
# Online Food Ordering and Management System

By

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ID: 1821503

Summer 2024

Supervisor Name:

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Independent University, Bangladesh

# Attestation

Ananya Chakraborty Gourab (ID: 1821503), hereby declare that I have successfully completed my internship and the report entitled *"Online Food Ordering and Management System"*. This report has been submitted in fulfillment of the requirements for the Computer Science and Engineering Major degree at Independent University, under the guidance of Zhangir Alam, Assistant Professor at IUB. The project, *Online Food Ordering and Management System*, has been accomplished as part of my internship.

_____ _____

Supervisor Signatured Date

Ananya Chakraborty Gourab

_____

Name

# Acknowledgement

I want to thank God first and foremost for allowing me to finish my internship report on schedule. I want to express my sincere gratitude to the faculty of computer science and engineering for making internship credit a required part of the graduation requirements. It has been a rewarding and educational experience to work on business-related projects that closely match my interests.

My particular thanks go out to Mr. Zahangir Alam, an assistant professor at Independent University Bangladesh and my respected supervisor. His unwavering direction, insightful observations, and considerate counsel were essential to the accomplishment of my internship and report.

Additionally, I would like to thank Mr. S.H.M. Arafat, my technical supervisor, whose knowledge, helpful criticism, and unwavering support were crucial to the success of my internship. His guidance and the Goinnovior team's support fostered a productive workplace that enabled me to successfully navigate and conquer a number of obstacles.

I am also incredibly grateful for my parents' and my family's constant support, which has been my rock during this journey.

# Letter of Transmittal

**Zahangir Alam, Assistant Professor,**
School of Engineering, Technology, and Sciences
Independent University, Bangladesh
Department of Computer Science and Engineering

**Subject: Submission of Internship Report: A Requirement for Graduation**

Greetings Sir,

I hope this message finds you well and in good spirits. This letter serves as my official submission of my internship report, a key requirement for completing the Computer Science and Engineering Bachelor's program. Working under your active guidance has been a rewarding experience, and I am truly grateful for your support throughout this journey.

The report is centered on my internship experience at *Dream71 Bangladesh Ltd.*, where I had the opportunity to contribute to the company's growth while gaining crucial business insights. I was fortunate to work at Dream71 for three months under the supervision of Mr. S.H.M. Arafat, the Technical Project Manager. The combination of academic knowledge and practical, real-world experience provided me with significant personal and professional development.

This internship not only offered educational opportunities but also served as a valuable networking platform within the corporate environment. I utilized my knowledge and skills gained from this experience to ensure my report is thorough and informative. All relevant areas have been meticulously addressed in accordance with the guidelines, and I sincerely hope the report meets the required standards.

I would be honored if you could accept my report and provide your insightful feedback. It would be a great privilege if you find that this report presents a unique and valuable perspective on the subject matter.

Thank you again for providing me the opportunity to complete my internship at Dream71 Bangladesh Ltd. I eagerly look forward to your comments on the attached report. If you have any questions or require further information, please do not hesitate to contact me at **aborty174@gmail.com** or **01700-675328**.

Sincerely,
*Ananya Chakraborty Gourab*

*Student ID: 1821503*

Department of Computer Science and Engineering Independent University, Bangladesh (IUB)

# Evaluation Committee

Supervision Panel

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Panel Members

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Industry Coordinator of the Department

# Abstract

The Online Food Ordering System described in this study was created to meet a particular market demand by giving small eateries an affordable way to enable online ordering. Through an easy-to-use graphical interface, the system enables restaurant employees to manage crucial online material, such the menu, without the need for costly, custom-built software.

The website, which serves as the main customer interface, is dynamically created using real-time data from the system. Because of this, any modifications made by the restaurant staff—like updating the menu—are instantly reflected on the website. The ordering procedure is streamlined for registered customers, who can quickly browse the menu, choose items, and specify delivery options with a few clicks. Incoming orders are shown in a simple, well-structured manner on the restaurant side, allowing for quick processing.

The purpose of this report is to give a thorough description of the system's features and future development possibilities, as well as an in-depth explanation of its design and implementation. To guarantee a thorough understanding, user manuals and troubleshooting guides have also been included for each of the system's three components.

# Contents

# List of Figures

# List of Tables

# Chapter 1

# Introductions of Project

An internship is a worthwhile, brief learning opportunity that businesses provide to students who are about to graduate. It gives interns the opportunity to become experts in their field of choice and acquire practical knowledge of how workplaces operate.

Before entering the workforce, internships offer students a last chance to hone their abilities and become acquainted with the working world by giving them practical experience. Students gain confidence from this experience and acquire the useful skills need to be successful in their future employment. Additionally, it acts as a link between the competitive nature of the real-world job market and academic learning.

Students improve their skills and acquire the necessary experience for future career through internships. I had the chance to intern at Dream71 Bangladesh Ltd., which was a really inspiring and enriching experience, despite the hard atmosphere of a large software firm.

## 1.1 Overview/Background of the Work

The Online Food Ordering System is an easy-to-use program made to serve both restaurant operators and patrons. Effectively handling online orders while keeping costs down is essential for small restaurants to succeed both financially and operationally. This method is designed to increase customer comfort, expedite the ordering process, and boost restaurant operations' overall effectiveness.
Restaurants can easily handle their menu, orders, and client relations thanks to the Online Food Ordering System. It enables real-time updates, guaranteeing that any modifications to the menu or special offers are instantly shown on the website that customers view. The program optimizes revenue management, lowers manual mistake rates, and boosts overall efficiency by automating the order processing and delivery system. Customer service, order management, and income generating may suffer if such a system is not put in place.

## 1.2 Problem Statement

Taking orders, scheduling delivery, and interacting with customers are still done by hand in a lot of Bangladeshi restaurants. Errors, inefficiencies, and lost chances to enhance customer service may result from this. The Online Food Ordering System was created in order to solve these issues.

A complete software program created to automate several parts of restaurant operations is the Online Food Ordering System. It eliminates the need for manual involvement by streamlining processes like order management, menu updating, and payment processing. The technology contributes to seamless order processing, better customer management, and increased income creation by increasing efficiency and reducing errors. Without such a system, restaurants could find it difficult to meet consumer requests, which could have a detrimental effect on both customer happiness and business expansion.

## 1.3 Objectives

The Online Food Ordering System's core components include tracking customer orders, controlling delivery statuses, and keeping an eye on kitchen activities. With the help of this system, restaurant owners and employees can effectively handle customer orders, monitor order status, and guarantee smooth communication between the delivery crew, kitchen, and patrons. In order to ensure that patron needs are swiftly satisfied, the main objective is to give restaurant employees and administrators the ability to handle orders, update menus, and track the real-time progress of deliveries.

The technology also aids in streamlining operations by optimizing resources including ingredients, kitchenware, and delivery staff. To guarantee the prompt production and delivery of food, which eventually improves customer satisfaction, task management, order tracking, and staff coordination are crucial.

The general objective of the system is to provide a productive, real-time meal ordering and management experience that keeps customers engaged and increases production.

# 1.4 Scopes and Opportunity

Restaurants can handle customer orders in real time with ease and effectiveness thanks to the Online Food Ordering System. From keeping track of consumer preferences to tracking order status and delivery logistics, it streamlines the entire ordering process. To increase service efficiency, the technology makes sure that restaurant employees can track sales, handle menu revisions, and analyze client data with ease.

The solution increases the restaurant's operational scalability by offering real-time order handling. Restaurants can improve service, boost sales, and maintain seamless daily operations by meticulously recording and analyzing all orders, customer interactions, and performance indicators.

# Chapter 2

# Literature Review

The Online Food Ordering System is a prime example of how web-based solutions are becoming increasingly significant in revolutionizing restaurant operations and consumer order management. The system improves customer happiness and restaurant productivity by including features like data-driven customer management, dynamic menu revisions, and real-time order tracking. As it transforms how restaurants function in a world that is becoming more and more digital, this system, like other web-based solutions, is in line with contemporary approaches, such as database management, system analysis, and software engineering concepts.

Examining earlier research in this field usually concentrates on the approaches taken in comparable systems and the main results they provide.

## 2.1 Relationship with Undergraduate Studies

The foundational knowledge and skills I acquired during my college studies have greatly influenced my talents, especially in the following areas:

I learnt HTML, CSS, Node.js for back-end programming, NoSQL (MongoDB) for database administration, and JavaScript for front-end development in this course on web applications and the Internet. Working on projects that make use of all these technologies has improved my abilities. Using these abilities in real-world situations was essential to my project success.

b. Database Management System: During this course, I became proficient in front-end development using HTML, CSS, and JavaScript, and database and back-end programming using Node.js and MongoDB. Through practical tasks, I improved my abilities and learned how to use these tools efficiently. In addition, I gained knowledge of the System Development Life Cycle, requirement analysis, rich pictures, and entity relationship diagrams. I learned a lot about project management from these tried-and-true planning and strategy techniques.

c. System Design and Software Engineering: I gained a deeper grasp of project design and execution by taking this course, which taught me about the System Development Life Cycle and software project development processes.

## 2.2 Related works

JavaScript, CSS, and basic HTML are used to create most of the sites. Because WordPress eliminates the need for extensive code, it frequently speeds up development. However, we developed the software for this project using more sophisticated frameworks. It can be difficult to find a website that directly uses web technology for our particular project. However, comparable platforms and applications with similar functionality are available in the industry. Among them are:

Office 365 Suite by Microsoft, slack.

# Chapter 3

# Project Management & Financing

## 3.1 Work Breakdown Structure

WBS is a hierarchical framework that shows how a project is divided into smaller parts. We have created a work breakdown structure (WBS) for our project in order to coordinate our efforts. WBS ensures that it does not exclude any crucial deliverables and provides a visual representation of all the scopes, risks, communication channels, responsibilities, and expenses. It is the perfect tool for team communication and brainstorming. We have applied the top-down method in our WBS.

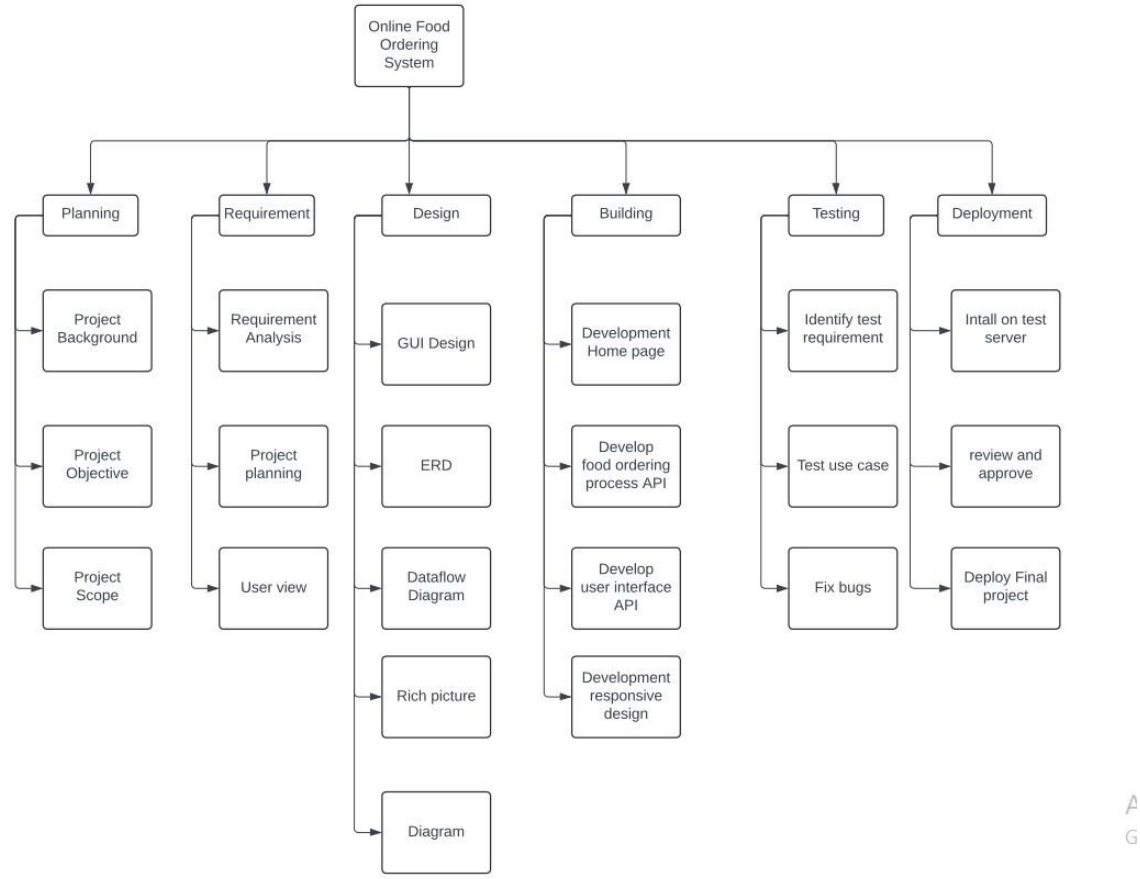


Figure 3. 1: Work Breakdown Structure

## 3.2 Process/Activity wise Resource & Time Allocation

Time was allotted for each of the sections I listed in my Work Breakdown Structure in order to ensure that the project was finished on schedule. The work's time allocation is displayed in the table below.Time was allotted for each of the sections I listed in my Work Breakdown Structure in order to ensure that the project was finished on schedule. The work's time allocation is displayed in the table below.

| Task | Days | Days to Complete |
|---|---|---|
| Initialization | 9 | 13 |
| Requirement Analysis | 10 | 9 |
| Planning | 7 | 9 |
| Design | 10 | 14 |
| Building | 34 | 34 |
| Bug fixing | 5 | 9 |
| Testing | 5 | 5 |
| Deployment | 7 | 7 |
| Total | 87 | 100 |

Table 3.2: Time Distribution for Online Food Ordering and Management System

# 3.3 Gantt flow Chart

All of the tasks required to properly finish the project were planned and scheduled using the Gantt chart.

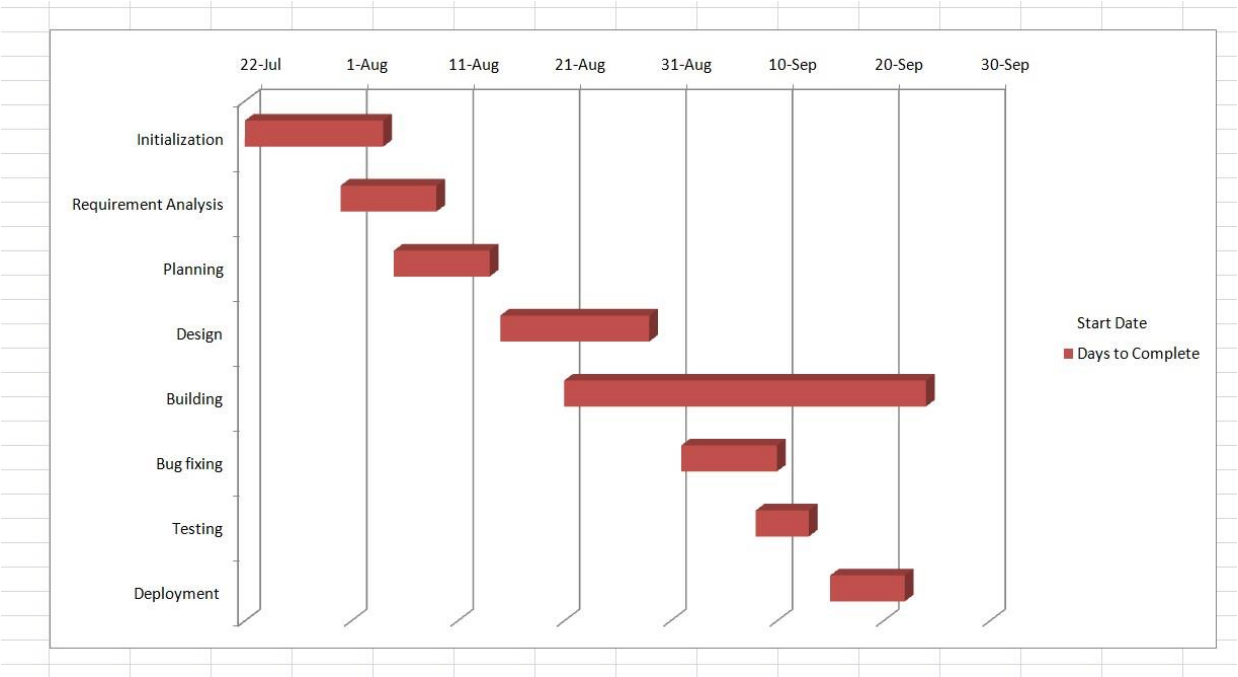


Figure 3.3: Gantt Chart for Online Food Ordering and Management System

## 3.4 Estimated Costing

The features that the customer requests will affect the cost and funding for the online food ordering system. This estimate mostly concentrates on aspects that are pertinent to the restaurant industry, like the website's size, desired functionality, and the kind of web server needed. Search engine optimization, social media integration, homepage sliders, pre-made themes, logo creation, and other website development expenditures are all included. The total cost will also include any domain and hosting expenses paid during the first year following deployment.

| Features | Costs |
|---|---|
| Electricity bill | 4000 |
| Internet Bill | 3000 |
| Server | 1500 |
| Computer(Desktop) | 60000 |

Table 3.4: Estimated Cost for Food Ordering and Management System

# Chapter 4

# Methodology

Study Methodologies: A hybrid method will be used throughout the Online Food Ordering System project's study design. To gain a deeper understanding of the difficulties encountered, the needs for system design, and the existing procedures for overseeing restaurant operations, order processing, and customer interactions, surveys, interviews, and case studies will be carried out.

Surveys sent to restaurant owners, managers, cooks, and delivery staff will be used to collect primary data. Furthermore, case studies of prosperous food delivery businesses will be examined, and industry professionals' interviews will offer insightful information about creative strategies for handling online orders and client pleasure.

Understanding trends and patterns in order management and customer service will be largely dependent on data analysis. The gathered data will be assessed using statistical and graphical methods, and important information will be extracted from case studies and interviews with the use of theme analysis.

System Development: An online food ordering system prototype will be created based on the results. Real-time order monitoring, intuitive user interfaces for patrons and employees, and automated reporting capabilities to optimize restaurant operations are all features of the system.

Assessment: A comprehensive review of the system will be conducted and input from significant end users, including patrons and employees of restaurants, will be gathered. The system's performance, usability, and overall effect on expediting the online food ordering process will all be evaluated using the input provided.

Suggestions: Following the project assessment, suggestions for putting the online food ordering system into place will be given. Any difficulties that arose during development will be examined, and any enhancements to the system will be proposed in order to increase its efficacy.

# Chapter 5

# Body of the Project

## 5.1 Work Description

Users may easily find and order foods from nearby restaurants with the help of the online food ordering System, a comprehensive digital platform. The system, which was created to improve user experience, enables restaurants to sign up and oversee a number of operational activities, such as menu changes, special offers, and customer relations. For easy order fulfillment, users can add several delivery addresses to their customized profiles. In order to ensure effective service delivery, the administrative team has complete access to monitor and oversee all restaurant operations. The technology offers assistance from the operating team to efficiently manage consumer needs in situations where restaurants are unable to fulfill orders. Users can receive customized notifications from administrators alerting them to updates or special offers. Furthermore, the platform has strong reporting features that let users create and download Different reports in PDF or Excel formats. If a printer is attached, these reports may be printed out right away. Clients can request more features from this highly configurable system, which allows it to be tailored to certain business requirements. I helped throughout my internship by creating important features including user profiles, the management panel for managing users and restaurants, and fixing important problems like those that affected Google Sign-up and speedy search.

Table 5.1: Six Element Analysis of Food Ordering Website and Management System

## 5.2 System Analysis

### 5.2.1 Six Element Analysis

| | Human | Non-computing hardware | Computing hardware | Software | Database | Communication And Networking |
|---|---|---|---|---|---|---|
| Login | Users enter username & password | N/A | Computer | Web Browser | MongoDB | WAN/LAN |
| Visit website | All Users | N/A | Computer | Web Browser | MongoDB | WAN/LAN |

| | | | | | | |
|---|---|---|---|---|---|---|
| Order food | Users fill up respective Order forms | N/A | Computer | Web Browser | MongoDB | WAN/LAN |
| Admin | Individuals with access | N/A | Computer | Web browser | MongoDB | WAN/LAN |
| Manage Order | Admin | N/A | Computer | Web Browser | MongoDB | WAN/LAN |
| Payment | The user navigates to the register procedure and entryway | N/A | Computer | Web Browser | MongoDB | WAN/LAN |

Table 5.1: Six Element Analysis of Food Ordering and Management System

## 5.2.2 Feasibility Analysis

An important conclusion from the initial study of the Online Food Ordering method is that the suggested method is workable. A feasibility study will be carried out to ascertain the most effective strategy for meeting the system's performance requirements in order to further evaluate this. This study is essential for assessing the project's feasibility early on so that well-informed decisions can be made about its advancement. Determining if the system will offer significant advantages to the organization requires extensive exploratory investigation. Early in the defining phase, it is possible to save major time and resource commitments and safeguard against damage to one's reputation by identifying any possible defects or restrictions in the system. Three main categories are included in the feasibility study: Technical Viability,
which evaluates how well the new system will work within the current operational framework; Operational Feasibility, which determines how well the technology and resources available are adequate; and Economic Feasibility, which examines the project's financial ramifications, including development costs and anticipated return on investment. Stakeholders can guarantee that the Online Food Ordering System will be efficient and advantageous for the company by carefully examining these factors.

Technical Feasibility: "Technical feasibility" includes both the software and hardware requirements that are required for a project. It is crucial to determine whether the suggested equipment and necessary technology can efficiently handle and store the data used in the project in order to determine its viability. This study aids in determining whether the technology and

resources required for a project's successful development are available. The feasibility study also looks at the development team's technical skills and talents, evaluates if current technology can be used, and looks at how simple it is to maintain and customize the chosen technology. Technical viability is taken into consideration when designing the project, making sure that all elements complement the skills and resources available to enable its execution.

Operational Feasibility: The product offers a great user experience and good customer satisfaction ratings, making it operationally feasible. The user interface is simple to use and intuitive. As long as they have a steady internet connection, users can easily visit the website on PCs and mobile devices. Users may rapidly search for restaurants and order their favorite food products by creating an easy-to-use profile. The suggested system performs admirably and continues to do so for the duration of its use.

Economic Feasibility: The financial ramifications for the company buying the product are the subject of economic feasibility. The financial advantages of the product must equal or exceed the expenses incurred in its creation and deployment in order for it to be deemed viable. We can ascertain whether the project can be developed within a budget that benefits all parties concerned by carefully examining the requirements. Because it benefits both the company and the end consumers, the product we are creating is financially viable.

## 5.2.3 Problem Solution Analysis

A number of difficulties surfaced during the project's development, but they were all successfully handled. Among the main problems encountered are:

Changing Client Requirements: The frequent modifications to the client's requirements presented a major issue throughout the project. Clients would frequently suggest different methods for putting features into use, which made the development process more difficult. Knowledge of Previous Codebase: One of the biggest obstacles in fixing errors comprehended the coding styles employed by the prior coder. Deciphering the current code proved to be time-consuming and complicated, which made it difficult to identify and address problems efficiently.

Reaching Consensus: There was a good chance that the team would not agree on how to implement the new features. Significant difficulties may result from starting a project with varying viewpoints within the organization. Establishing a common understanding among all team members is therefore essential to success.

# 5.3 System Design

## 5.3.1 Rich Picture

An illustration created by examining, identifying, and summarizing a situation is called a Rich Picture. A rich picture, which combines text boxes, icons, symbols, and images, promotes dialogue and creates a common understanding of a problem.

Three different user kinds can be seen in the rich image below: website admin, restaurant admin, and general user. The Website, Database, and Report are three other entities. These components show the fundamental process of a number of important tasks completed through the website, including placing food orders, overseeing eateries, and managing users, processing orders, and producing reports.

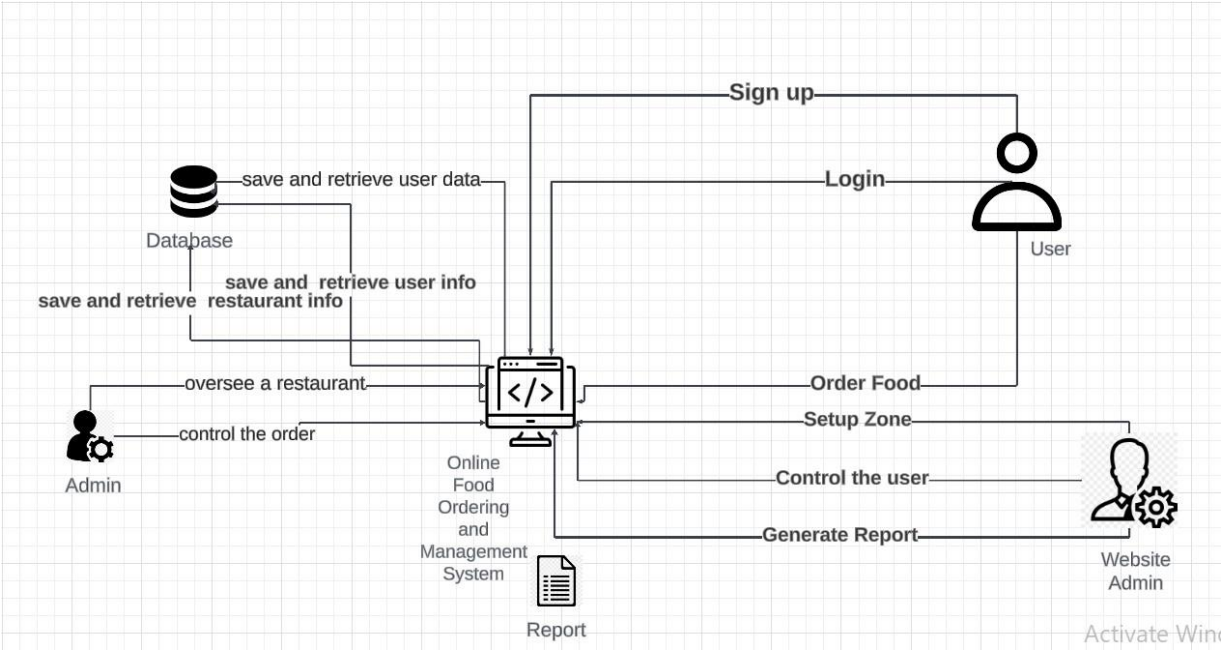


Figure 5.2: Rich picture for Online Food Ordering and Management System

## 5.3.2 UML Diagram

## Activity Diagram (Order Food):

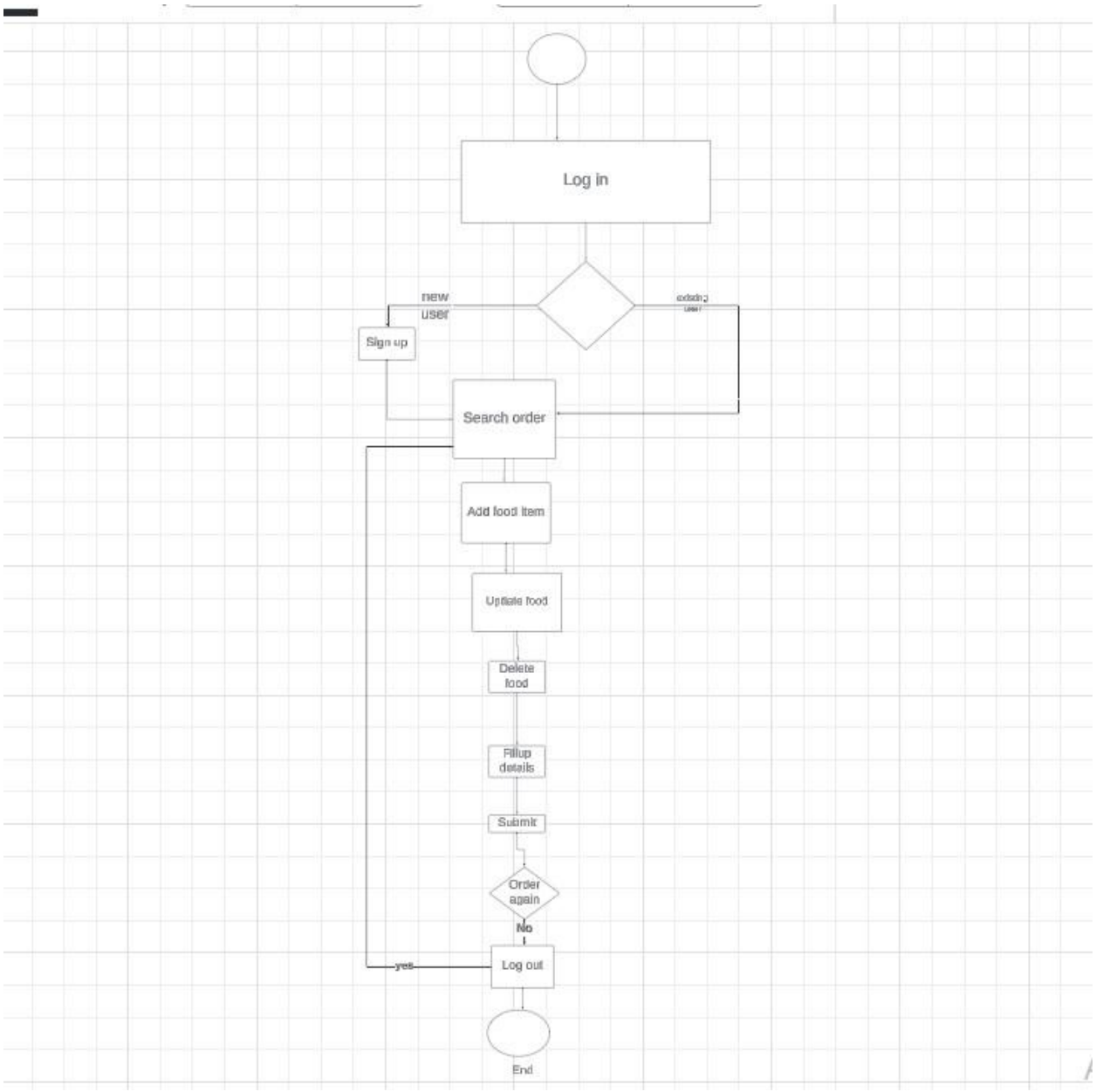


Figure 5.3: Activity Diagram for Admin

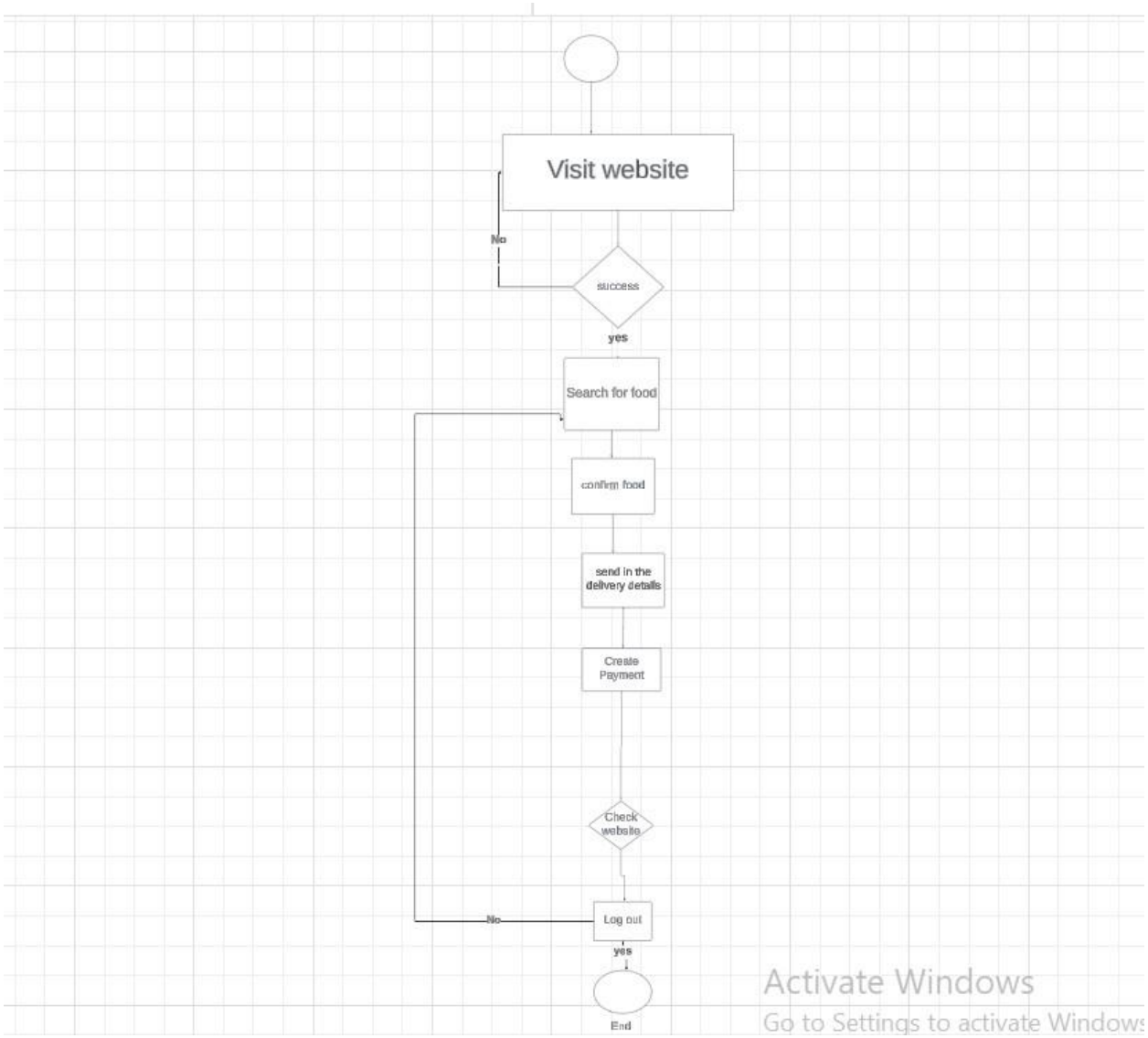


Figure 5.4: Activity Diagram for User

A Use Case Diagram for this system is shown below:

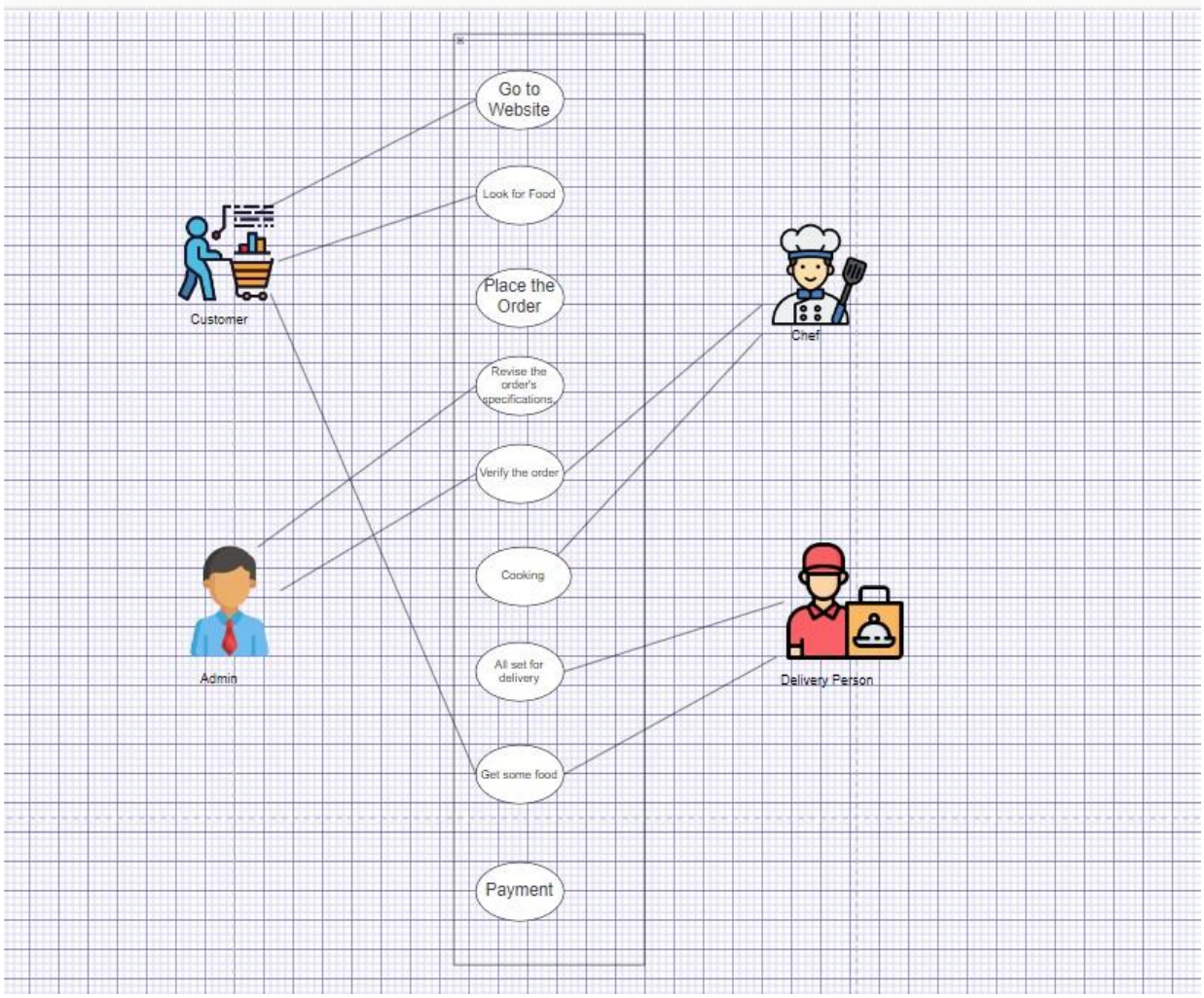


Figure 5.5: Use Case Diagram for this System

# Data Flow Diagram

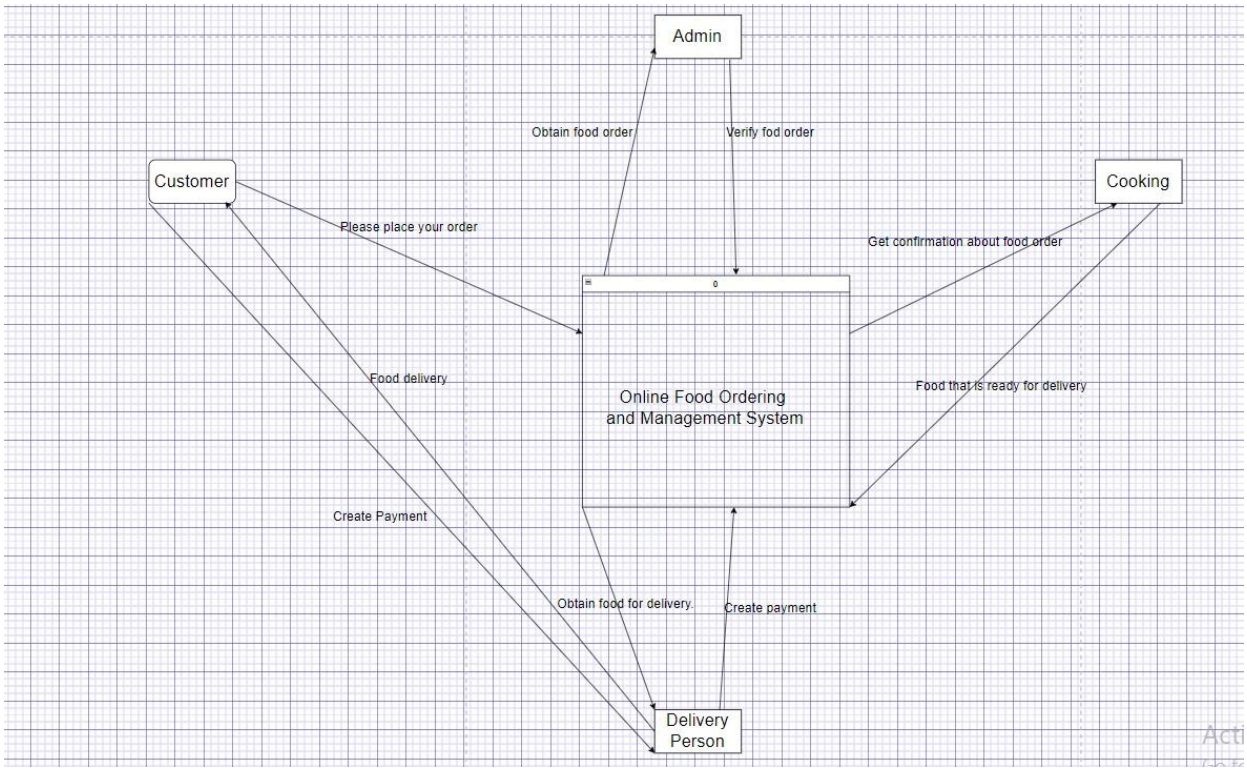


Figure 5.6:Data Flow Diagram

## 5.3.3 Functional and Non-Functional Requirements

### Functional Requirement:

1. The mobile number that users enter during the sign-up procedure is validated by the authentication system. To successfully register in the system, users need to finish this verification.
2. A one-time password (OTP) is sent to the user's mobile number for verification. Users can access their accounts after the OTP has been validated.
3. If users are unable to recall their login information, they can use the "Forgot Password" tool to reset their passwords.
4. To enable order delivery to numerous places, users can store multiple addresses in their accounts.
5. All of the available coupons from the chosen restaurant are displayed when using the "Have a Promo Code" feature during the checkout process.
6. Direct access to the administration panel allows restaurant administrators to design and oversee their own coupons and promotions.
7. All delivery riders connected to the platform can be monitored and controlled by website administrators.
8. Within the system, regular user accounts can be effectively managed by website administrators.
9. All registered restaurants on the platform can be managed by website administrators.
10. Zones can be defined by website administrators, who can also specify which restaurants are allowed to deliver to each zone.
11. Delivery fees that are unique to each zonal area can be set by website operators.
12. When necessary, website managers can target particular users or send notifications to everyone.
13. Using a variety of parameters, including order type, customer, rider, restaurant, and date, website admins can create and download customized reports. You can export these reports in Excel or PDF format.
14. To provide proper control and security within the system, administrator accounts can be made with particular access limitations.

### Non-Functional Requirement:

Maintenance: A year of free maintenance services will be provided to the client after the project is finished. Any bugs or faults with the website will be fixed right away during this time. For an extra period of time, the client has the option to purchase extended maintenance services if they so choose. Additionally, free basic maintenance training will be given to the client's technical staff if they have one.

Accessibility: Computers, laptops, tablets, and smartphones can all use the system as long as they have a web browser and a steady internet connection. This guarantees that users can access the system with ease.

Scalability: The system's strong architecture allows it to be very flexible and expand to meet the needs of more users and new features as they become available.

Reliability: Every piece of information added to the website will be instantly backed up, guaranteeing uninterrupted system operation. This proactive approach to data handling improves the platform's overall dependability.

# 5.4 Implementation

## 5.4.1 Home Page

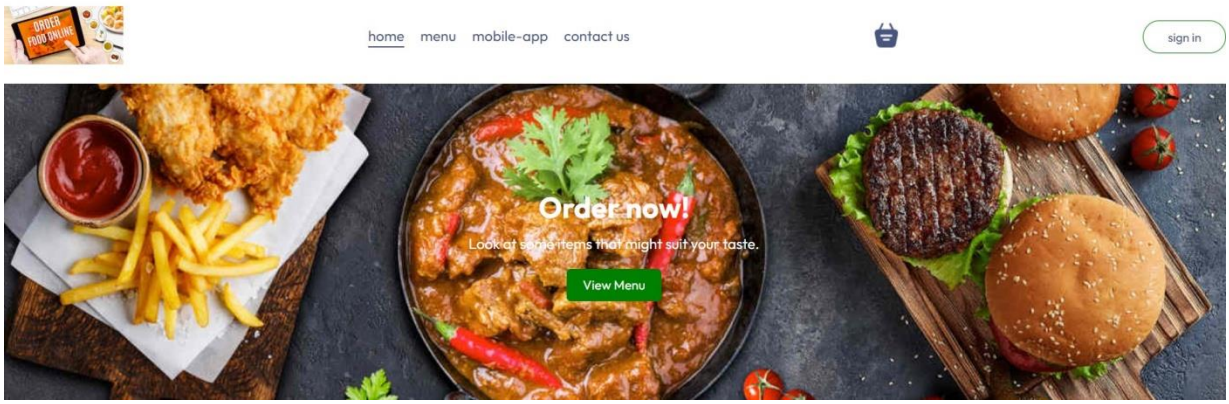


Figure 5.7: Home page for Online Food Ordering System

## 5.4.2 Food Item Menu Page

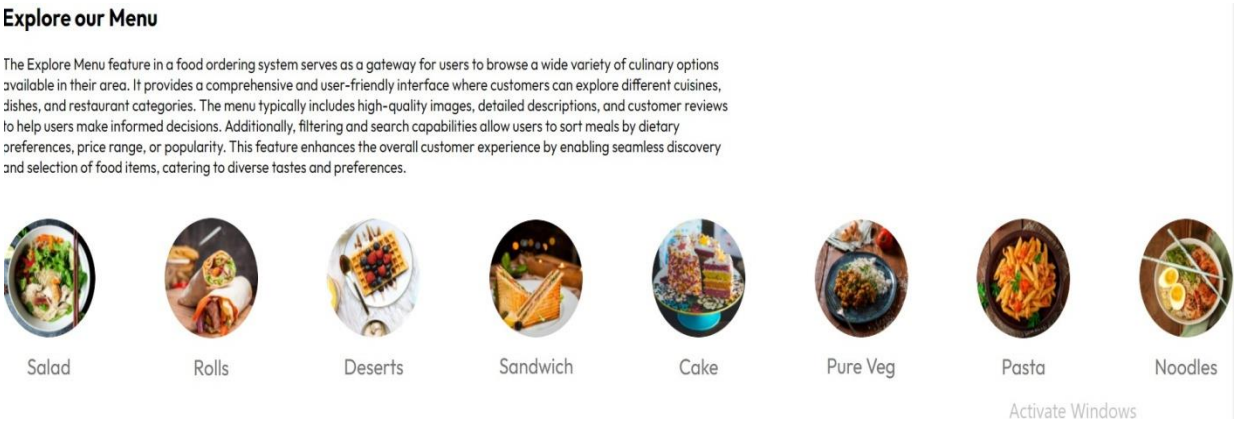


Figure 5.8: Food Item Menu

## 5.4.3 Food Item

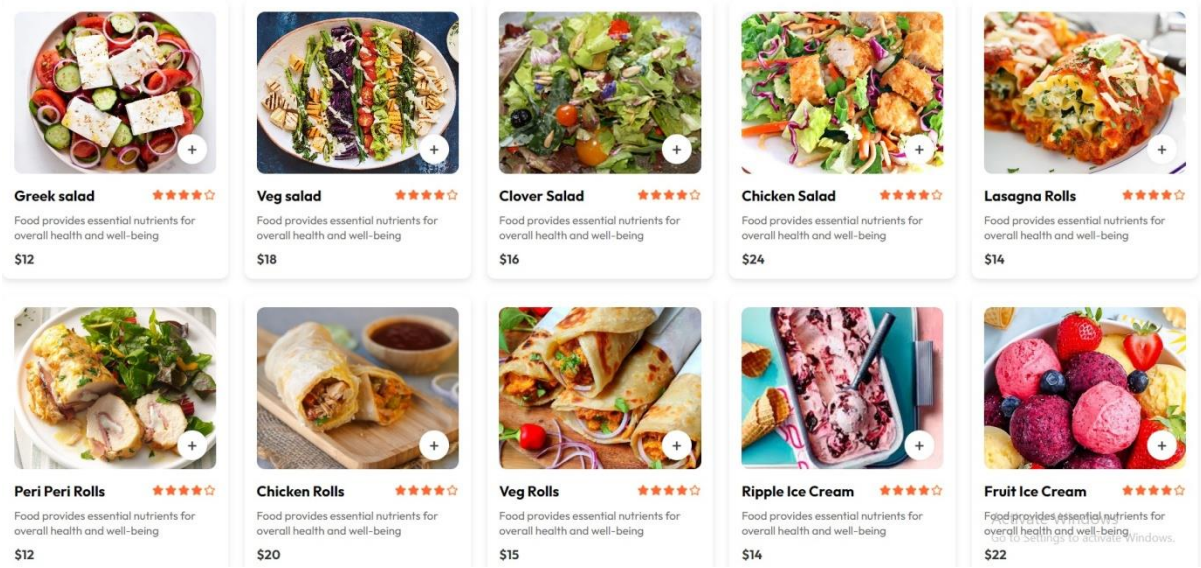


Figure 5.9: Food Item

## 5.4.4 Cart Page

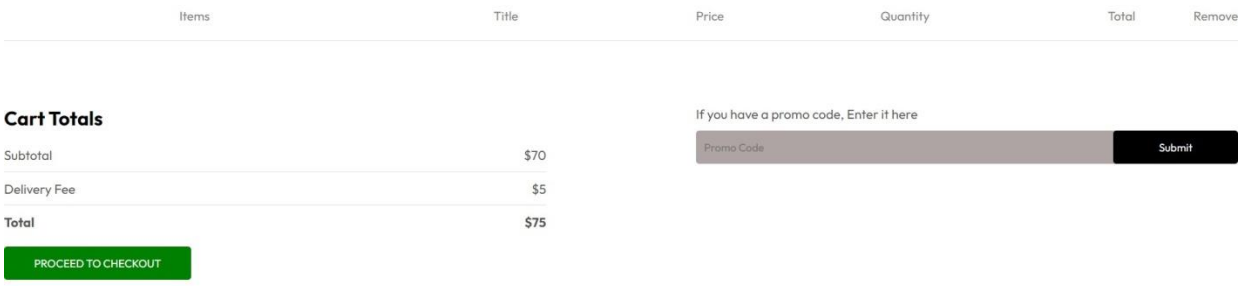


Figure 5.10: Cart page for Online Food Ordering System

## 5.4.5 Food Delivery Information

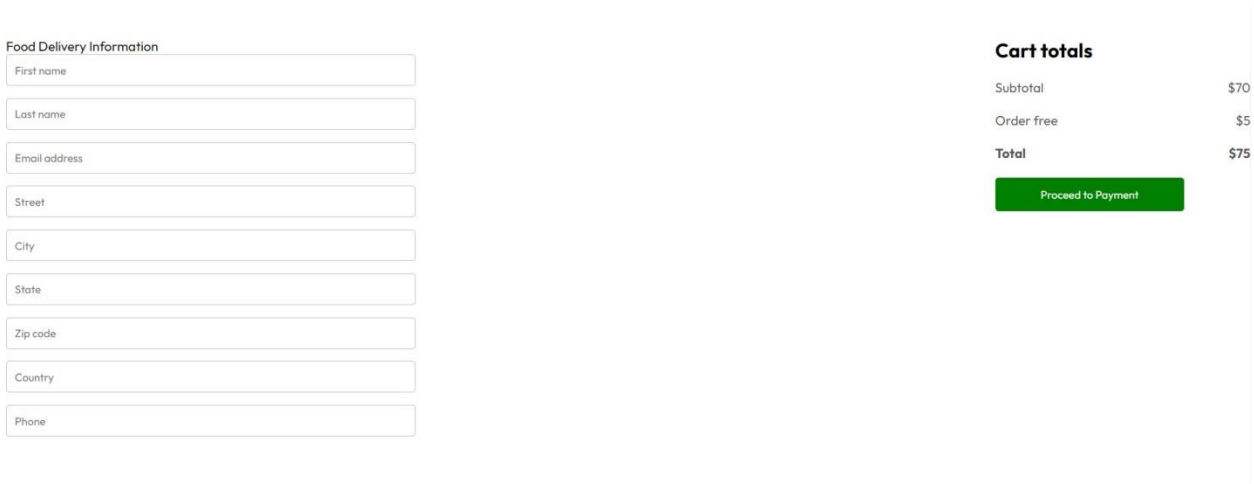


Figure 5.11: Food Delivery Information

## 5.4.6 Input

User signup page

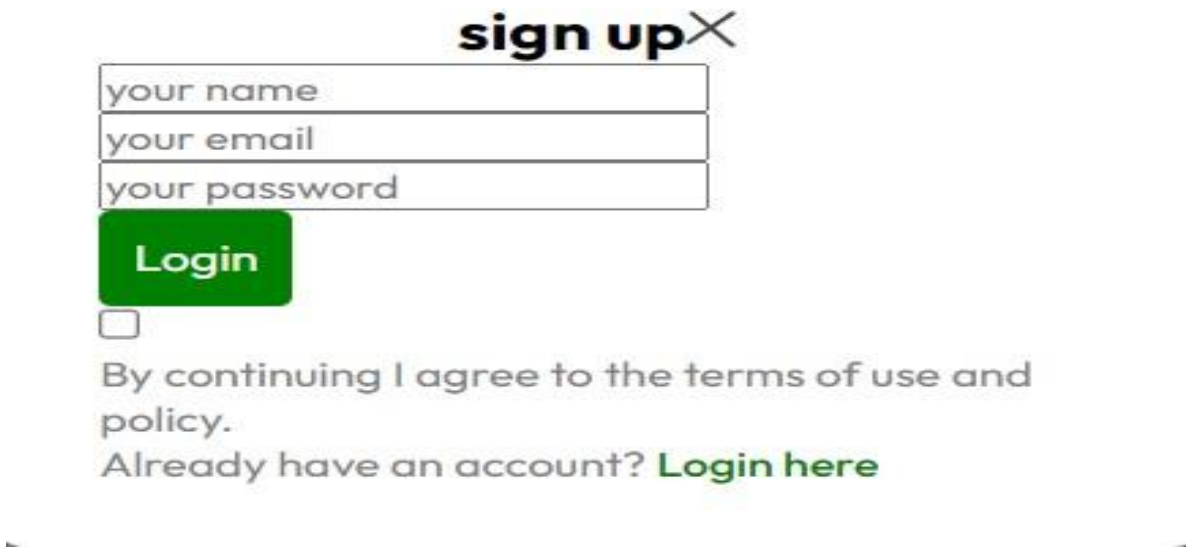


Figure 5.12: user-sign-up page

5.4.7 User log-in page:


Figure 5.13: user login page

5.4.8 Admin Dashboard

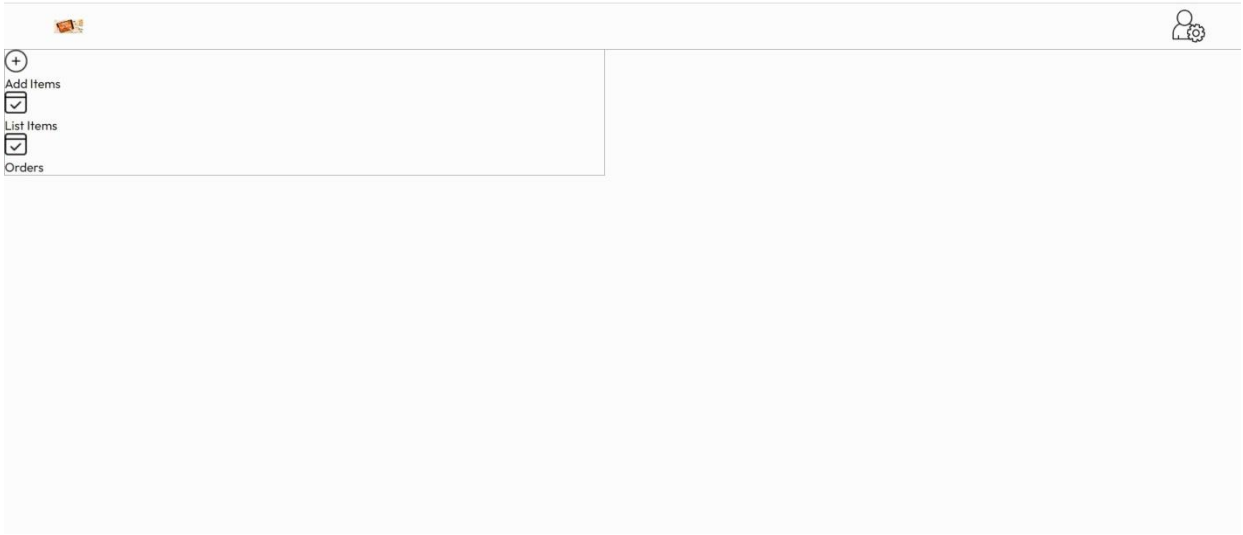


Figure 5.14: Admin DashBoard

## 5.4.9 Add Food

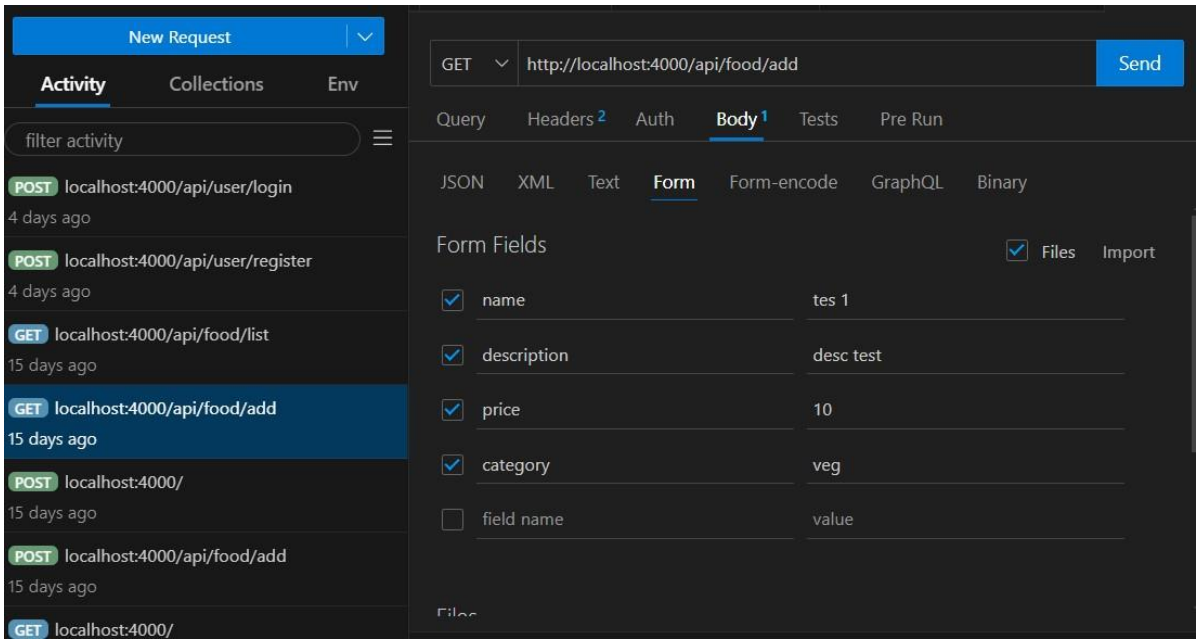


Figure 5.15: Add Food

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## 5.5 System Architecture Design

System design in the context of web development refers to creating a blueprint using the provided standards. It explains the different parts of a system, including its architecture, interfaces, modules, and data. The design process looks for, develops, and designs solutions that meet the specific objectives and requirements of the project in order to ensure the online system operates successfully and efficiently. This stage is crucial to turning the project's intangible ideas into a practical and functional framework

# Chapter 6

# Results & Analysis

The development strategy for the Online Food Ordering and Management System became evident during our conversations with important stakeholders. We were able to fully identify and specify the main tasks that the system must perform thanks to these discussions. We discussed in these conversations the key elements that consumers look for in a food ordering platform, including safe payment methods, real-time tracking, order personalization, and simple navigation.

Since these basic user demands form the basis of the requirements collecting process, it is imperative that they be addressed. Ignoring these user viewpoints may result in problems down the road and possible flaws in the system, like operational inefficiencies or usability problems.

We anticipate adding more features that will improve the user experience as we continue to build the system. Due to the project's dynamic nature, the system will need constant improvement. To make sure the platform is reliable and responsive to user demands; more test cases will be added when new features are implemented.

# Chapter 7

## Supportibility

The principal objective of the online food ordering system is to enhance communication among patrons, eateries, and delivery staff. In addition to making it easy for customers to place orders, online ordering helps restaurants effectively handle incoming orders, inventory, and delivery assignments. By reducing the time spent on manual processes, this solution increases operational efficiency and order accuracy. Furthermore, it safely preserves private client and restaurant information, guaranteeing effective communication amongst all parties. Because it enables customers to place orders while on the go and allows businesses to monitor orders from any location, the software's portability is essential for mobile use. The system's ultimate goals are to streamline food ordering processes, cut down on red tape, and improve convenience.

# 7.1 Social and Environmental Effects

There are two primary advantages to using our online food ordering system. First, by reducing the amount of paper needed, a fully digital system promotes sustainable and environmentally conscious business operations. This helps restaurants lower their carbon footprint and supports global environmental sustainability goals. Second, from a societal perspective, our approach enhances the customer experience and increases accessibility to culinary services. Enabling online ordering reduces wait times and increases customer satisfaction by allowing customers to easily browse menus, place orders, and monitor deliveries. Thanks to the system's user-friendly interface, a wider demographic can now access food services, promoting more social inclusion and convenience for everyone.

## 7.2 Social and Environmental Effects and Analysis

The Online Food Ordering System's capacity to save time is among its most important societal effects. Time is an important resource, and this approach offers exceptional convenience in terms of cutting down on the time and effort required to order food.

Personally, the advantages are very favorable, providing people with a more effective means of obtaining meals. When taken as a whole, the impact is considerably more significant. Users can order food from anywhere at any time as more people use the system, which contributes to a larger trend toward digital ordering. The extensive use of such a system represents a significant breakthrough in the digitization of routine jobs, enhancing societal efficiency generally and convinence.

# Chapter 8

# Lesson Learned

## 8.1 Problems Faced During this Period

I had the incredible chance to design and contribute to the Online Food Ordering System during my internship. Along with honing my front-end and back-end development skills, I've gained a better understanding of how software is built in the real world. This project showed how important it is to understand client needs, deliver flawless performance, and produce a high-quality final result.

One of the most significant lessons, in my opinion, was the value of effective communication, teamwork, and incorporating user feedback into design improvements. It was essential to comprehend the client's requirements and adjust the finished product based on their suggestions. Additionally, because I worked on features like user profiles, restaurant administration, and bug fixes, I had to carefully consider scalability and user experience.

I learned from my internship that a combination of technical skills and practical knowledge, including testing and product iteration, are necessary for success in the corporate world.

It also demonstrated how little college coursework prepares us for these challenges in the real world. I believe that this experience and continued education outside of the classroom will help me advance in this industry.

# Chapter 9

# Future Work & Conclusion

## 9.1 Future Works for this project

As we can see, there will be several future additions and improvements to our online food ordering system. We intend to improve the system's functionality by incorporating advanced communication tools for customers, servers, and delivery staff. Customers will be able to request specialized services or follow real-time updates thanks to the technology. In order to improve their menu offerings, businesses will have access to extra features like inventory management and analytics in addition to order management. In further iterations, we plan to incorporate additional departments, such customer service and logistics management, to further streamlines operations. As the system becomes more dependable, more smooth transactions and increased scalability for future needs are guaranteed.
These changes will ultimately fortify and adapt the system, opening the door for further improvements to the online meal ordering procedure.

## 9.2 Conclusion

In conclusion, the efficiency of the ordering process for both customers and restaurants has significantly increased as a result of our initiative to develop an online food ordering system. Even though developing such software was challenging, by focusing on its usefulness, robustness, and potential for future updates, we were able to create a very effective tool. Regular adjustments are necessary to keep the system flexible enough to meet changing client demands and emerging trends. We can ensure that the system remains up to date and operational by leveraging our extensive knowledge in this field. Additionally, the technology reduces the need for paper documentation, which makes the entire food ordering and administration process more economical and environmentally friendly.

# Bibliography

[1] By 2025, the restaurant management software market is expected to be worth $6.94 billion (2021). From https://www.grandviewresearch.com/press-release/global-restaurantmanagement-software-market, retrieved April 8, 2021

[2] Wikipedia, "McDonald's." (2021). taken from https://en.wikipedia.org/wiki/McDonald's on April 8, 2021

[3] K. Collier (2012). Agile analytics is a value-based method for data warehousing and business intelligence. Wesley-AddisonK. Collier (2012). Agile analytics is a value-based method for data warehousing and business intelligence. Wesley-Addison