAL REPORT  
FOR GROUP PROJECT  
CST 291-2**

**Group No: 18(Batch 20)**

**Online Book Hub - BookHive**

**Computer Science & Technology Degree Program**

**Department of Computer Science and Informatics**

**Uva Wellassa University**

**September 2024**

## Group Details

**Group No:** 18(Batch 20)

### Group Member Details:

Registration Number	Name	E-mail	Contact Number
UWU/CST/20/013	V. Janushankan	<a href="mailto:cst20013@std.uwu.ac.lk">cst20013@std.uwu.ac.lk</a>	0711439088
UWU/CST/20/023	K. Kajanan	<a href="mailto:cst20023@std.uwu.ac.lk">cst20023@std.uwu.ac.lk</a>	0762925096
UWU/CST/20/032	V. Thanujaa	<a href="mailto:cst20032@std.uwu.ac.lk">cst20032@std.uwu.ac.lk</a>	0741356824
UWU/CST/20/033	K. Pirashoban	<a href="mailto:cst20033@std.uwu.ac.lk">cst20033@std.uwu.ac.lk</a>	0760021017
UWU/CST/20/099	J. Sharanya	<a href="mailto:cst20099@std.uwu.ac.lk">cst20099@std.uwu.ac.lk</a>	0765471338
UWU/CST/20/110	S. Navaneethan	<a href="mailto:cst20110@std.uwu.ac.lk">cst20110@std.uwu.ac.lk</a>	0764822492
UWU/CST/20/035	F. R. Farhath	<a href="mailto:cst20035@std.uwu.ac.lk">cst20035@std.uwu.ac.lk</a>	0762294783

### Supervisors Details

Name	E-mail	Contact Number
Ms. R.P. Abeywardhana	<a href="mailto:rashmi@uwu.ac.lk">rashmi@uwu.ac.lk</a>	0719151945

### Approval Signatures

Date: 2024.09.27

.....  


Ms. R.P. Abeywardhana

Supervisor

## **Table of Contents**

<b>1. Introduction .....</b>	1
<b>1.1 Project Title .....</b>	1
<b>1.2 Project Background .....</b>	1
<b>1.3 The Project Aims and Objectives .....</b>	2
<b>1.3.1 Sub Objectives.....</b>	2
<b>2. Project Description .....</b>	3
<b>2.1 Functional Requirements .....</b>	3
<b>2.2. Non-functional Requirements .....</b>	5
<b>2.3 User Levels and User Roles .....</b>	7
<b>2.4 Diagrams .....</b>	10
<b>2.4.1 Use Case diagram .....</b>	10
<b>2.4.2 Class Diagram.....</b>	11
<b>2.4.3 ER Diagram.....</b>	12
<b>3. Methodology .....</b>	13
<b>3.1 Waterfall Methodology .....</b>	13
<b>3.2 How we are planning to carry out our development phases .....</b>	15
<b>4. Resources .....</b>	17
<b>4.1 Software Requirements.....</b>	17
<b>4.2 Hardware Requirements .....</b>	18
<b>4.3 Technology .....</b>	19
<b>5. Implementation .....</b>	20
<b>6. Project Plan [Timeline].....</b>	21
<b>6.1 Gantt Chart.....</b>	21
<b>6.2 Individual Contribution.....</b>	22
<b>6.3 Future Work .....</b>	23
<b>7. References .....</b>	24
<b>8. Appendix.....</b>	25

## Table of Figures

Figure 1-Use Case Diagram.....	10
Figure 2-Class Diagram .....	11
Figure 3-ER Diagram.....	12
Figure 4-Gantt Chart .....	21

## Appendix

Figure 5: Home Page.....	25
Figure 6 : Book Categories.....	25
Figure 7: Book Publishing Services .....	26
Figure 8 : Delivery Information .....	26
Figure 9: Upcoming Events.....	27
Figure 10 :Sign Up as A Customer Page.....	27
Figure 11 : Sign Up as A Charity Organization .....	28
Figure 12 : Log In.....	28
Figure 13 : Sign UP as A Publisher.....	29
Figure 14 : Sign UP Page .....	29
Figure 15: Admin Home Page.....	30
Figure 16 : Admin User Approval Page.....	30
Figure 17 : Order .....	31
Figure 18: Pending Payment Receipt Requests Page .....	31
Figure 19 : Report Generate .....	32
Figure 20: Admin Home Page.....	32
Figure 21: Customer Home Page .....	33
Figure 22: Customer Services Page.....	33
Figure 23: Book Events .....	34
Figure 24: Customer Contact Us .....	34
Figure 25: Customer Contact Us .....	35
Figure 26: Customer Dashboard.....	35
Figure 27: Profile page .....	36
Figure 28: Profile page .....	36
Figure 29: Notification page.....	37
Figure 30: Content Page .....	37
Figure 31: Event page.....	38

Figure 32: Order Page .....	38
Figure 33: Publisher Dashboard .....	39
Figure 34: Publisher Dashboard .....	39
Figure 35: Publisher Notifications Page.....	40
Figure 36: Publisher Books Details Page .....	40
Figure 37: Publisher Orders Page.....	41
Figure 38: Publisher Payment Page.....	41
Figure 39: Publisher Events Page.....	42
Figure 40: Publisher Profile Page.....	42
Figure 41: Publisher Profile Page.....	43
Figure 42: Moderator Dashboard .....	43
Figure 43: Logout page .....	44
Figure 44: Super Admin Dashboard.....	44
Figure 45: Super Admin Dashboard.....	45
Figure 46: Super Admin Users Page .....	45
Figure 47: Super Admin Users Page .....	46
Figure 48: Super Admin Users Page .....	46
Figure 49: Super Admin Users Page .....	47
Figure 50: Super Admin Report Generate Page .....	47
Figure 51: Super Admin User Remove Page .....	48
Figure 52: Delivery Person Page .....	48
Figure 53: Delivery Person Page .....	49
Figure 54: Delivery Person Notifications Page .....	49
Figure 55: Moderator Page .....	50
Figure 56: Ongoing Challenges.....	50
Figure 57: Pending Events Page.....	51
Figure 58: Content Reviews Page .....	51
Figure 59: Complains Page .....	52
Figure 60: Notifications Page.....	52

# **1. Introduction**

## **1.1 Project Title**

Online Book Hub - BookHive

## **1.2 Project Background**

The emergence of digital platforms has revolutionized various industries, and the book industry is no exception. Traditional methods of buying and selling books have often been limited by geographical and financial constraints, leading to a decline in accessibility and interest in reading, especially in less urbanized regions. This issue is particularly pronounced in places like Sri Lanka, where many individuals find it challenging to access physical bookstores or libraries due to distance and the scarcity of resources. Consequently, there is a pressing need for a versatile, accessible online platform that caters to the diverse needs of book enthusiasts, publishers, and casual readers alike.

Recognizing these challenges, the Online Book Hub aims to democratize the process of buying, selling, and exchanging books by leveraging the power of the internet. By creating a centralized digital marketplace, this project intends to bridge the gap between book owners and potential readers (“Youtube,” 2004). This approach not only facilitates the easy circulation of used books, thereby making reading more affordable, but also supports the green initiative by promoting the reuse of materials. Furthermore, the platform serves as a valuable tool for publishers who are looking to expand their reach in a competitive market, enabling them to connect directly with their target audience.

Moreover, the Online Book Hub is designed with inclusivity in mind, ensuring that users from various demographics can engage with the platform effortlessly. With features tailored to enhance user experience, such as a comprehensive book listing, detailed descriptions, and interactive exchange mechanisms, the platform encourages a culture of reading and sharing (“Stack Exchange Inc,” 2008). Additionally, it addresses the logistical aspects of online transactions, including delivery and payment processes, thereby creating a seamless, efficient, and engaging environment for all parties involved. This initiative not only fosters a love for reading but also supports economic and environmental sustainability within the community.

## **1.3 The Project Aims and Objectives**

The objective of this project is to create a web-based system that offers a wide range of features in one platform to enhance the bookselling, buying, and sharing experience and support publishers.

### **1.3.1 Sub Objectives**

- Improve the book selling and buying mechanism by enable users to sell their used books easily and provide affordable book-buying options with a diverse collection to encourage reading.
- Enhance the book sharing experience by implementing a book exchange feature for users to swap books based on preferences and assist publishers in showcasing and promoting their books to a wider audience.

Through the implementation of these features, the project aims to create an inclusive and engaging platform that brings together book lovers and publishers contributing to a culture of reading, sharing, and giving back.

## **2. Project Description**

### **2.1 Functional Requirements**

#### ➤ **Super Admin component**

- User Management.
  - ❖ Suspend or permanently ban users reported multiple times.
  - ❖ Add, remove, or reject admin, moderator, and delivery accounts.
- Monitor actions taken by admins for compliance.
- View and generate reports on user logins, logouts, and user counts.
- Oversee system maintenance and updates to ensure smooth operation.

#### ➤ **Admin Component**

- User Registration Management: Review and approve new user registrations.
- Book Listings Management - Review and approve new book listings.
- Payment management.
- View and generate reports about books and orders.

#### ➤ **Publisher Component**

- Account and Profile Management.
  - ❖ Create and verify publisher accounts.
  - ❖ Manage publisher profile and bookstore information.
- Book Listings Management.
  - ❖ List brand new books with detailed information.
  - ❖ Manage book inventory and update listings.
  - ❖ Set prices and offer discounts.

➤ **Customer Component**

- Order Management.
- Donation and Exchange Books.
- Review and Interaction - Leave ratings and reviews.
- Events and Creative Content.
  - ❖ Post, view, and save book events.
  - ❖ Showcase creative content like poems and thoughts.
- Profile and Search Management.
- View detailed book information.
- Shopping and Payment.
  - ❖ Add books to the cart and proceed to checkout.
  - ❖ Use secure payment options.

➤ **Charity Organization Component**

- Registration and Profile Management.
  - ❖ Register and manage profiles.
  - ❖ Post information about the mission, goals and activities.
- Event Management.
  - ❖ Post and update details about events.

➤ **Community Moderator Component**

- Approve short stories, poems, book reviews, and book event advertisements.
- Comment and Complaint Management.

➤ **Delivery Person Management**

- Order Management.
  - ❖ Access order details for pickup and delivery.
  - ❖ Mark orders as picked up and delivered.
  - ❖ Update delivery specifics.
- Charging and Notifications.
  - ❖ Adjust delivery charges based on weight and location.
  - ❖ Receive notifications for assigned delivery tasks.

## 2.2. Non-functional Requirements

- **Performance:** The website should load quickly, with minimal latency, even on slower internet connections. It should also be able to handle a large number of concurrent users without experiencing significant slowdowns.
- **Reliability:** The website should be available and accessible 24/7, with minimal downtime for maintenance or updates. It should also be resilient to server failures or other technical issues, ensuring that users can always access the platform.
- **Scalability:** The website should be able to scale horizontally to accommodate increased traffic and user activity over time. This includes the ability to add more servers or resources as needed without impacting performance or reliability.
- **Security:** The website should implement robust security measures to protect user data and transactions. This includes encryption of sensitive information, secure authentication mechanisms, and protection against common web vulnerabilities such as SQL injection and cross-site scripting (XSS).
- **Accessibility:** The website should be designed with accessibility in mind, ensuring that it is usable by people with disabilities. This includes support for screen readers, keyboard navigation, and other assistive technologies.
- **Compatibility:** The website should be compatible with a wide range of devices, browsers, and operating systems. This ensures that users can access the platform regardless of their preferred technology.
- **Usability:** The website should have an intuitive and user-friendly interface, making it easy for users to browse, search for, and purchase books. This includes clear navigation, helpful search functionality, and informative product descriptions.

- **Compliance:** The website should comply with relevant laws and regulations, including those related to data protection, e-commerce, and intellectual property rights. This includes obtaining necessary licenses and permissions for selling books online.
- **Performance Monitoring:** The website should have built-in tools for monitoring performance metrics such as page load times, server response times, and error rates. This allows for proactive identification and resolution of issues that could impact user experience.

These non-functional requirements are essential for ensuring the system's overall performance, security, usability, and compatibility, providing a reliable and efficient our system.

## **2.3 User Levels and User Roles**

### **1. Super Admin**

- Super Admin can suspend or permanently ban users who have been reported multiple times for misconduct or policy violations.
- Super Admin can add admin accounts, moderator accounts, and delivery accounts to the system. Additionally, the Super Admin has the authority to remove or reject their accounts.
- Super Admin can monitor and review actions taken by admins, ensuring compliance with guidelines and policies.
- Super admin can view and generate reports about user logins, logouts, and number of users.
- Super Admin oversees system maintenance, and updates, and ensures the platform's smooth operation.

### **2. Admin**

- Admin can review and approve new user registrations, ensuring valid and accurate information.
- Admin can review and approve book listings ensuring they adhere to platform guidelines.
- Admin can inform the super admin about escalated issues, critical incidents, or cases that require super admin intervention.
- Admin can monitor payment status, verify successful transactions, and resolve any payment-related issues.
- Admin can manage revenue generated from fees and commissions, tracking financial transactions.
- Admin can view and generate reports about books and orders.

### **3. Customer**

- Customers can register and create user profiles.
- Customers can browse and search for books based on different criteria such as genre, author, title, and keywords.
- Advanced search options and filters are available to refine book search results.
- Customers can view detailed information about books, including summaries, author details, and book cover images.
- Customers can add books to their shopping carts and proceed to checkout.
- Secure payment options are provided for online book purchases.
- Customers have the option to donate books to charity organizations through the platform.

- Customers have the ability to leave ratings and reviews for books they have purchased or read.
- Customers can participate in book exchange programs, allowing them to trade books with other users.
- Customers can list and sell their own used books on the platform.
- Customers have the capability to post their book events on our platform, as well as view and save other events in their event calendars.
- Customers are able to showcase their creative content such as poems and thoughts through the user-generated content platform.

#### **4. Publisher**

- Publishers can create an account on the platform and provide accurate information about themselves and their bookstore.
- Publishers need to go through a verification process to confirm their identity and the authenticity of their business.
- Publishers can have a dedicated profile where they can showcase their brand and bookstore information.
- Publishers can list their brand-new books for sale, including detailed book information such as title, author, genre, description, and price.
- Publishers can manage their inventory, and update book listings.
- Publishers can set prices for their brand-new books and offer special discounts to attract buyers.

#### **5. Delivery Person**

- Admin establishes a connection with a third-party delivery system, allowing members of that system to log into our platform.
- Delivery persons have the ability to access specific information about assigned orders, which includes details about pickup and delivery locations.
- These delivery persons hold the authority to mark orders as picked up from the publisher's location and, upon successful delivery, they can indicate the order as received by the customer.
- Additionally, delivery persons are equipped to update delivery specifics, such as confirming the order's receipt from the publisher and the successful delivery to the customer.
- Delivery personnel possess the capability to adjust the charging table for deliveries based on factors such as weight and location.

- They are also set up to receive notifications for newly assigned delivery tasks and stay updated on any changes to orders.
- If any inquiries or issues arise, delivery persons have access to customer support to address them effectively.

## **6. Community Moderator**

- Community moderators can approve short stories, poems, and book reviews. Then those contents are displayed in the system.
- Community moderators can approve the book event advertisements.
- Community moderators can create book challenges as quizzes and then give redeem points to winners.
- Community moderators can monitor and delete unnecessary comments.
- Community moderators can handle complaints and also escalate them to the super admin.

## **7. Charity Organization**

- Charity organizations can register on the platform, providing the necessary details and documentation. The registration request requires approval from the platform's admin. Upon approval, charity organizations gain access to the platform's features and functionalities.
- Charity organizations can create and manage their profiles on the platform, providing information about their mission, goals, and activities.
- Charity organizations can post and update details about their upcoming events, such as book drives, fundraisers, or community outreach initiatives.
- Charity organizations can specify the types of books they need for their programs or events, indicating specific genres, age groups, or subjects.
- Charity organizations can connect with potential donors and book contributors through the platform, fostering communication and collaboration.
- Charity organizations can post volunteer opportunities related to book-related activities, encouraging community involvement.

## 2.4 Diagrams

### 2.4.1 Use Case diagram

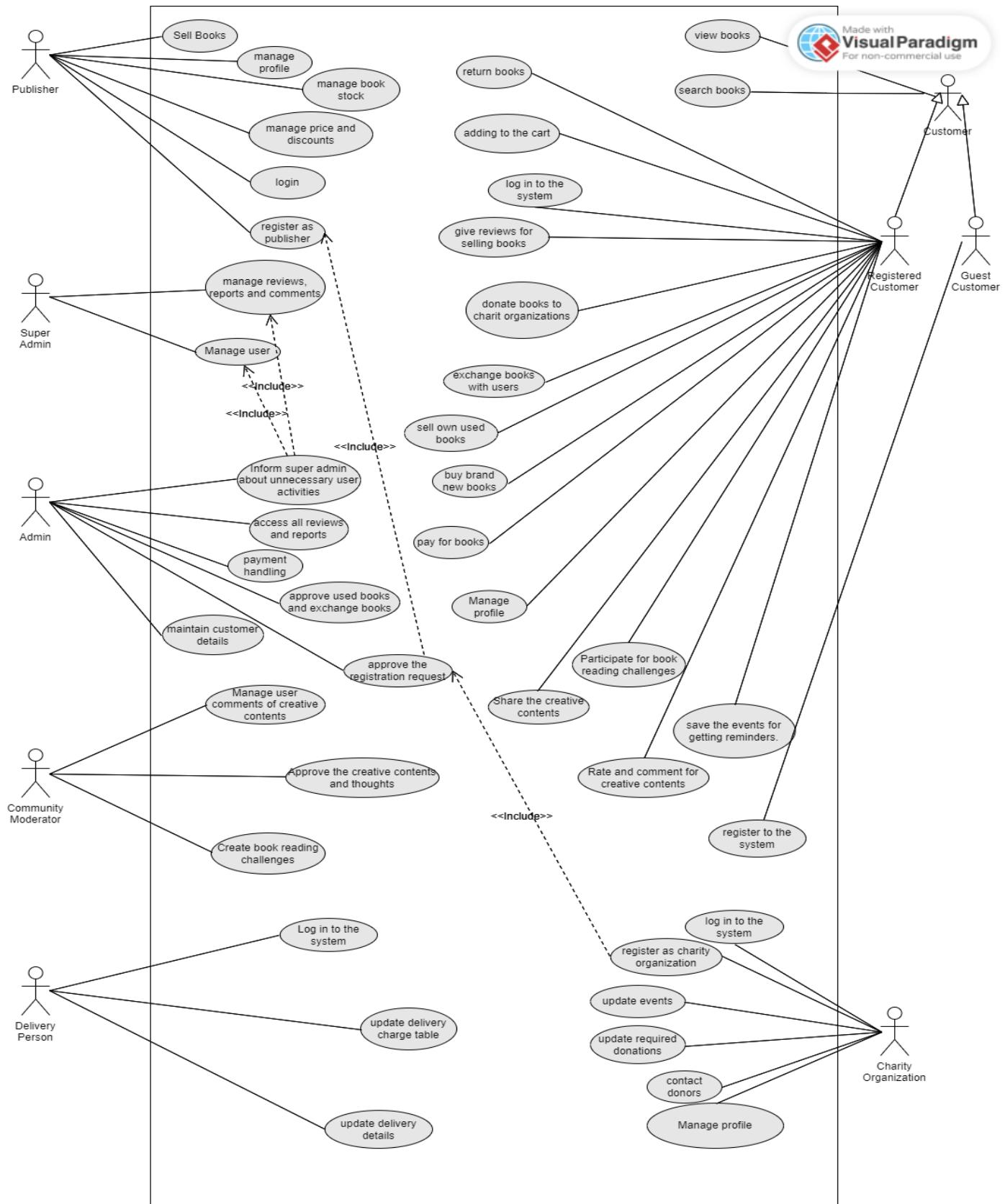


Figure 1-Use Case Diagram

## 2.4.2 Class Diagram

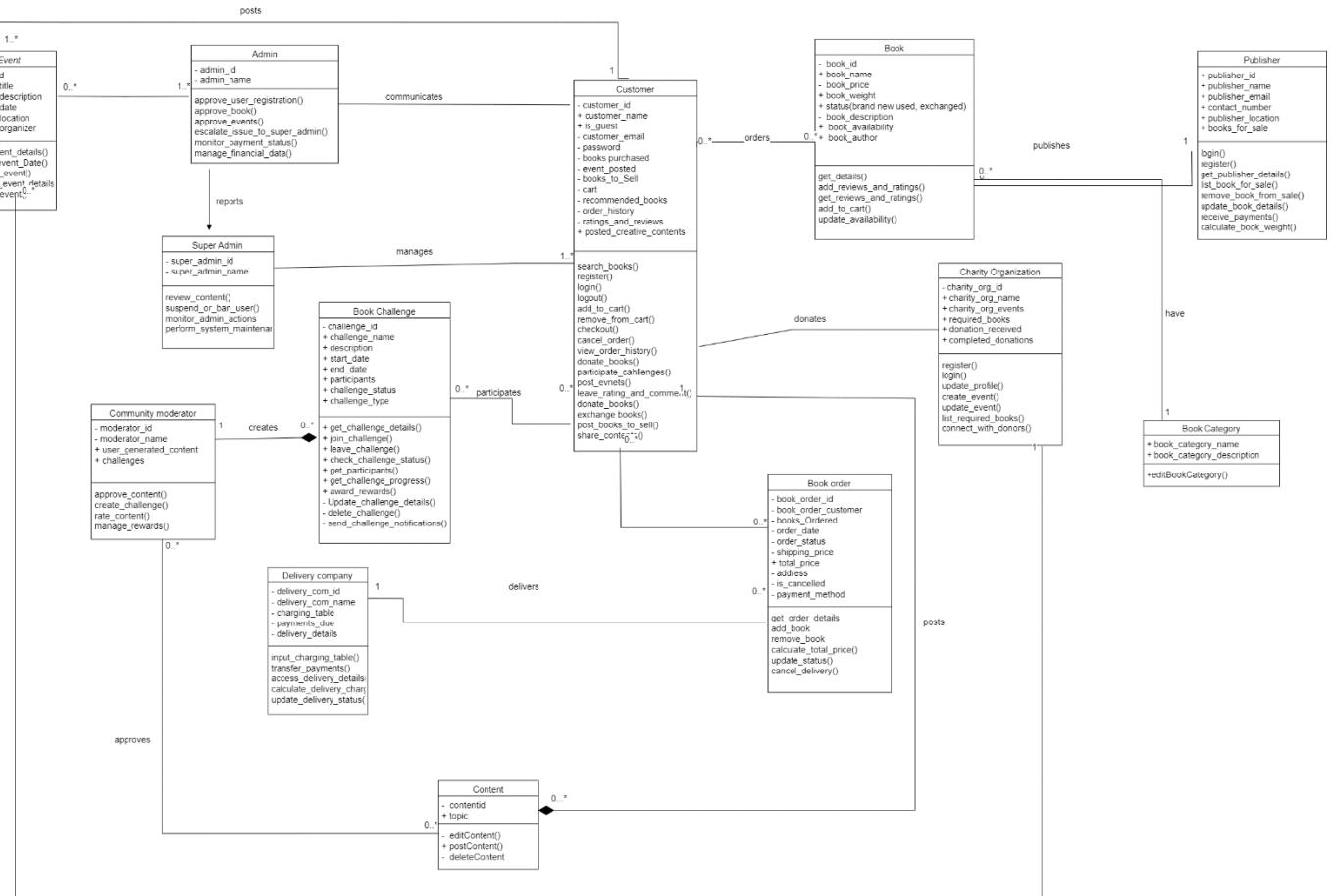


Figure 2-Class Diagram

## 2.4.3 ER Diagram

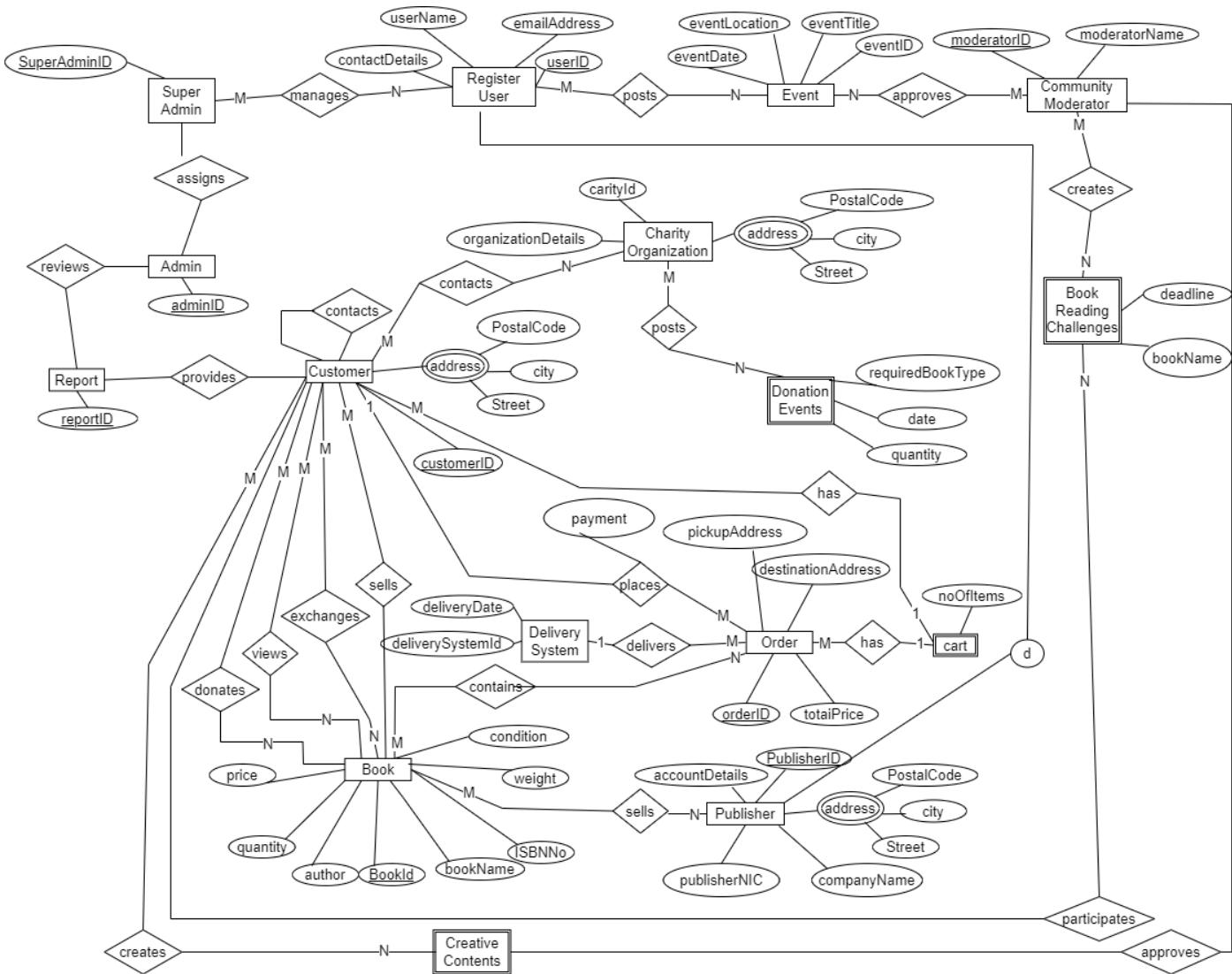


Figure 3-ER Diagram

### Assumptions

- Customer, publisher and charity organization should register and login to the system.

## **3.Methodology**

### **3.1 Waterfall Methodology**

In Sri Lanka's fast-paced world, busy schedules limit visits to physical bookstores and libraries. This creates a double bind: limited access to desired books due to stock or sorting issues, and the high cost of new books, especially for students. Here, used books shine. They offer affordable entry into a vast literary world, crucial in a country with scarce libraries. Furthermore, book lovers relish selling pre-loved treasures to fund new adventures, while a strong desire to share reading exists. However, finding reliable donation channels can be difficult. By creating a thriving used book ecosystem, Sri Lanka can bridge this gap, nurturing its reading culture and ensuring affordable access for all("GeeksforGeeks," 2010).

Waterfall model is used for no requirements changes in future. So, in our case we know every requirement in clear manner So that's the thing we was plan to used our waterfall model.

Here is SDLC according to waterfall model.

#### **➤ Requirements Gathering:**

- Gather and analyze the requirements from all stakeholders.
- Identify all functional requirements like registration, login, book viewing, buying, selling, exchanging books.
- Define user roles such as Super Admin, Customer, Publisher, and Delivery Person, along with their specific permissions and capabilities.
- Define non-functional requirements like performance, security, and usability("Youtube," 2004).

#### **➤ System Design:**

- Create a high-level system architecture based on the gathered requirements.
- Defining how the Online Book Hub will work internally and how it will interact with users and external systems.
- Design the database schema for storing books, user profiles, transactions, etc.
- Develop wireframes or mockups to visualize the user interface and user experience.

➤ **Implementation:**

- Develop the core functionalities of the website, such as user authentication, book listing, search, and checkout processes.
- Implement the front-end interface using HTML, CSS, and JavaScript.
- Develop the back-end logic using a suitable programming language (**PHP**).

➤ **Testing:**

- Perform unit testing to ensure individual components work as expected.
- Conduct integration testing to verify interactions between different modules.
- Test the website's usability, performance, and security.

➤ **Deployment:**

- Deploy the website to a staging environment.
- Setting up servers, databases, and deploying the codebase so that it is accessible to users.
- Deploy the website to the production environment for public access.

## **3.2 How we are planning to carry out our development phases**

### **➤ Phase 1: Planning and Analysis**

- Define project scope, objectives, and constraints.
- Conduct stakeholder meetings to gather requirements and prioritize features.
- Develop user stories and use cases to capture functional requirements.
- Create system architecture diagrams and database designs.
- Define roles and access levels for different user types.

### **➤ Phase 2: Design**

- Design the user interface for the website, focusing on ease of use and intuitive navigation.
- Create wireframes and mockups to visualize the layout and interactions.
- Design the database schema to store user profiles, book listings, transactions, etc.
- Define the workflow for key processes such as book selling, buying, and exchanging.

### **➤ Phase 3: Implementation**

- Develop the front-end of the website using HTML, CSS, and JavaScript.
- Implement the back-end logic using a suitable programming language (PHP).
- Integrate third-party APIs for payment processing, book search, and delivery tracking.
- Implement user authentication and authorization mechanisms.
- Develop features such as book listing, searching, buying, selling, exchanging, and reviewing.
- Implement administrative features for managing users, books, deliveries, and payments.

### **➤ Phase 4: Testing**

- Conduct unit tests to ensure individual components work correctly.
- Perform integration tests to verify interactions between different modules.
- Conduct system tests to validate end-to-end functionality and user workflows.
- Perform security testing to identify and mitigate vulnerabilities.
- Test for compatibility across different devices, browsers, and operating systems.

➤ **Phase 5: Deployment**

- Deploy the website to a staging environment for final testing and review.
- Address any issues or bugs identified during testing.
- Once everything is working correctly, deploy the website to the production environment for public access.
- Set up monitoring and logging systems to track performance and detect issues.

➤ **Phase 6: Maintenance and Support**

- Provide ongoing support and maintenance to address user feedback and bug reports.
- Monitor system performance and scalability, making adjustments as needed.
- Regularly update the website with new features, improvements, and security patches.
- Conduct periodic reviews to evaluate the effectiveness of the platform and identify areas for enhancement.

Throughout each phase, it's essential to involve stakeholders and gather feedback to ensure that the final product meets the project objectives and user needs effectively. Additionally, following an waterfall model approach allows for flexibility and adaptation to changing requirements and priorities over time.

## **4.Resources**

### **4.1 Software Requirements**

#### **➤ Visual Studio Code**

- Visual Studio Code is a code editor redefined and optimized for building and debugging modern web and cloud applications.

#### **➤ WebStorm**

- WebStorm is an integrated development environment (IDE) specifically designed for web development. It is developed by JetBrains and supports JavaScript, HTML, CSS, and various web frameworks like Angular, React, and Vue.js.

#### **➤ Web browser**

- Any modern web browser.

#### **➤ Git Hub**

#### **➤ Figma**

## **4.2 Hardware Requirements**

- **Internet connection**
- **Laptop/ Desktop computer**

- Dual-core or higher processor
- 4GB RAM or higher
- Hard Disk with 10GB free or higher
- Ethernet port or Wi-Fi adapter
- Keyboard and mouse
- Windows 7 or higher OS

## **4.3 Technology**

### **➤ Frontend**

- HTML
- CSS
- JavaScript

### **➤ Backend**

- PHP
- MySQL

## **5. Implementation**

We implemented some of parts in user roles Super admin, Admin, Customer, publisher, Delivery Person, Moderator and Charity Organization.

- Super Admin: - In the Super admin part, we implemented super admin dashboard, login, manage users, removed users and generate report functionalities.
- Admin: - We developed admin login, admin dashboard, manage orders and payment, user approval and report generate functions.
- Customer: - We finished some customer functionalities. Customer home page, register, login, manage book events, customer contact us, customer dashboard, customer profile page, notification and order functions.
- Publisher: - In publisher user role, we finished publisher register, login, dashboard, notification, manage books, manage payments and order, events page, and publisher profile.
- Community moderator: - In community moderator, we developed community moderator login, dashboard and logout.
- Charity organization: - In this user role, we implemented register, login and logout.
- Delivery person: - We implemented delivery person login, dashboard, and notification functions.

## 6. Project Plan [Timeline]

### 6.1 Gantt Chart

No.	Task	Weeks											
		01	02	03	04	05	06	07	08	09	10	11	12
1.	Identify Topic [Online Book Hub System]	■											
2.	Requirements Gathering		■	■									
3.	System Design				■	■							
4.	Database Design						■	■					
5.	Back-end Development								■	■			
6.	Front-end Development									■	■		
7.	Integration Testing											■	
8.	Deployment												■
9.	Documentation	■	■	■	■	■	■	■	■	■	■	■	■

Figure 4-Gantt Chart

## **6.2 Individual Contribution**

<b>Name</b>	<b>Index Number</b>	<b>Individual Contribution</b>
V.Janushankar	UWU/CST/20/013	Super admin and admin login. Admin manage orders and payments. Admin functionalities.
K.Kajanan	UWU/CST/20/023	Publisher sign up and login. Publisher dashboard. Publisher profile. Publisher functionalities.
V.Thanujaa	UWU/CST/20/032	Customer profile management. Add events and contents. Customer dashboard. Customer functionalities.
K.Pirahoban	UWU/CST/20/033	Super admin functionalities. Customer sign up and login. Send Complains. Charity organization functionalities.
J.Sharanya	UWU/CST/20/099	Notification section. Delivery person dashboard. Delivery person login. Delivery person functionalities
S.Navaneethan	UWU/CST/20/110	Charity organization auth. Report Generate. Landing page Charity organization functionalities.
F.R Farhath	UWU/CST/20/035	Moderator login. Moderator dashboard. Manage users. Moderator Functionalities.

### **6.3 Future Work**

- **AI Recommendation Engine:** Leverage user data such as past purchases, browsing behavior, and preferences to suggest books. This could include both personalized recommendations and general trending book suggestions.
- **Collaborative Filtering:** Implement a system that suggests books based on the preferences of users with similar interests, creating a network of suggestions across the platform.

## 7. References

1. W3schools (1998/ 2024). **W3Schools** - Available at: <https://www.w3schools.com> [Accessed 08 May 2024]
2. Google LLC (2005/ 2024). **Google LLC** - Available at: <https://www.youtube.com> [Accessed 08 May 2024]
3. Stack Exchange Inc (2008/ 2024). **Stack Exchange Inc** - Available at: <https://stackoverflow.com> [Accessed 08 May 2024]
4. Tutorialspoint (2006/ 2024) **Tutorialspoint** - Available at: <https://www.tutorialspoint.com> [Accessed 08 May 2024]
5. Tutorialrepublic (2012/ 2024). **Tutorialrepublic** - Available at: <https://www.tutorialrepublic.com> [Accessed 08 May 2024]
6. GeeksforGeeks (2010/ 2024). **GeeksforGeeks** - Available at: <https://www.geeksforgeeks.org/> [Accessed 08 May 2024]

## 8. Appendix

### Landing Page

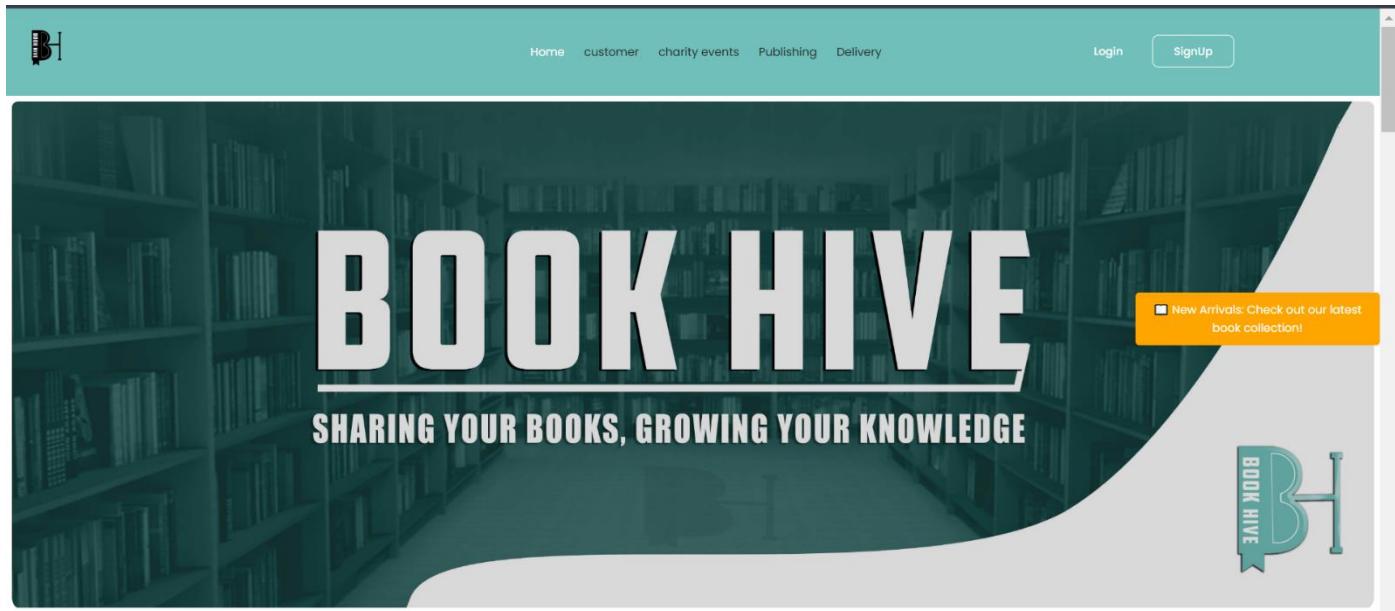


Figure 5: Home Page

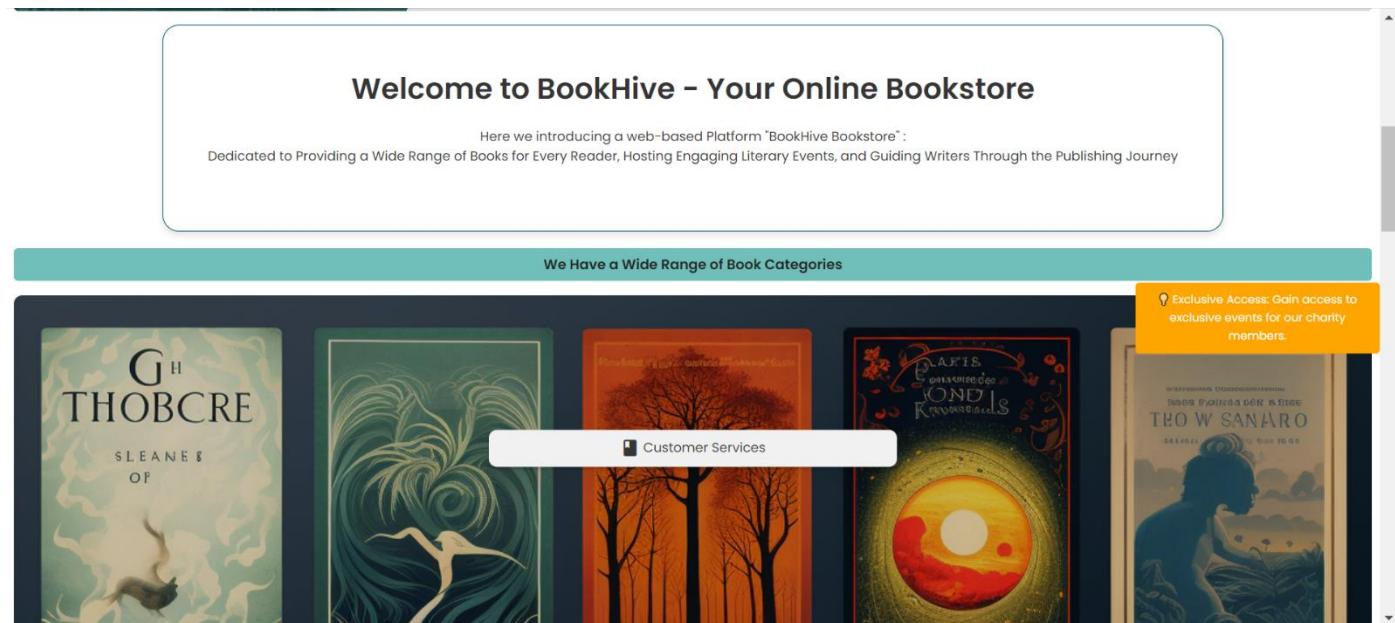


Figure 6 : Book Categories

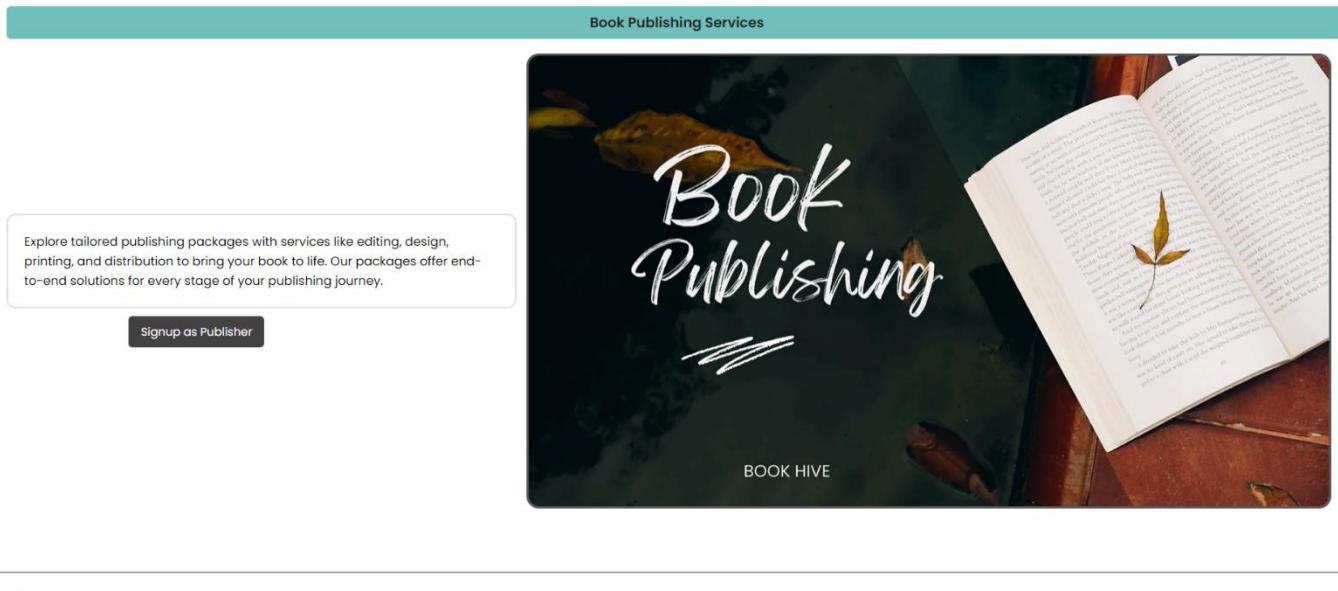


Figure 7: Book Publishing Services

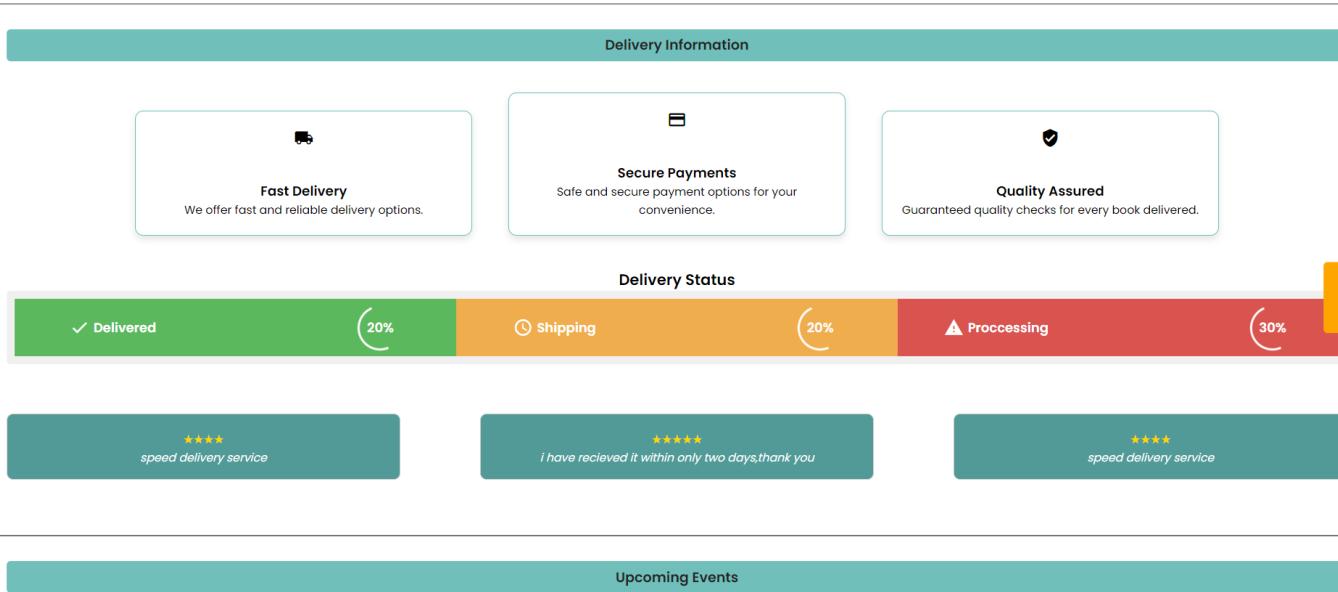


Figure 8 : Delivery Information

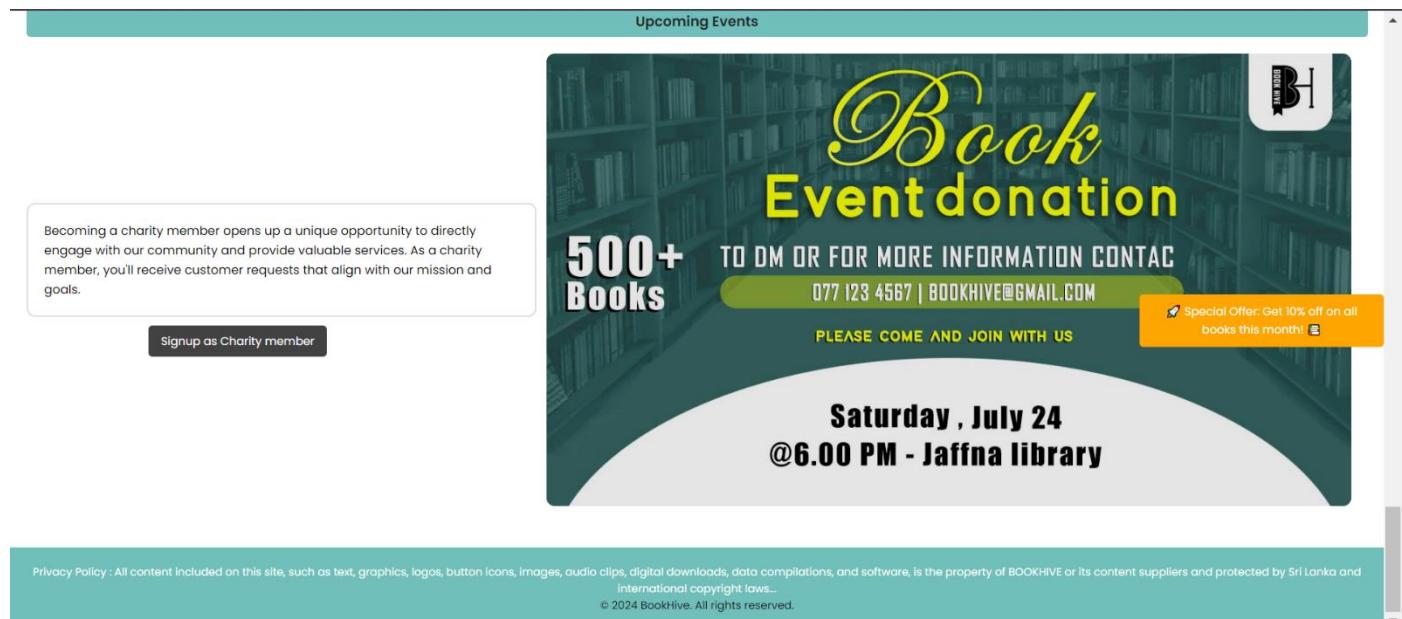


Figure 9: Upcoming Events

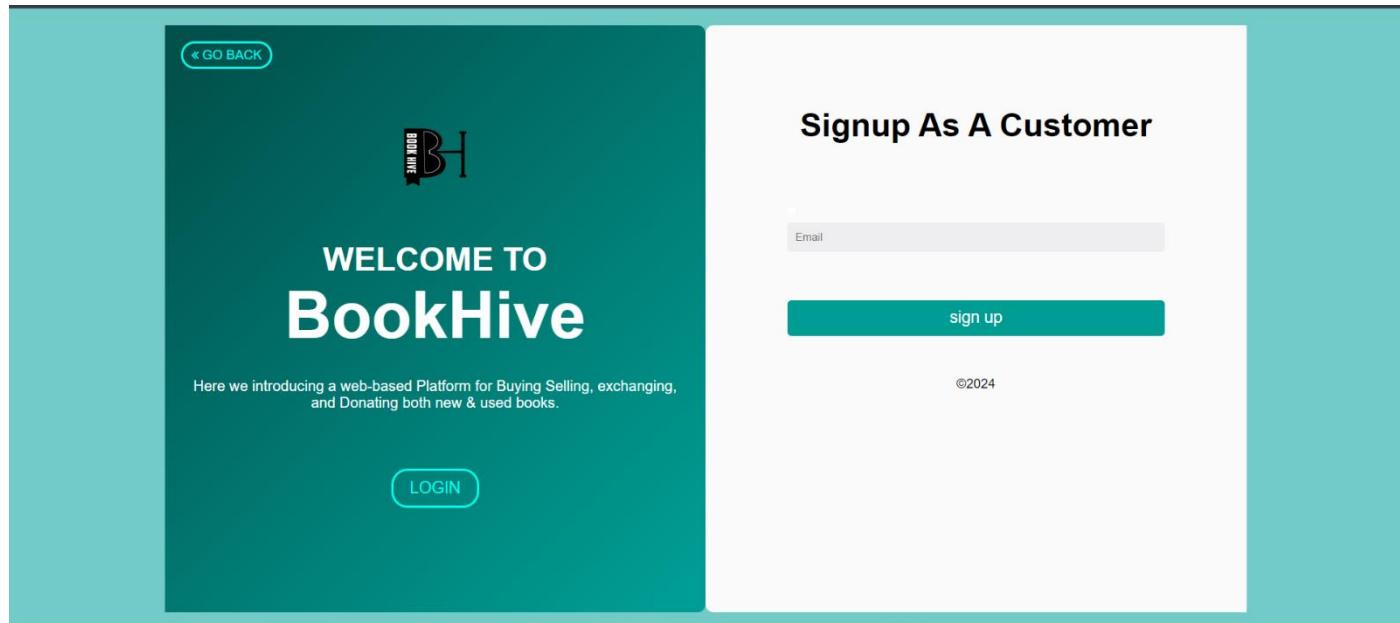


Figure 10 :Sign Up as A Customer Page

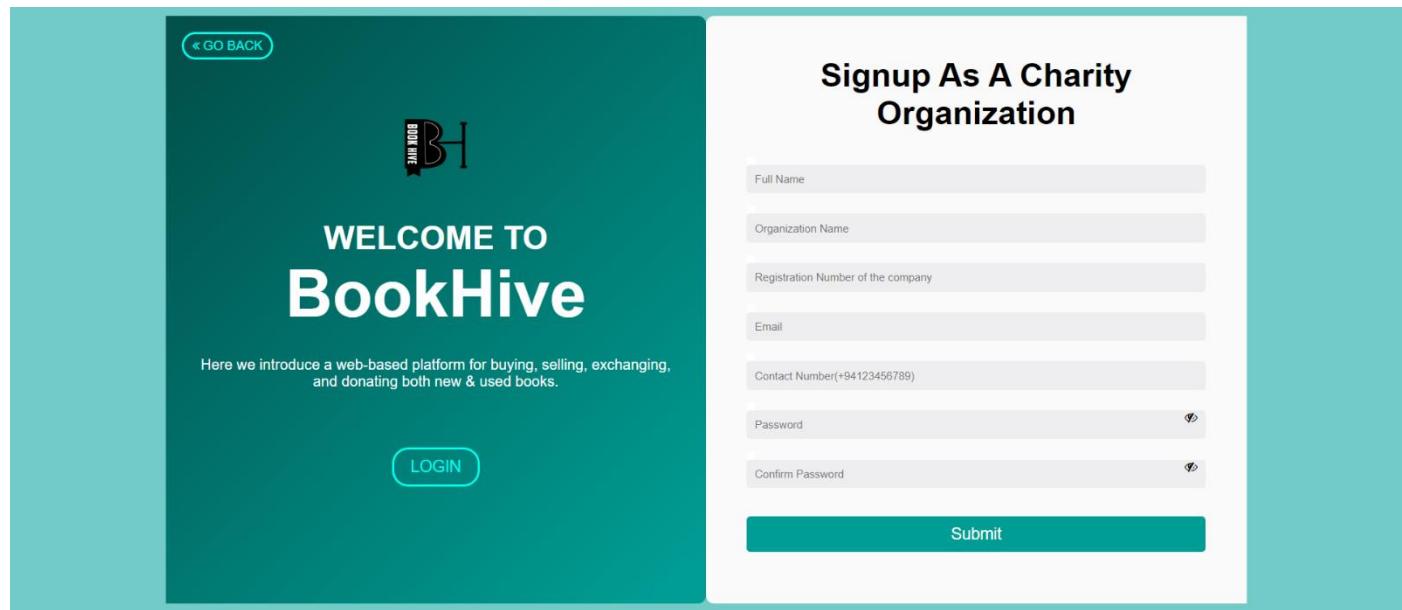


Figure 11 : Sign Up as A Charity Organization

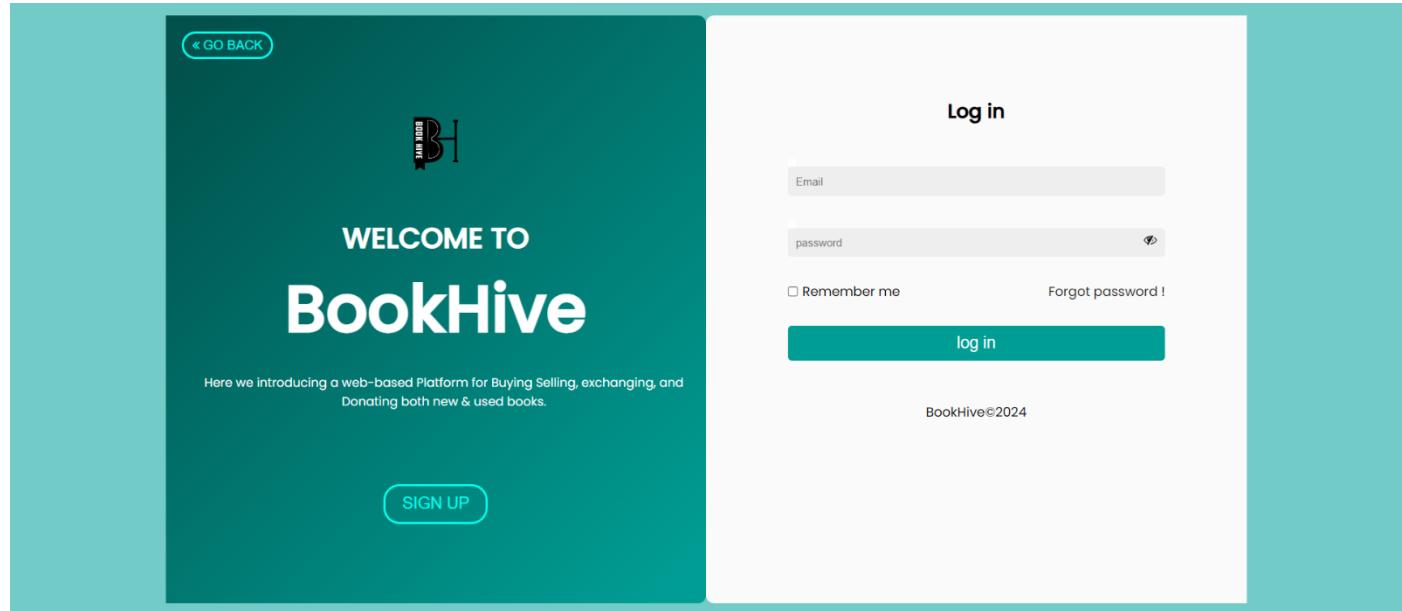
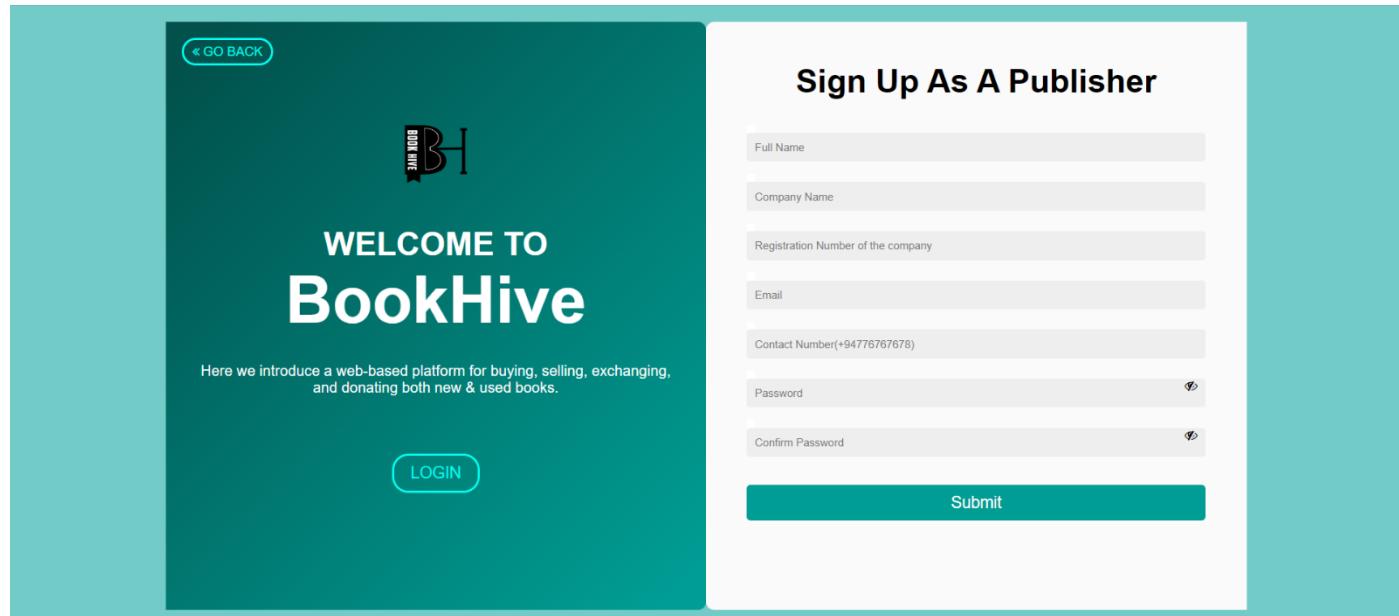
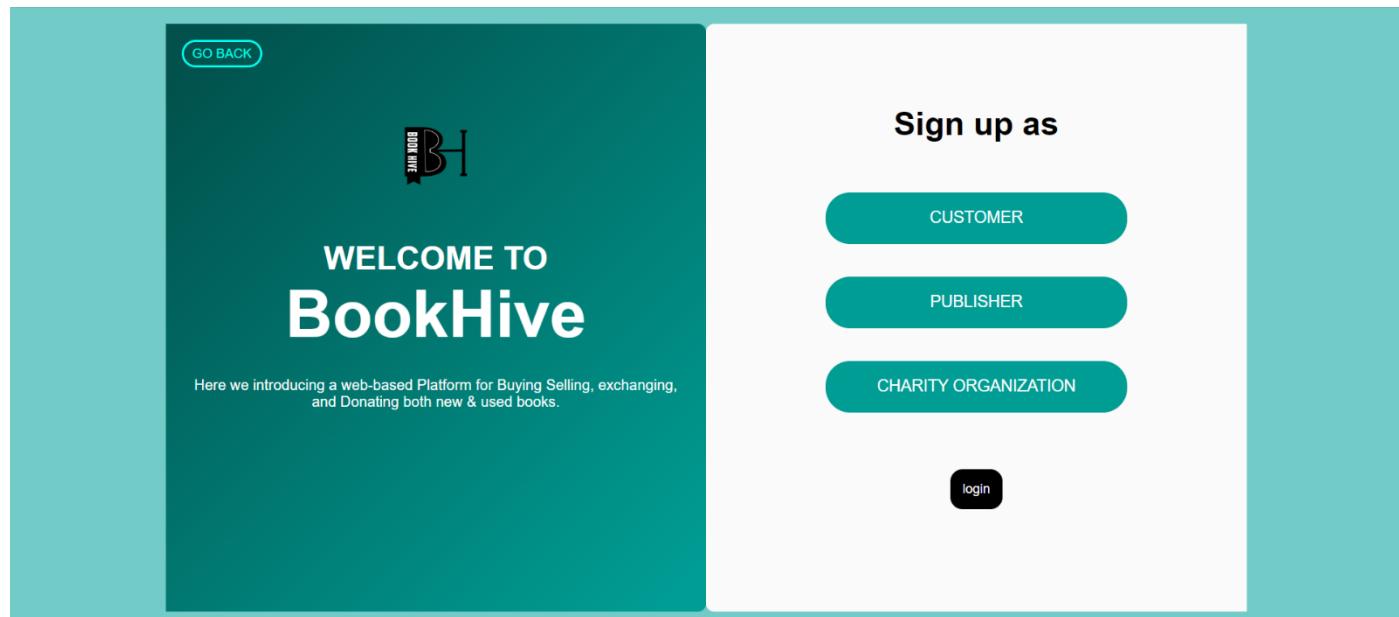


Figure 12 : Log In



The image shows a two-column sign-up interface. The left column is a teal-colored sidebar with a 'GO BACK' button at the top, followed by the BookHive logo (a stylized 'B' with 'BOOK HIVE' text). Below the logo is the heading 'WELCOME TO BookHive'. A subtext below it reads: 'Here we introduce a web-based platform for buying, selling, exchanging, and donating both new & used books.' At the bottom is a 'LOGIN' button. The right column has a white header 'Sign Up As A Publisher'. It contains six input fields: 'Full Name', 'Company Name', 'Registration Number of the company', 'Email', 'Contact Number(+94776767678)', and 'Password' (with a visibility icon). Below these is a 'Confirm Password' field with its own visibility icon. A large teal 'Submit' button is at the bottom.

Figure 13 : Sign UP as A Publisher



The image shows a simplified sign-up page. On the left, a teal sidebar features a 'GO BACK' button, the BookHive logo, and the 'WELCOME TO BookHive' heading. A subtext below it reads: 'Here we introducing a web-based Platform for Buying Selling, exchanging, and Donating both new & used books.' On the right, the heading 'Sign up as' is centered above three teal rounded rectangular buttons labeled 'CUSTOMER', 'PUBLISHER', and 'CHARITY ORGANIZATION'. Below these buttons is a small black 'login' button.

Figure 14 : Sign UP Page

# Admin

The screenshot shows the BookHive Admin interface. At the top, there are three main categories: Customers, Publishers, and Charity Organizations. Below these is a bar chart titled "Number of Users" showing the count for each category. The chart data is as follows:

User Type	Count
Publishers	4
Charity organizations	2
Customers	12
Community moderators	1
Delivery Systems	1

On the right side, there is a "Messages for you" section. Below the chart, a section titled "Pending Registration Requests" lists two entries:

Request ID	Organization Name	Type	Request Date	Actions
I70	sanasuma@gmail.com	charity	2024-04-26 21:33:30	<button>Approve</button> <button>Reject</button>
I71	moho2345@gmail.com	charity	2024-04-26 21:35:56	<button>Approve</button> <button>Reject</button>

Figure 15: Admin Home Page

The screenshot shows the BookHive Admin interface focusing on user approval. At the top, there is a small bar chart for Delivery Systems. Below it, a section titled "Pending Registration Requests" is identical to the one in Figure 15. Further down, a section titled "Pending Payment Receipt Requests" displays a table with columns: Order Id, Tracking Number, Total Price, Payment Receipt, Customer Name, Contact Number, and Actions.

Order Id	Tracking Number	Total Price	Payment Receipt	Customer Name	Contact Number	Actions

Figure 16 : Admin User Approval Page

Search Order by order date: mm/dd/yyyy

Search by Order ID...

Order ID	Book ID	Customer ID	Quantity	Order Date	Status	Total Price	Total Weight
235	135	21	1	2024-04-23 15:33:15	pending	2920.00	400
235	136	21	1	2024-04-23 15:33:15	cancel	2920.00	400
236	119	21	1	2024-04-23 17:07:54	cancel	2645.00	420
236	123	21	1	2024-04-23 17:07:54	cancel	2645.00	420

« 1 2 3 »

Figure 17: Order

Order Id	Tracking Number	Total Price	Payment Receipt	Customer Name	Contact Number	Actions
----------	-----------------	-------------	-----------------	---------------	----------------	---------

Figure 18: Pending Payment Receipt Requests Page

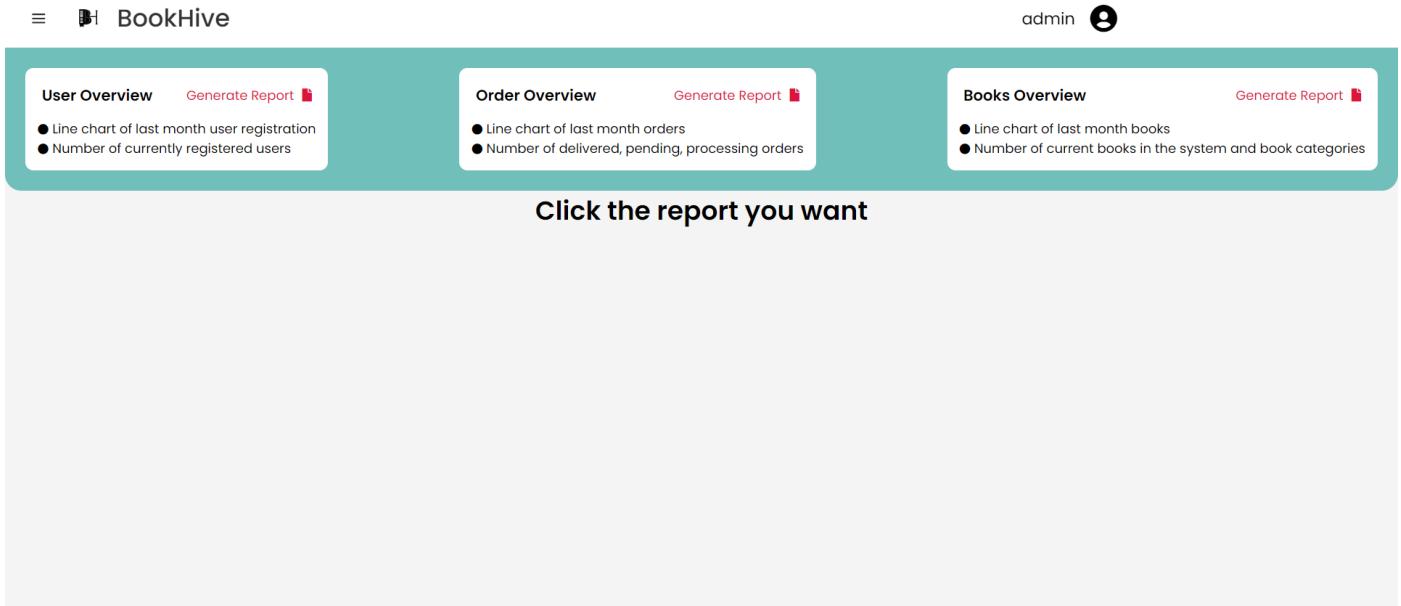


Figure 19 : Report Generate

The screenshot shows the BookHive Admin Home Page. On the left, there is a sidebar with navigation links: Dashboard, Users, Orders, Pending Book Requests, Complains, Pending Payments, Payments, Categories, and Reports. The main area features several cards: "Publishers" (with a bar chart showing 4 users), "Charity Organizations" (with a bar chart showing 11 users), and "Messages for you". Below these, there is a chart titled "Number of Users" showing the count for Publishers, Complainants, Customers, Operators, and Systems. A large text area at the bottom says "Pending Book Requests".

Number of Users

Category	Count
Publishers	4
Complainants	2
Customers	11
Operators	1
Systems	1

Figure 20: Admin Home Page

## Customer

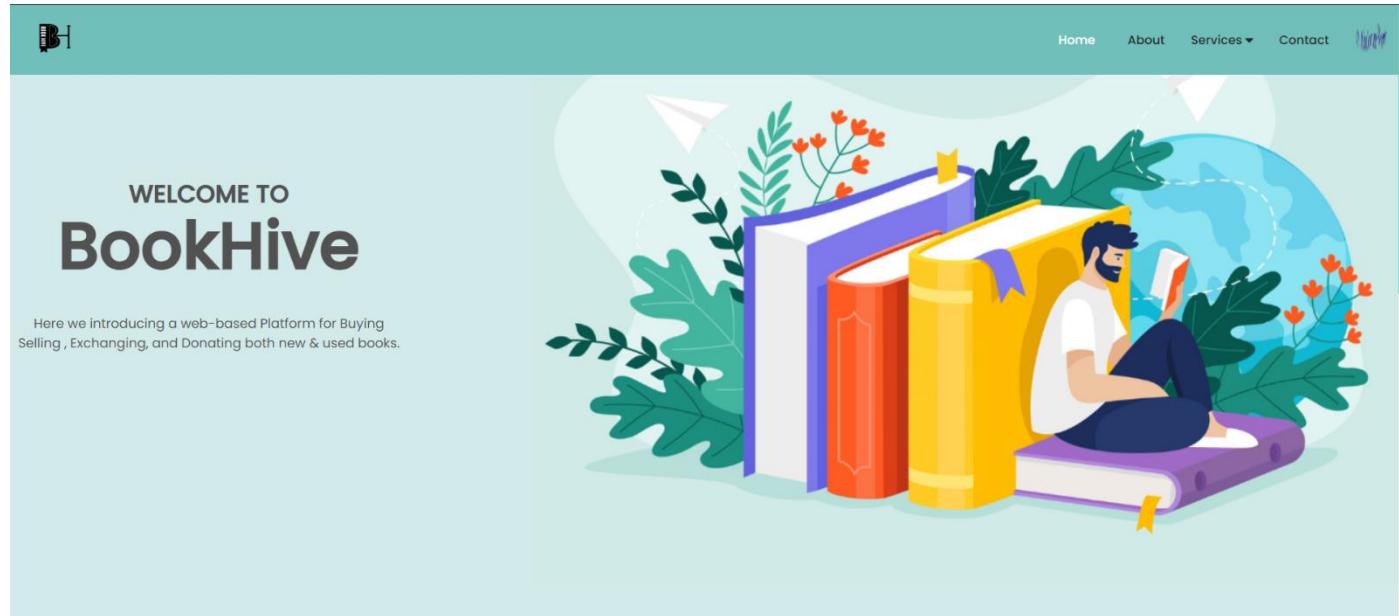


Figure 21: Customer Home Page

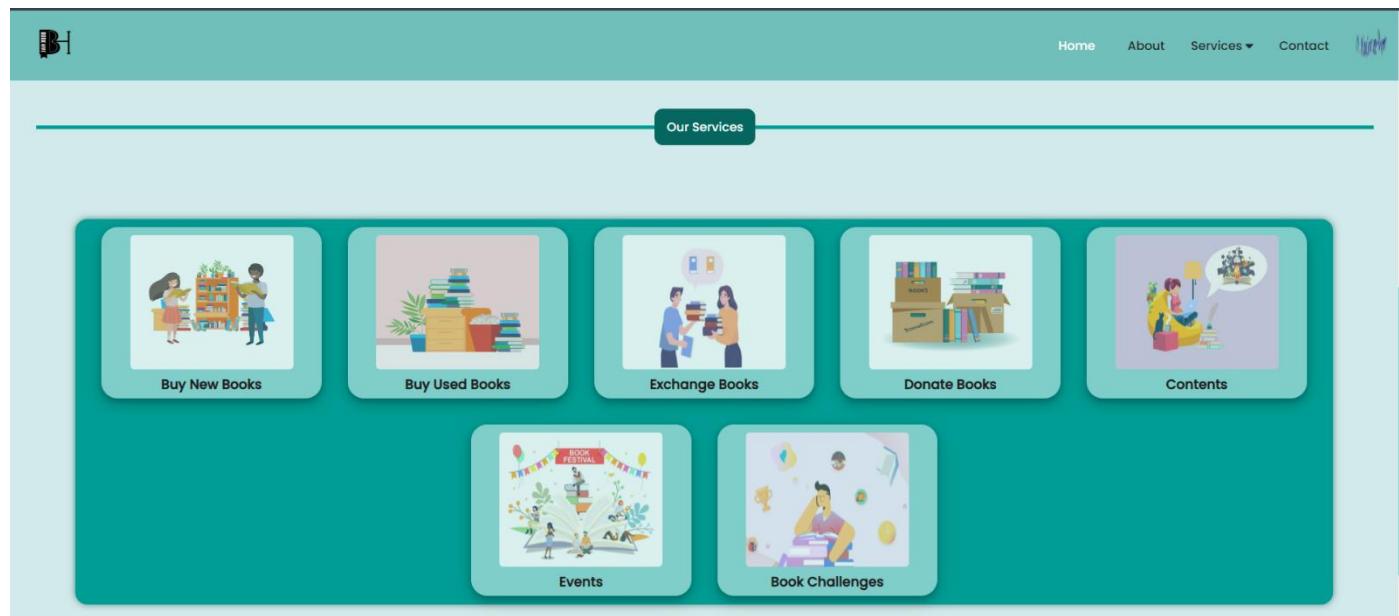


Figure 22: Customer Services Page

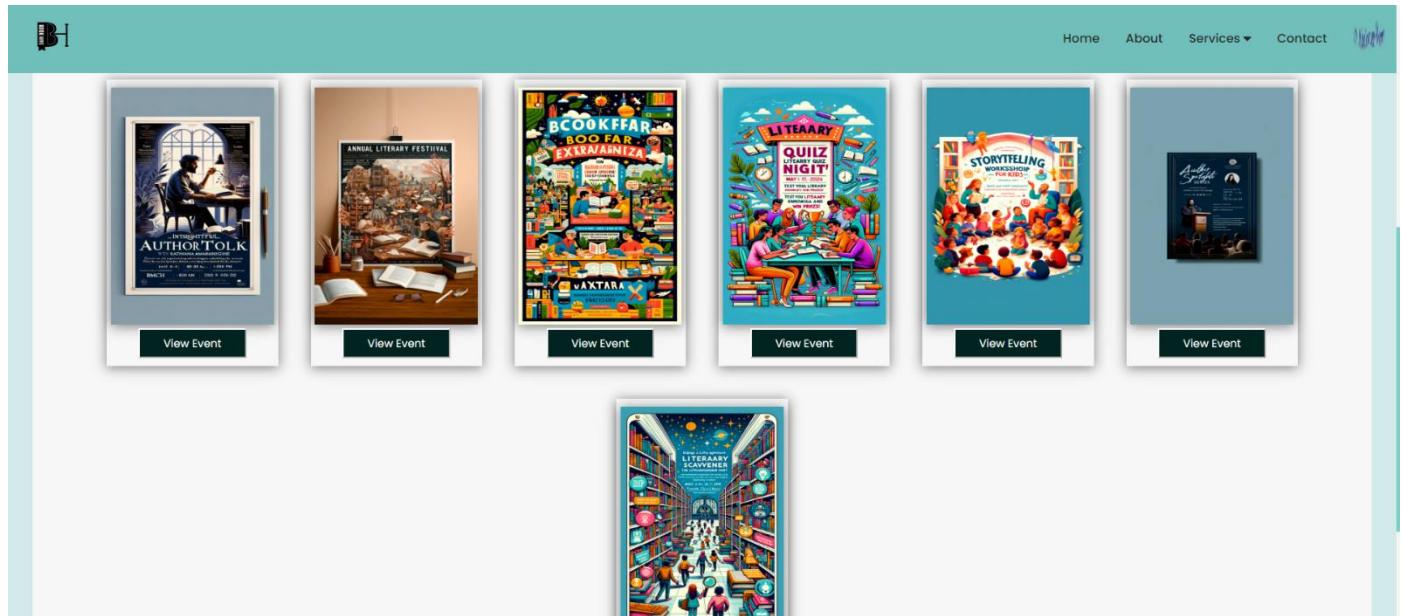


Figure 23: Book Events

A screenshot of a contact form titled 'Any Complaint?'. The form is divided into several sections: 'First Name' and 'Last Name' (text input fields); 'Email Address' and 'Phone Number (+9411232324)' (text input fields); 'Type of Complaint' (a dropdown menu currently set to 'Event related'); 'Enter Other Reason' (a text input field); 'Error Image (if any)' (a file input field with a 'Choose File' button and the message 'No file chosen'); and a large text area for 'Please provide any details'.

Figure 24: Customer Contact Us

Error Image (if any)

No file chosen

Please provide any details

**Send**

Figure 25: Customer Contact Us

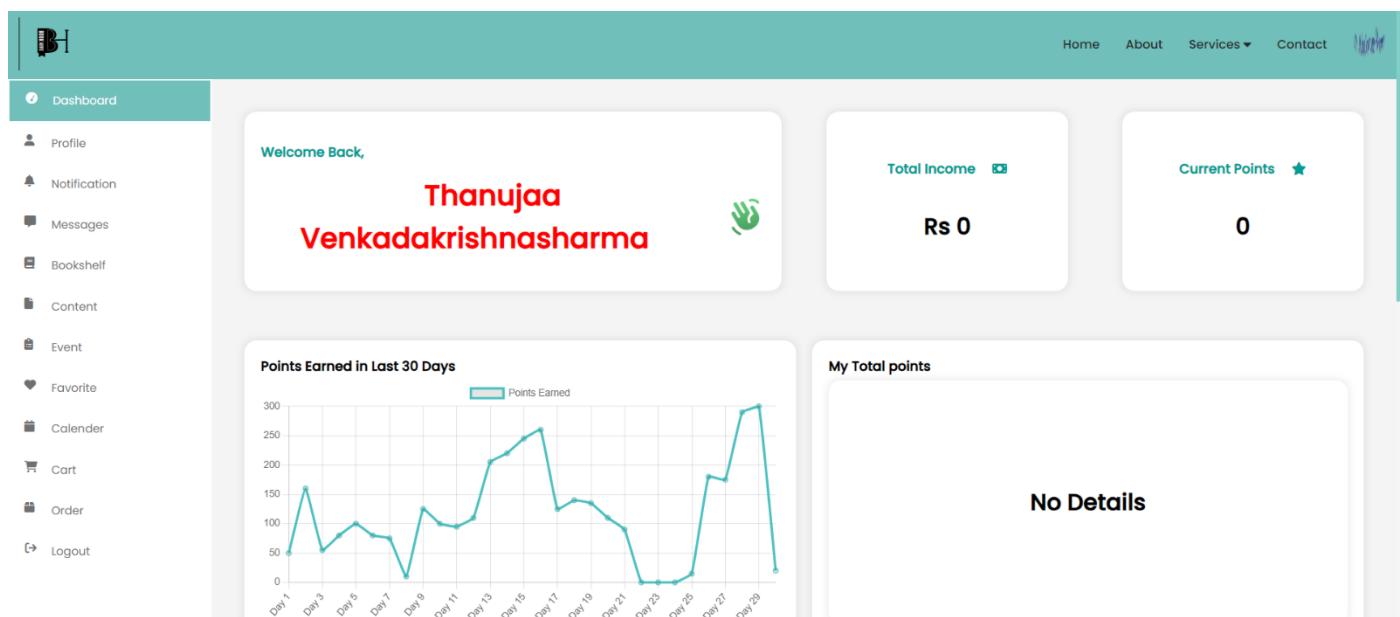


Figure 26: Customer Dashboard

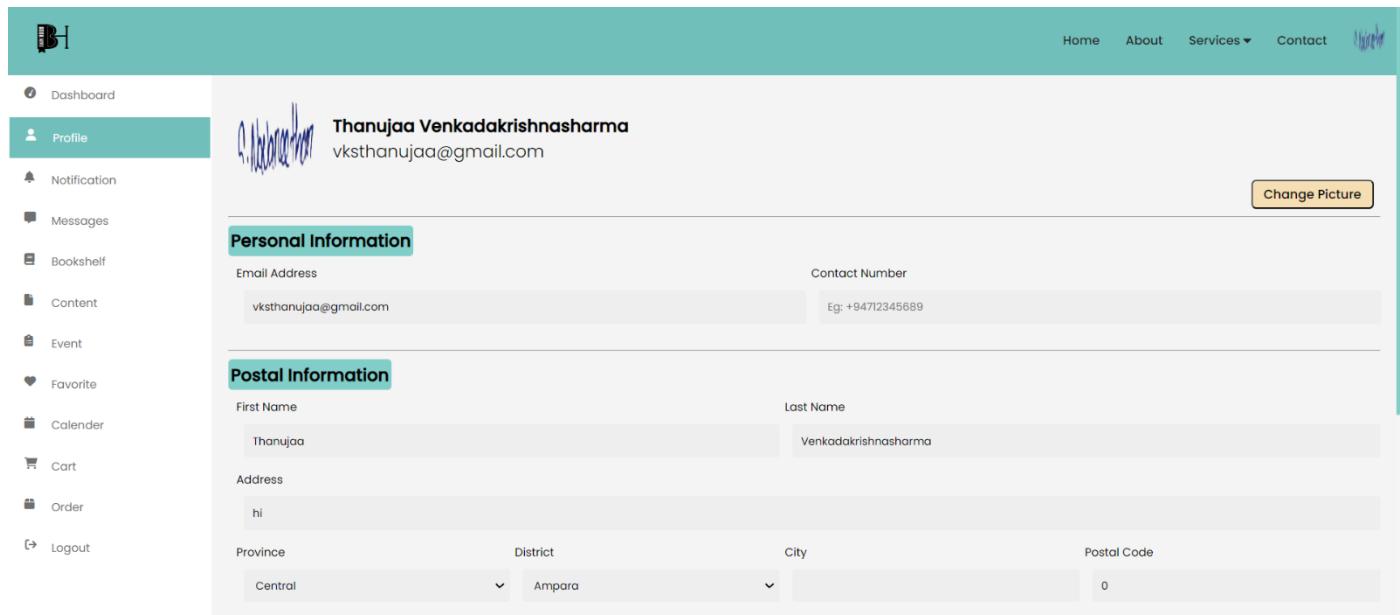


Figure 27: Profile page

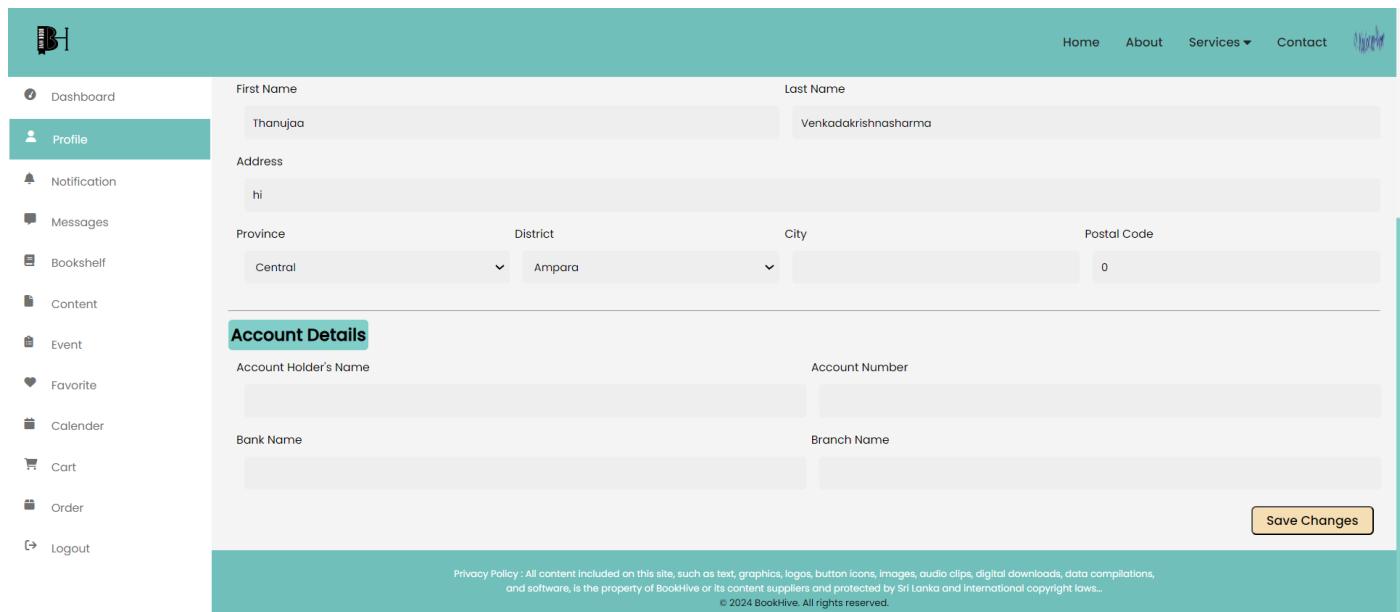


Figure 28: Profile page

The screenshot shows the BookHive application's notification page. At the top, there is a teal header bar with the logo 'BH' on the left and navigation links for Home, About, Services, Contact, and a user icon on the right. Below the header is a sidebar on the left containing links for Dashboard, Profile, Notification (which is highlighted in a teal box), Messages, Bookshelf, Content, Event, Favorite, Calender, Cart, Order, and Logout. The main content area has a teal header 'Notification' and displays the message 'No Notifications.'. At the bottom of the page is a teal footer bar with the text 'Privacy Policy : All content included on this site, such as text, graphics, logos, button icons, images, audio clips, digital downloads, data compilations, and software, is the property of BookHive or its content suppliers and protected by Sri Lanka and international copyright laws.. © 2024 BookHive. All rights reserved.'

Figure 29: Notification page

The screenshot shows the BookHive application's content page. At the top, there is a teal header bar with the logo 'BH' on the left and navigation links for Home, About, Services, Contact, and a user icon on the right. Below the header is a sidebar on the left containing links for Dashboard, Profile, Notification, Messages, Bookshelf, Content (which is highlighted in a teal box), Event, Favorite, Calender, Cart, Order, and Logout. The main content area has a teal header 'My Contents' and displays the message 'No contents added yet.'. On the right side of the main content area is a teal button labeled 'Add Content'. At the bottom of the page is a teal footer bar with the text 'Privacy Policy : All content included on this site, such as text, graphics, logos, button icons, images, audio clips, digital downloads, data compilations, and software, is the property of BookHive or its content suppliers and protected by Sri Lanka and international copyright laws.. © 2024 BookHive. All rights reserved.'

Figure 30: Content Page

The screenshot shows the 'Event' page of the BookHive application. At the top, there is a navigation bar with links for Home, About, Services, and Contact. On the left, a sidebar menu lists various options: Dashboard, Profile, Notification, Messages, Bookshelf, Content, Event (which is selected and highlighted in teal), Favorite, Calender, Cart, Order, and Logout. The main content area is titled 'My Events' and displays a message: 'No events added yet.' A teal button labeled 'Add a Event' is located in the bottom right corner of this area. At the very bottom of the page, there is a footer with a privacy policy statement and a copyright notice: '© 2024 BookHive. All rights reserved.'

Figure 31: Event page

The screenshot shows the 'Order' page of the BookHive application. The layout is similar to Figure 31, with a navigation bar at the top and a sidebar on the left containing the same list of options: Dashboard, Profile, Notification, Messages, Bookshelf, Content, Event, Favorite, Calender, Cart, Order (selected and highlighted in teal), and Logout. The main content area is titled 'My Orders'. It features a search bar and a table with three columns: 'Reference No.', 'Delivery Status', and 'View Details'. The first row of the table contains the reference number '244171525677238788', the status 'processing', and two small circular icons with arrows. Below the table, there is a footer with a privacy policy statement and a copyright notice: '© 2024 BookHive. All rights reserved.'

Figure 32: Order Page

## Publisher

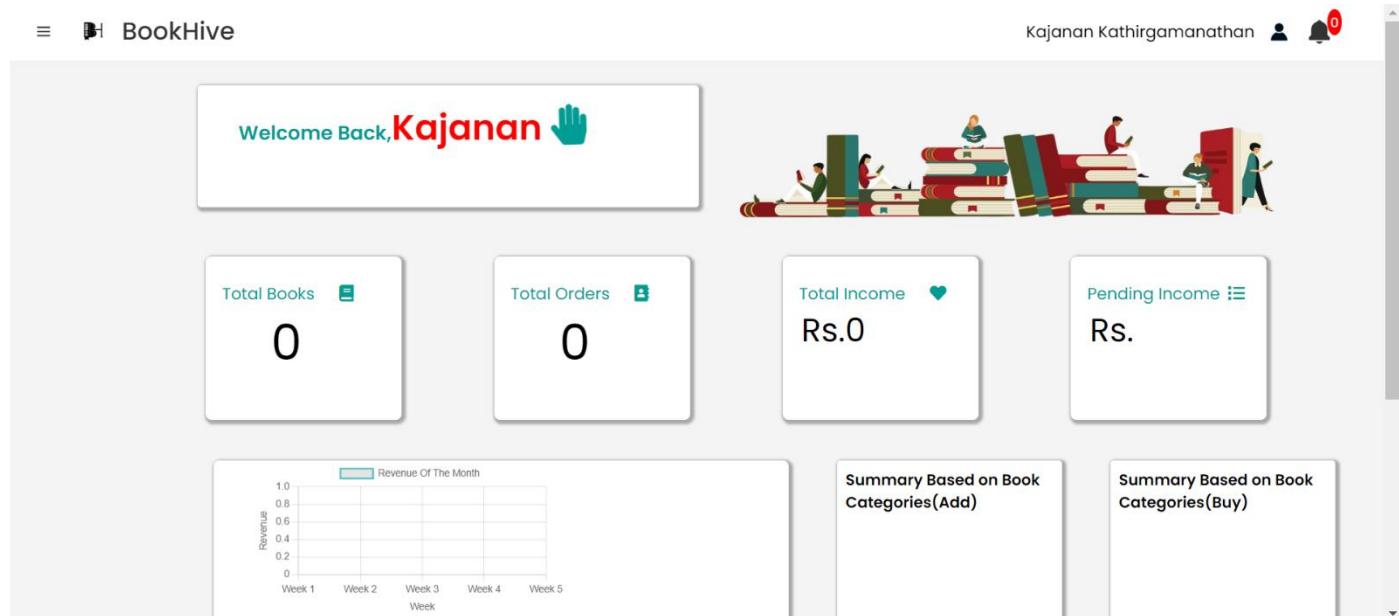


Figure 33: Publisher Dashboard

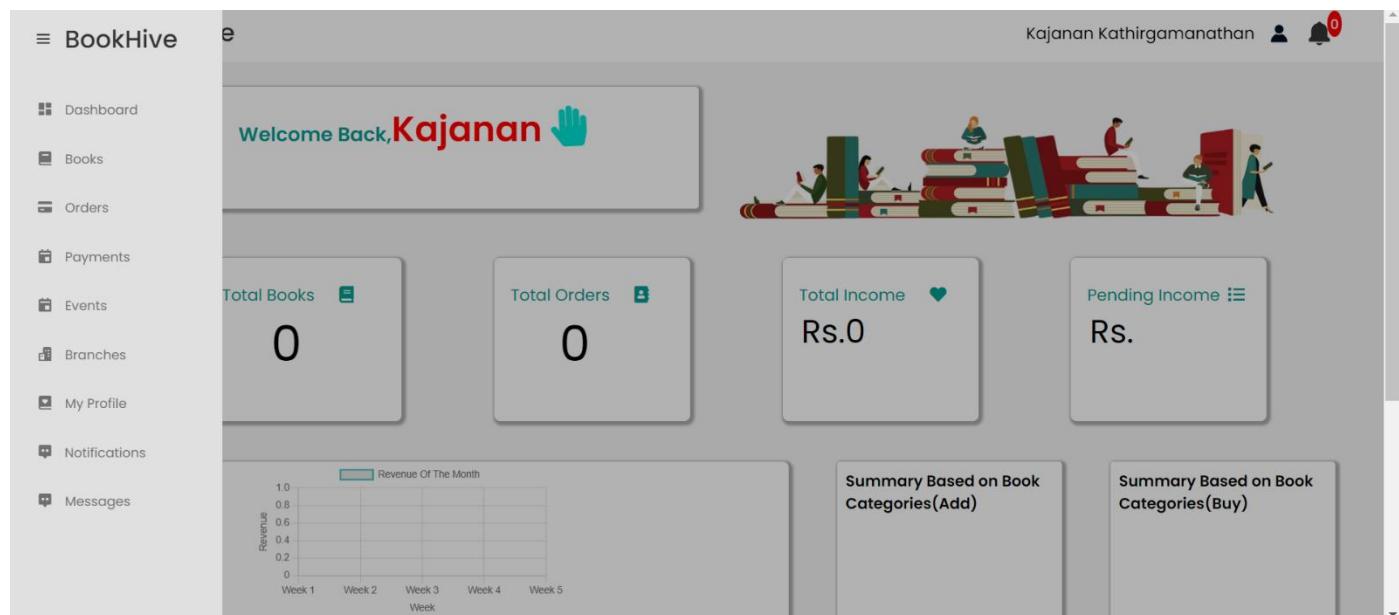


Figure 34: Publisher Dashboard

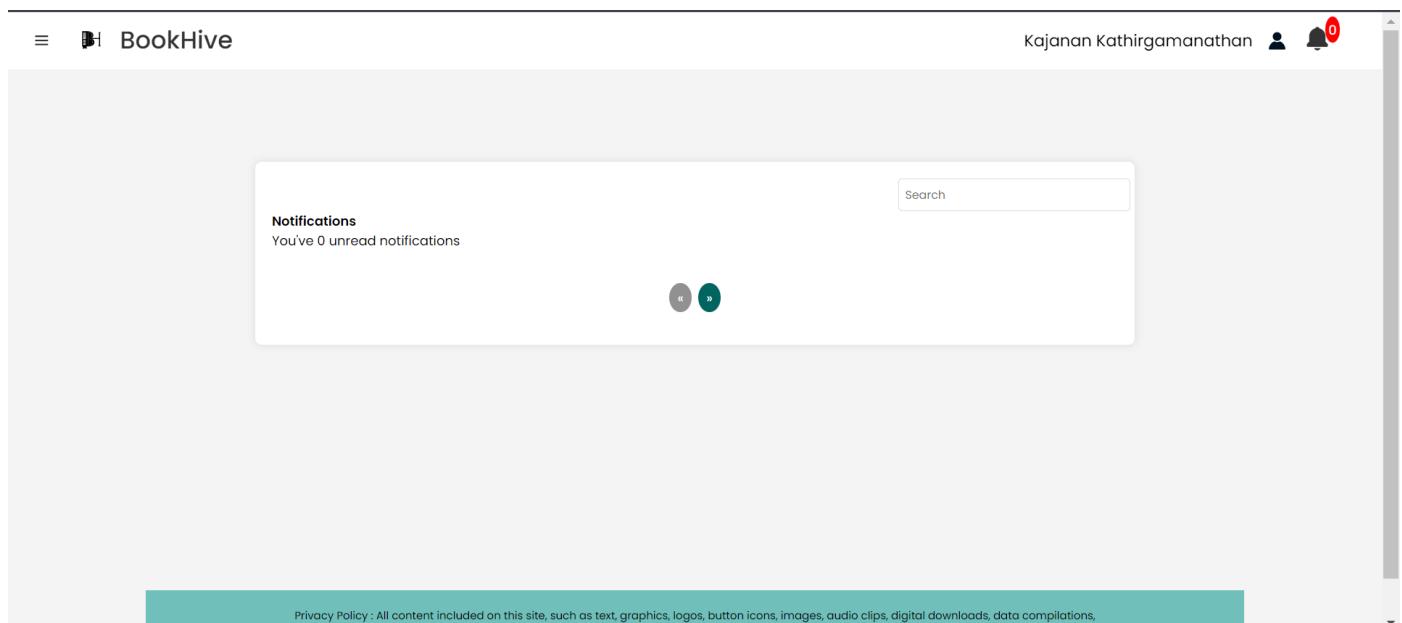


Figure 35: Publisher Notifications Page

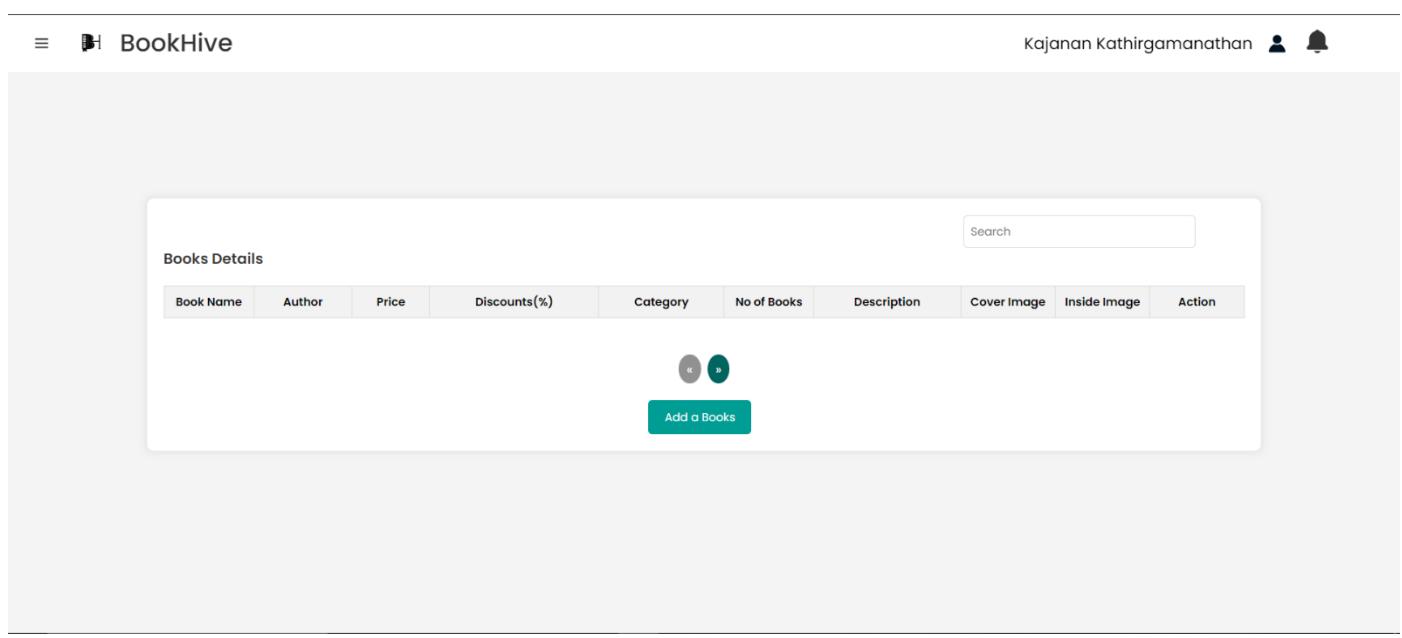


Figure 36: Publisher Books Details Page

Processing Orders    Shipped Orders    Delivered Orders    Returned Orders

[Processing Orders >>](#)

**No Orders Found**

Privacy Policy : All content included on this site, such as text, graphics, logos, button icons, images, audio clips, digital downloads, data compilations, and software, is the property of BookHive or its content suppliers and protected by Sri Lanka and international copyright laws...  
© 2024 BookHive. All rights reserved.

Figure 37: Publisher Orders Page

**EVENTS INFO >**

Payment Id	Order Id	Book Id	Book Quantity	Received Amount	Received Date	Invoice
------------	----------	---------	---------------	-----------------	---------------	---------



Privacy Policy : All content included on this site, such as text, graphics, logos, button icons, images, audio clips, digital downloads, data compilations,

Figure 38: Publisher Payment Page

## EVENTS INFO &gt;

Event ID	Event Poster	Title	Description	Location	Start Date	End Date	Event Category	Status	Action
----------	--------------	-------	-------------	----------	------------	----------	----------------	--------	--------

[Add an event](#)

Privacy Policy : All content included on this site, such as text, graphics, logos, button icons, images, audio clips, digital downloads, data compilations,

Figure 39: Publisher Events Page



Name

Company Name

Email

Contact Number

[Edit Profile](#)**Postal Details**

Name

Address

City

District

Postal Code

Figure 40: Publisher Profile Page

**Postal Details**

Name: [Redacted]  
Address: [Redacted]

City: [Redacted]  
District: [Redacted]  
Postal Code: [Redacted]

**Edit**

**Account Details**

Name: [Redacted]  
Account Number: [Redacted]

Bank Name: [Redacted]  
Branch Name: [Redacted]

**Edit**

Privacy Policy : All content included on this site, such as text, graphics, logos, button icons, images, audio clips, digital downloads, data compilations, and software, is the property of BookHive or its content suppliers and protected by Sri Lanka and International copyright laws..  
© 2024 BookHive. All rights reserved.

Figure 41: Publisher Profile Page

## Moderator

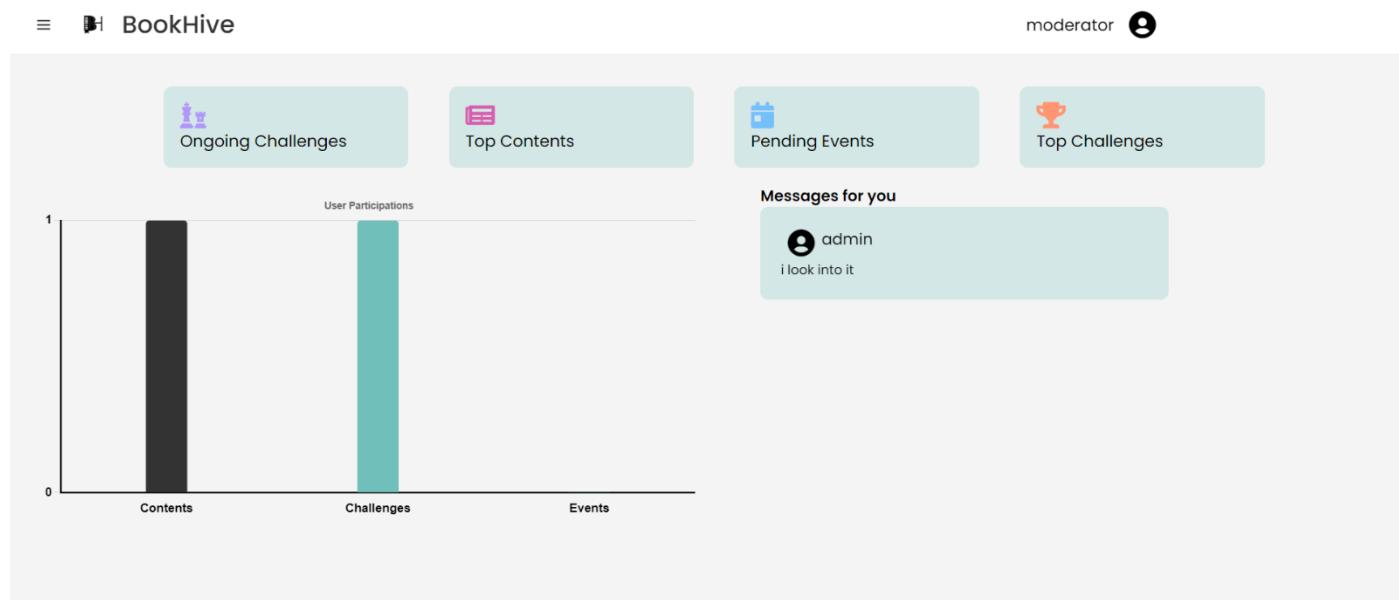


Figure 42: Moderator Dashboard

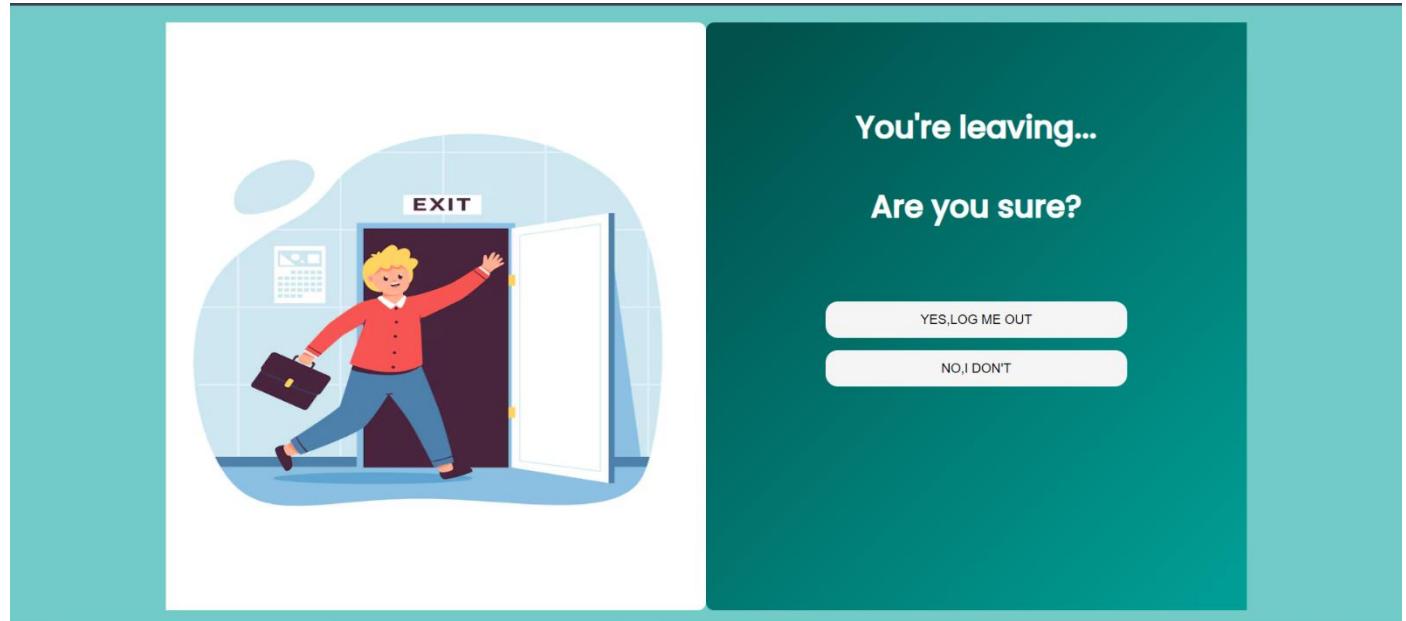


Figure 43: Logout page

## Super Admin

The dashboard has a light gray header with the BookHive logo and a user profile for 'Kamal'. Below the header, on the left, is a 'Welcome Back, Kamal' message with a green hand icon. To the right is a cartoon illustration of a man sitting at a desk in an office, surrounded by bookshelves and a computer. The main content area contains three charts:

- Number of Users**: A bar chart showing the count of users across different categories. The y-axis ranges from 0 to 12. The data is as follows:
 

User Type	Number of Users
Publishers	4
Charity organizations	2
Customers	12
Community moderators	1
Admins	2
Delivery Systems	1
- User Registration Trends**: A line graph showing the number of users registered per day. The y-axis ranges from 0 to 1.0. The data shows a single sharp peak on day 14 reaching approximately 0.95, with all other days having values near zero.
 

Day	Registered Users
1	0.00
2	0.00
3	0.00
4	0.00
5	0.00
6	0.00
7	0.00
8	0.00
9	0.00
10	0.00
11	0.00
12	0.00
13	0.00
14	0.95
15	0.00
16	0.00
17	0.00
18	0.00
19	0.00
20	0.00
21	0.00
22	0.00
23	0.00
- Number of Logins for Today**: A small chart showing the number of logins for today, with a value of 1.
- No Of Complaints**: A small chart showing the number of complaints, with a value of 0.
- User Registration Trends**: A small chart showing the user registration trends, which corresponds to the line graph above.

Figure 44: Super Admin Dashboard

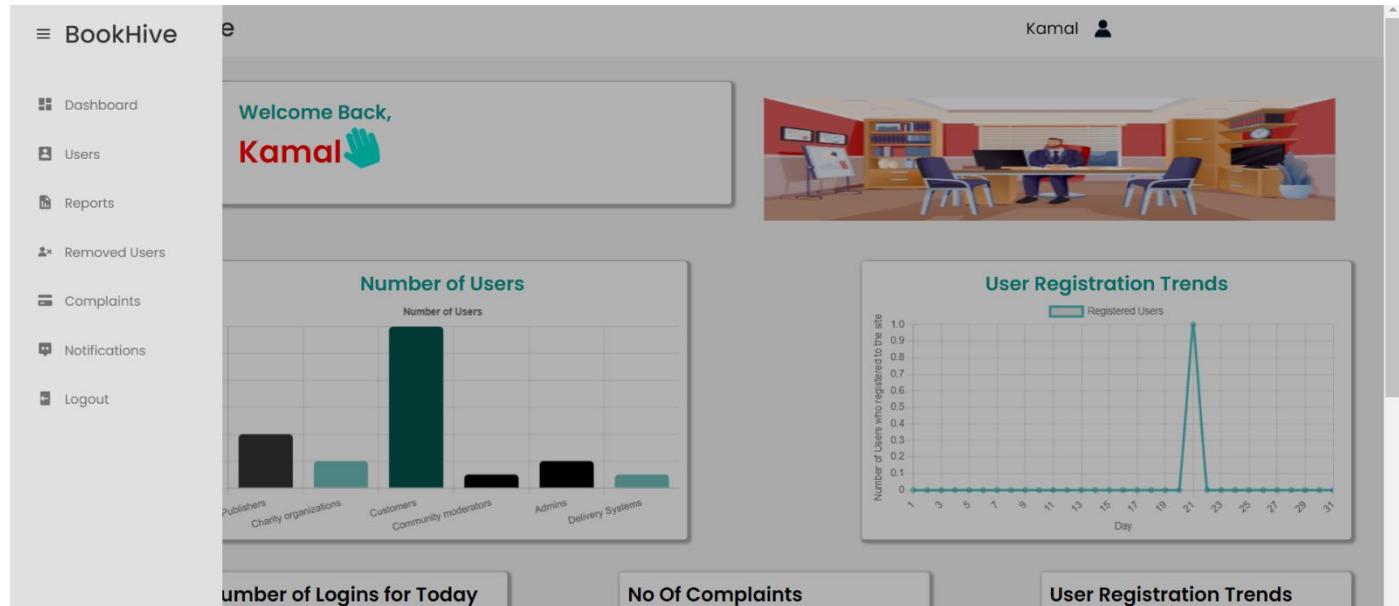


Figure 45: Super Admin Dashboard

**Admins >>**

Id	Name	Email	Status	Actions
13	admin	admin@gmail.com		
15	admin new	admin3@gmail.com	restrict	

**Add**

Figure 46: Super Admin Users Page

Customers   Publishers   Admins   Moderators   Charity Organizations   Delivery System

**Moderators >>**

Search

ID	Name	Email	Actions
1	moderator	moderator@gmail.com	   

**Add**

Figure 47: Super Admin Users Page

Customers   Publishers   Admins   Moderators   Charity Organizations   Delivery System

**Delivery Systems >>**

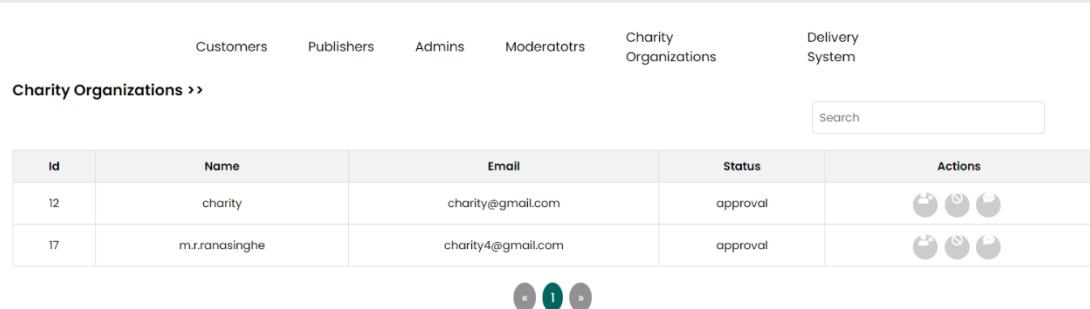
Search

ID	Name	Email	Status	Actions
12	delivery person	delivery@gmail.com		   

**Add**

Figure 48: Super Admin Users Page



The screenshot shows a list of charity organizations. The columns are labeled: Id, Name, Email, Status, and Actions. There are two entries:

Id	Name	Email	Status	Actions
12	charity	charity@gmail.com	approval	  
17	m.r.ranasinghe	charity4@gmail.com	approval	  

Pagination controls at the bottom center indicate page 1 of 1.

Figure 49: Super Admin Users Page

User Overview [Generate Report](#) 

- Line chart of last month user registration
- Number of currently registered users

Login/Logout Overview [Generate Report](#) 

- Number of times user login per day for the past month
- Total login time for each day

Click the report you want

Figure 50: Super Admin Report Generate Page

## Removed User's List &gt;&gt;

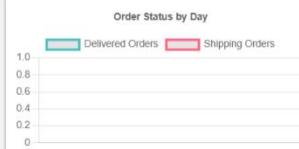
Name	Email	Removed Date	Actions
vksthanuja@gmail.com	Thanujaa Venkadakrishnasharma	2024-05-24 15:05:45	
vksthanuja@gmail.com	Thanujaa Venkadakrishnasharma	2024-05-24 15:06:59	
vksthanuja@gmail.com	Thanujaa Venkadakrishnasharma	2024-05-24 15:07:06	
vksthanuja@gmail.com	Thanujaa Venkadakrishnasharma	2024-05-24 15:07:18	

Figure 51: Super Admin User Remove Page

## Delivery Person

Welcome Back,

**delivery person** 

## Delivery Charging Table

Weight(kg)	Price per unit(Rs)	Edit
1	350.00	<input checked="" type="checkbox"/>
Additional per kilo	70.00	<input checked="" type="checkbox"/>

Figure 52: Delivery Person Page

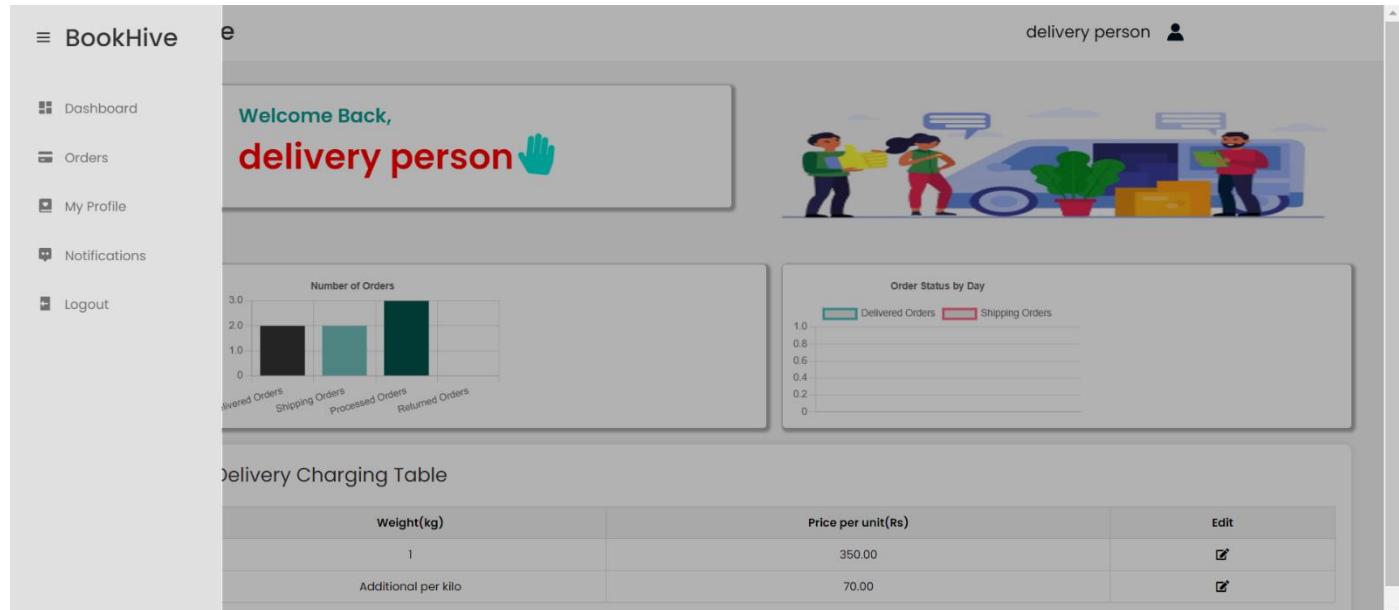


Figure 53: Delivery Person Page

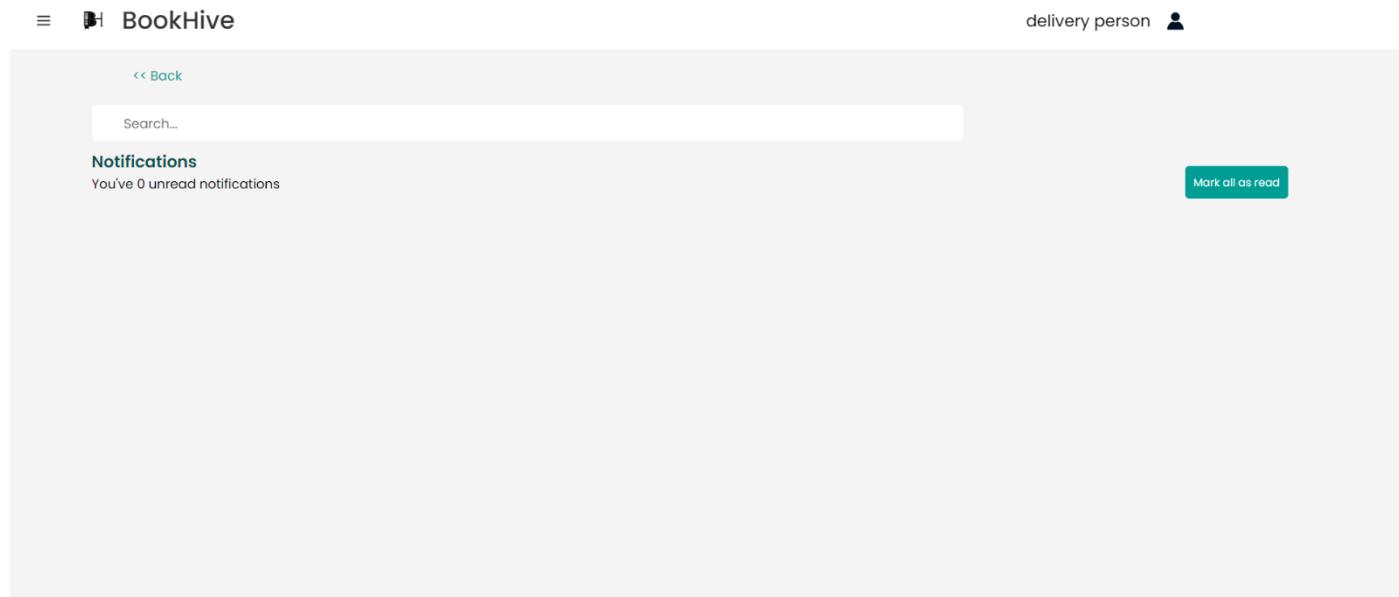


Figure 54: Delivery Person Notifications Page

Content ID	Content title	Content Summary	Content Image	Content	Action
5	Ahambakaraka	"A man never sees another in his truest for...		<a href="#">content.pdf</a>	  
8	Ahambakaraka (ඇහංකිතකාරක)	The Road Not Taken		<a href="#">content.pdf</a>	  
9	Ahambakaraka (ඇහංකිතකාරක)	Content		<a href="#">content.pdf</a>	  
10	Bookish Gift Guide	Create a gift guide featuring unique and th...		<a href="#">content.pdf</a>	  
13	Book Excerpt - "The Great Gatsby" by F. Scott...	Read an excerpt from the classic novel "The ...		<a href="#">content.pdf</a>	  
16	Book Spotlight - "Educated" by Tara Westover	Learn about the compelling memoir "Educat...		<a href="#">content.pdf</a>	  
17	"The Night Circus" by Erin Morgenstern	Discover the enchanting world of "The Night ...		<a href="#">content.pdf</a>	  
18	Literary Analysis - "Pride and Prejudice" by J...	Dive into the world of Jane Austen's "Pride a...		<a href="#">content.pdf</a>	  
19	poem	about cat poem		<a href="#">content.pdf</a>	  
20	poem	poem		<a href="#">content.pdf</a>	  

Figure 55: Moderator Page

## Ongoing Challenges

Search...

Create a challenge

Challenge title	Time Limit	Description	Delete Challenge
Literary Masterpieces Quiz	5 minutes	Test your ... <a href="#">See more..</a>	
Romance Book Quiz: Test Your Love Story Knowledge	5 minutes	Welcome to... <a href="#">See more..</a>	
Literary Legends Quiz	5 minutes	Dive into ... <a href="#">See more..</a>	

Figure 56: Ongoing Challenges

≡  BookHive moderator 

Pending Events

64	Customer	Event 1010	Start date must be e <a href="#">See more..</a>	Panadura	Book Launch
65	Publisher	Literary Evening: Exploring Sri Lankan Poetry	Join us for an encha <a href="#">See more..</a>	Lotus Hall, Colombo City Hotel, 123 Galle Road, Colombo, Sri Lanka	Literary Festival
69	Customer	Autographs & Authors	Meet your favorite a <a href="#">See more..</a>	Colombo City Library	Book Signing
71	Customer	Author Spotlight Series	Join us every Saturd <a href="#">See more..</a>	Colombo City Library	Literary Festival
72	Customer	Poetry Slam Night	Join us for an eveni <a href="#">See more..</a>	BMICH	Literary Festival
77	Customer	Bookbinding Workshop	Learn the art of boo <a href="#">See more..</a>	BMICH	Book Launch
78	Customer	Kaumadi Event 01	Kaumadi <a href="#">See more..</a>	Colombo	Book Launch
79	Customer	A Journey Through Time	Celebrate the launch <a href="#">See more..</a>	Colombo Main Library	Book Launch
80	Customer	The Art of Fiction	Meet the bestselling <a href="#">See more..</a>	BMICH	Book Signing

Figure 57: Pending Events Page

≡  BookHive moderator 

Book Reviews > Content Reviews

Kaumadi	Forget Me Not(මදේ කිකින්නක පුරාන්තය)	Lovely novel	
Hansika	The Worst Witch And The Wishing Star	One of my favourite books.	
Kaumadi	The Mother	I read this book when I was in grade 6 ,this is the first Russian novel that I have read, and amazing	

« 1 2 »

Figure 58: Content Reviews Page

The screenshot shows the 'Complains' section of the BookHive application. At the top right, there is a 'moderator' status indicator with a user icon. Below it, a filter dropdown says 'Filter data by status: Resolved'. The main area displays a table with one row of data:

Complainant name	Email	Contact Number	Complain	Additional notes	Complain Images	Status	Action	Send to super admin
Kaumadi Pahalage	kaumadi2k2@gmail.com	0774769958	I am writing to repo <a href="#">See more...</a>			Resolved	<a href="#">Respond</a>	<a href="#">Send to super admin</a>

Figure 59: Complains Page

The screenshot shows the 'Notifications' section of the BookHive application. At the top right, there is a 'delivery person' status indicator with a user icon. The main area includes a back button ('<< Back'), a search bar ('Search...'), and a 'Notifications' summary: 'You've 0 unread notifications'. A green button at the bottom right says 'Mark all as read'.

Figure 60: Notifications Page

