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Tribhuvan University Faculty of Humanities and Social Sciences

Online Clothing Store

A PROJECT REPORT

Submitted to Department of Computer Application Lumbini City College

In partial fulfillment of the requirements for the Bachelors in Computer Application

Submitted by

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Under the Supervision of

Manoj Pokharel

(A typical Specimen of Certificate)



Tribhuvan University Faculty of Humanities and Social Sciences

Lumbini City College

Supervisor's Recommendation

I hereby recommend that this project prepared under my supervision by Anup Rimal and Bhupendra Thapa Chhetri entitled "Online Clothing Store" in partial fulfillment of the requirements for the degree of Bachelor of Computer Application is recommended for the final evaluation.

SIGNATURE

Manoj Pokharel

SUPERVISOR

(A typical specimen of Approval)



Tribhuvan University Faculty of Humanities and Social Sciences

Lumbini City College

LETTER OF APPROVAL

This is to certify that this project prepared by Anup Rimal and Bhupendra Thapa Chhetri entitled "Online Clothing Store" in partial fulfillment of the requirements for the degree of Bachelor in Computer Application has been evaluated. In our opinion it is satisfactory in the scope and quality as a project for the required degree.

SIGNATURE of Supervisor	SIGNATURE of HOD/ Coordinator
SIGNATURE of Internal Examiner Internal Examiner	SIGNATURE of External Examiner External Examiner

ABSTRACT

"The online shopping website project outlines a comprehensive e-commerce platform designed to provide customers with a convenient and secure online shopping experience. The website aims to offer a wide range of products, intuitive navigation, personalized recommendations, and reliable order fulfillment. Key features include user registration and accounts, product browsing and search, a shopping cart and checkout process, integrated payment gateways and customer support channels. The website is designed with a responsive and user-friendly interface, ensuring seamless access from various devices. By leveraging technology, trust-building measures, and efficient logistics, the online shopping website aims to attract and retain customers, drive sales, and create a positive shopping experience. The project's success will rely on effective system analysis, development, and implementation, considering user requirements, security considerations, scalability, and market demand. Overall, the online shopping website aims to provide a convenient, secure, and enjoyable online shopping platform for customers, contributing to the growth and success of the e-commerce industry."

Keywords: gateways, order, product, checkout, access.

Acknowledgement

I am obliged to a number of people who helped to organize this project and thankful for their kinds opinions, suggestions, and appropriate guideline. I have received endless support and guidance in finalizing my project so i would like this opportunity to thank them all.

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Anup Rimal And Bhupendar Thapa Chhetri

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List of Abbreviations

B2C - Business to Consumer

CRM - Customer Relationship Management

DFD - Data Flow Diagram

ERP - Enterprise Resource Planning

FAQ - Frequently Asked Questions

UI - User Interface

UX - User Experience

VSCode - Visual Studio Code

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Chapter 1: Introduction

1.1 Introduction

Online shopping is a form of electronic commerce which allows consumers to directly buy goods or services from a seller over the Internet using a web browser or a mobile app. Consumers find a product of interest by visiting the website of the retailer directly or by searching among alternative vendors using a shopping search engine, which displays the same product's availability and pricing at different e-retailers. customers can shop online using a range of different computers and devices, including desktop computers, laptops, tablet computers and smartphones.

An online shop evokes the physical analogy of buying products or services at a regular "brick-and-mortar" retailer or shopping center; the process is called business-to-consumer (B2C) online shopping. When an online store is set up to enable businesses to buy from another businesses, the process is called business-to-business (B2B) online shopping. A typical online store enables the customer to browse the firm's range of products and services, view photos or images of the products, along with information about the product specifications, features and prices.

1.2 Problem Statement

The following problems arise due to this absence.

- i. User Registration and Authentication: Users, including students or employees, should be able to register and create accounts in the system.
- ii. Payment Processing: Users should be able to make payments using various methods, including cash, card, or digital wallets. Payment processing should be secure and integrated with the ordering process.
- iii. Security and Privacy: The system should implement robust security measures to protect user data and financial transactions. User data should be handled in compliance with relevant data protection regulations.
- iv. Admin Panel: Admins should have access to an admin panel for managing users, staff, and overall system settings. Admins should be able to generate reports related to sales, popular items, and other relevant metrics.

1.3 Objectives

Our proposed online shopping website aims to provides a user-friendly platform for to browse, purchase, and receive products from our extensive range of offering. The website will be designed with a focus on simplicity and functionality, ensuring an exceptional user experience that aligns with our brands image.

1.4 Scope and Limitation

Scope of Online Shopping:

- Convenience: Online shopping provides the convenience of browsing and purchasing products or services from anywhere and at any time, eliminating the need to travel to physical stores.
- Price Comparison: Consumers can easily compare prices and features of products from various sellers, enabling them to make informed purchasing decisions.
- iii. Reviews and Ratings: Online platforms often feature customer reviews and ratings, helping shoppers make more informed choices based on others' experiences.
- iv. Cost Savings: Online retailers may offer lower prices due to reduced overhead costs, and consumers save on transportation expenses and time.
- v. 24/7 Availability: Online stores are accessible at all times, accommodating various schedules and time zones.

Limitations of Online Shopping:

- Lack of Physical Interaction: Consumers cannot physically inspect or try on products before purchasing, potentially leading to dissatisfaction if the received item doesn't meet expectations.
- ii. Security Concerns: Online transactions involve sharing sensitive personal and financial information, making consumers susceptible to cyberattacks, identity theft, and fraud.
- iii. Digital Divide: Not everyone has equal access to the internet and digital devices, limiting the reach of online shopping to certain demographics.

- iv. Potential for Misleading Information: Some online sellers might provide inaccurate product descriptions or images, leading to disappointment upon receiving the product.
- v. Digital Divide: Not everyone has equal access to the internet and digital devices, limiting the reach of online shopping to certain demographics.

Chapter 2: Background Study and Literature Review

2.1 Background Study

In this new era of generation, the numbers of people shopping online has increased significantly throughout the year which give greater impact to the business world. According to Magee (2003), the growth in the number of online shoppers is greater than the growth in Internet users, indicating that more Internet users are becoming comfortable to shop online. This whole new phenomenon of purchasing online kept on increasing due to the existence of the internet that trigger the users to choose the online shopping medium to purchase their items. The Internet, as a mean for both firms and individuals to conduct business, is nowadays one of the most widely used non-store formats [1].

From the customer's point of view, the Internet (Mehta & Sivadas, 1995) offered the potential advantages of reducing shopping time and money spent. It allowed twenty-four hours a day access, provided perhaps better service, and gave the consumer a perception of control over the shopping experience. The two most commonly cited reasons for online shopping have been convenience and price [2].

2.2 Literature Review

Online shopping indicates electronic commerce to buy products or services directly from the seller through the Internet. Internet-based or Click and Order business model has replaced the traditional Brick and Mortar business model. More people than before are using the web to shop for a wide variety of items, from house to shoes to airplane tickets. Now people have multiple options to choose their products and services while they are shopping through an online platform.

Emphasized that the lack of physical interaction tends to be the critical impediment in online retail sales followed by the privacy of individual information and security of financial transactions over the Internet [3].

Also, demographic variables such a sage, gender, and level of income play a facilitating role because they influence consumer perception and consumer behavior that drives them to ward son line shopping [4].

In China, online shopping intention depends on consumers' age, income, and education as well as marital status and most importantly their perceived usefulness [5].

Chapter 3: System Analysis and Design

3.1 System Analysis

3.1.1 Requirement Analysis

i. Functional Requirement

- The system must provide following functionalities:
- Keeping record of customer
- Keeping record of products
- Keeping record of daily sell

Functional Requirement can be expressed in Use Case For

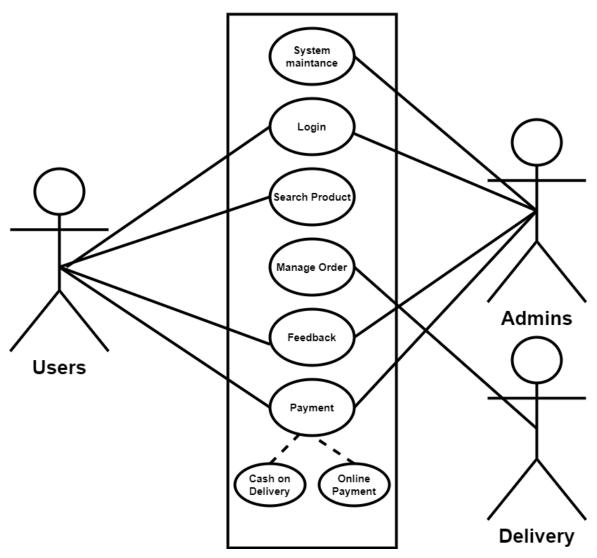


Figure 1: Use Case Diagram

ii. Non – Functional Requirement

- Security: Security requirements ensure that the software is protected from unauthorized access to the system and its stored data. It considers different levels of authorization and authentication across different user's roles.
- Performance: Performance is a quality attribute that describes the responsiveness of the system to various user interactions with it. Poor performance leads to negative user experience. It also jeopardizes system safety when it's overloaded.
- Usability: Usability defines how difficult it will be for a user to learn and operate the system. Usability can be assessed from different points of view.

3.1.2 Feasibility Analysis

i. Technical Feasibility:

It is technically feasible, since there will not be much difficulty in getting required resources for the development and maintaining the system as well. The project is being built by using simple technologies to reduce technological hindrances.

ii. Operational Feasibility:

In this project, the admin will know the details of each project where he may be presented and the data will be maintained as decentralized and if any inquires for that particular contract can be known as per their requirements and necessaries.

iii. Economic Feasibility:

Development of this application is highly economically feasible. The only thing is to be done is making an environment for the development with an effective supervision.

iv. Schedule Feasibility: This includes the project schedule and all time allocated for their completion. The Gantt chart is as follow:

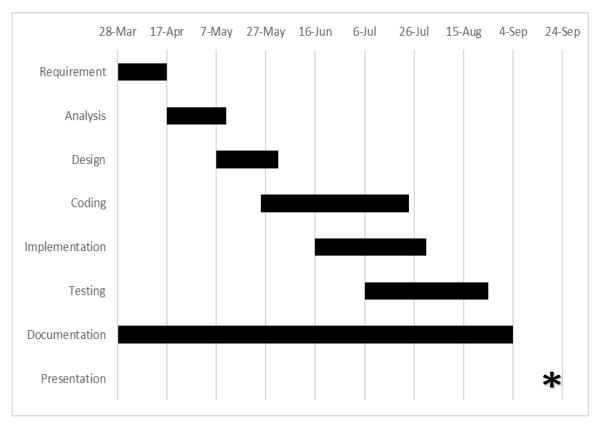


Figure 2: Gantt Chart

3.1.3 Data Modelling (ER-Diagram)

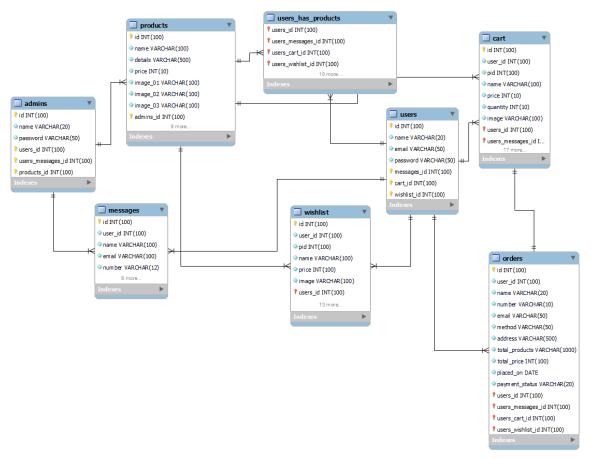


Figure 3: Entity-Relation Diagram

3.1.4 Process Modelling (DFD)



Figure 4: Zero level of Data Flow Diagram

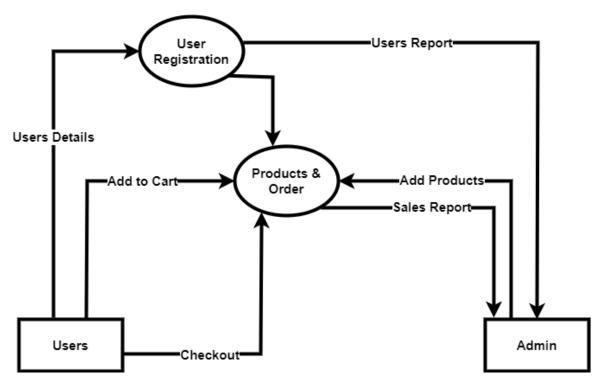


Figure 5: First Level of Data Flow Diagram

3.2 System Design

3.2.1 Architectural Design

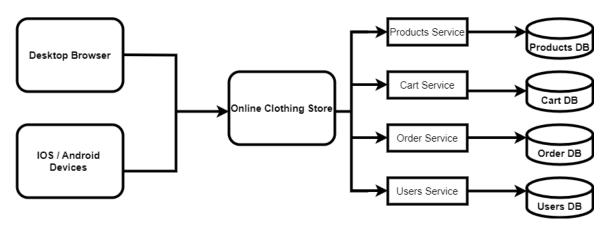


Figure 6: Architecture Design

3.2.2 Database Schema Design

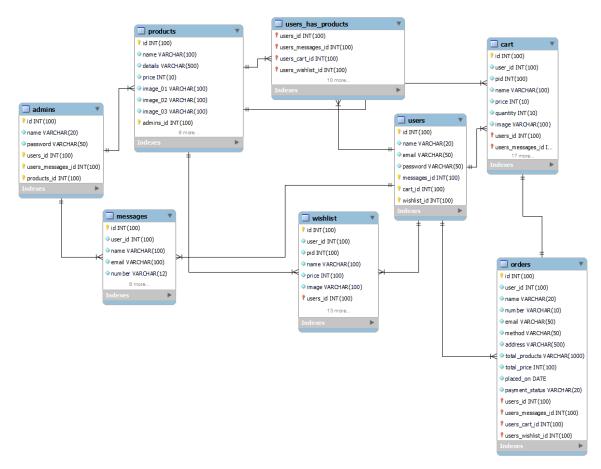


Figure 7: Database Schema Design

Chapter 4: Implementation and Testing

4.1 Implementation

4.1.1 Tools Used

- IDE: Visual Studio Code (VSCode) A user-friendly integrated development environment (IDM) used for coding and developments tasks.
- Documentation: MS Office Tools for creating and editing project-related documents and presentation.
- Font-end: HTML, CSS, JavaScript A languages to development of the graphical user interface of a website.
- Back-end: PHP A program supports font-end user services, and interface with any required resource.
- Database Management: MYSQL An oracle-backed open source relational database management system (RDBMS) based on Structured Query Language (SQL).
- Localhost: Xampp A free and open-source cross-platform web server solution stack package developed by Apache Friends.
- Diagramming: Draw.io An online diagramming tool for creating visual representation such as system architecture diagrams and flowcharts.

4.1.2 Implementation Details of Modules

The modules include:

- User Registration: The user module allows users to register, log in, and log out. Users benefit from being able to sign on because this associates content they create with their account and allows various permissions to be set for their roles.
- Checkout: A checkout module is a special container that hosts all modules that are required to create an order. It presents a step-by-step flow that a customer uses to enter all the relevant information to make a purchase. It captures the address, and billing information.
- Quick view: The quick view module lets users quickly view product information when they browse products on a list page, and add one or more products to the cart from the list page, without having to go to the product details page (PDP). The quick view module provides an overview of the product information that users require to make an "add to cart" decision. It also provides a link to the PDP, so that users can view additional product details and purchase options.

4.2 Testing

4.2.1 Unit Testing

Table 1: Test Cases for Unit Testing

Test Case No	Module	Test Description	Steps	Expected	Result
				Result	
	User Registration	Verify user	Input valid	User is	Pass
TC_01		registration	user details	registered	
		functionality	and register	successfully	
	Admin	Verify Admin	Input valid	Admin is	Pass
TC_02	Registration	registration	Admin details	registered	
			and register	successfully	
	Add Product	Add product in	Post with	Add product	Pass
TC_03		font-end website	details and	successfully	
			submits		
TC_04	Profile Update	Update Admin &	Fill in	Profile is	Pass
		User profile	relevant	update	
			details and		
			Save profile		

4.2.2 System Testing

Table 2: Test Cases for System Testing

Test Case No	Module	Test Description	Steps	Expected Result	Result
TC_05	Contact us	Send message In Admin dashboard	Send a message between admin & user	Messages are sent and received	Pass
TC_06	Quick View	User see quick view in website	Add to cart, wishlist & increase quantity	Add to shopping cart	Pass
TC_07	Checkout	Process of checkout	Click to checkout button	Successfully order products items	Pass
TC_08	Wishlist	User see wishlist in website	Add to cart, See quick view & delete item	Add to shopping cart	Pass

Chapter 5: Conclusion and Future Recommendations

5.1 Lesson Learnt / Outcome

Throughout the development of final project, a wide range of lessons were learned, and significant outcome were achieved, contributing to both personal and professional growth. The key lessons and outcomes are as follows:

- Customers are Also Thinking Way Ahead of You: Customers often think of new
 ways to improve your products. After all, they are the ones using them.
 Therefore, it's wise to continuously reach out to them to understand their needs.
- Checkout Pages Should Be as Few as Possible: If one checkout page is an option, go for it. Fit as much information on that page as you can.
- Don't Forget About Your Local Customers: Maybe you can offer fast shipping to those in the area. Maybe you can hold events to get people excited about new products.
- Data is Always Better Than Advice from People: It's easy to take advice from your cousin, or even one of your employees for that matter, but data is always going to tell you the truth.

5.2 Conclusion

Online shopping, also known as e-commerce, is a modern method of purchasing goods and services through the internet. It has revolutionized the way people shop by offering convenience, accessibility, and a wide variety of choices. In conclusion, online shopping provides a seamless platform for consumers to browse, select, and purchase products from the comfort of their homes, with the potential for cost savings, time efficiency, and the ability to reach a global marketplace. However, it also presents challenges such as security concerns, the inability to physically inspect products, and potential delays in delivery. Despite these challenges, online shopping has become an integral part of the retail landscape, continually shaping consumer behavior and the way businesses operate.

5.3 Future Recommendations

As the online shopping platform moves forward, the followings recommendations can further enhance its impact and sustainability:

- Continuous improvement based on user feedback: regularly gather user feedback
 and implement updates to enhance the platform's functionality and user
 experience.
- Market expansion: Consider expanding the platform's reach beyond Nepal to reach a broader audience of skilled professionals and organizations.
- Enhance payment options: Integrate additional payment methods to cater to diverse user preferences and geographical locations.
- Advance feature: Explore the integration of advanced features like AI-powered to improve the understand between users and admins.

Appendices

Appendix: Project Screenshots

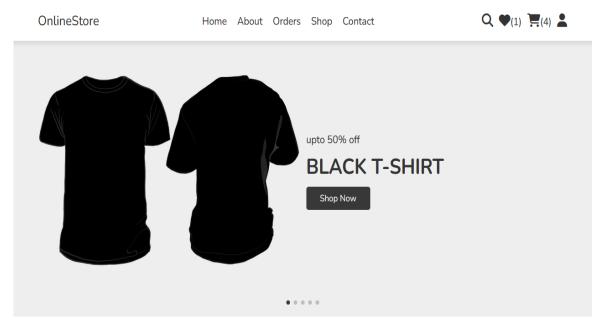


Figure 8: Home Page

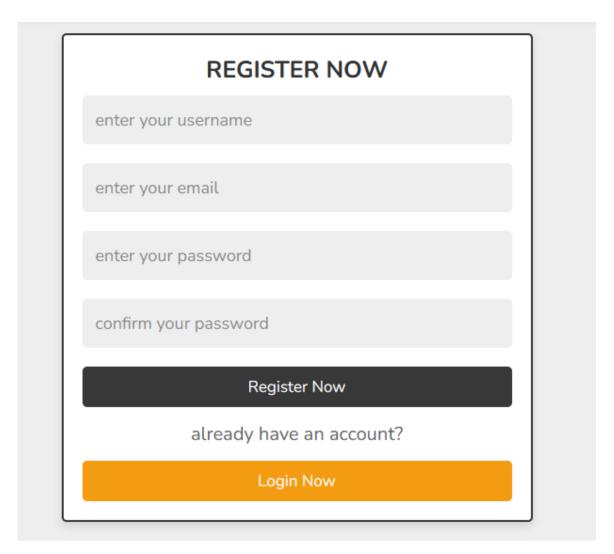


Figure 9: Login / Register page

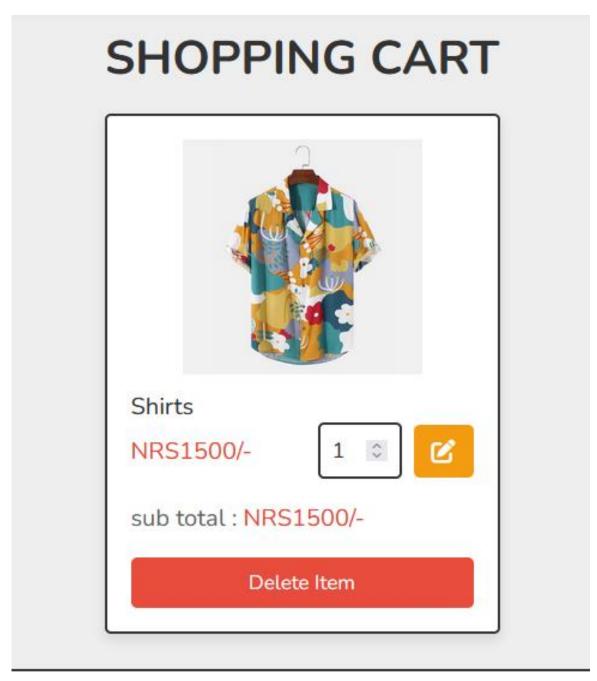


Figure 10: Shopping Cart

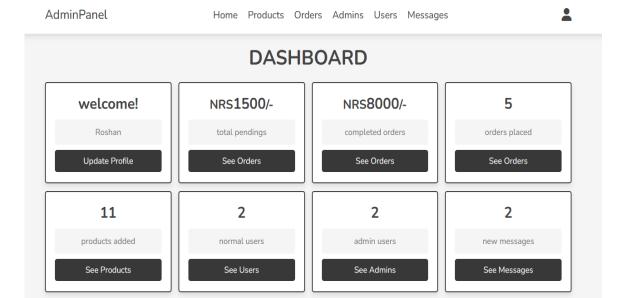


Figure 11: Admin Dashboard

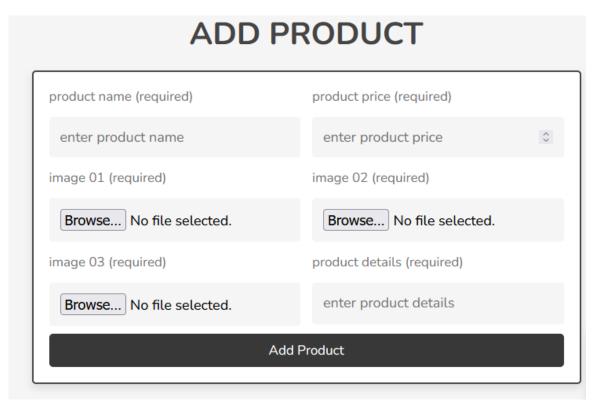


Figure 12: Add Product

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Supervisor log sheet

Project Summary

Project Date	Project Name	Prepared By
March 28, 2023	Online Clothing Store	Anup Rimal and Bhupendra Thapa Chhetri

			T	
Date	Time In	Time	Hours	Description of work
		Out		
10/04/2023	8	9: 10	1:10	
	am	am	hours	
25/04/2023	8: 10	9: 20	1: 30	
	am	am	hours	
20/05/2023	9: 20	10: 10	1: 30	
	am	am	hours	
05/06/2023	6: 20	7: 10	1: 30	
	am	am	hours	
26/06/2023	7: 10	8: 20	1: 30	
	am	am	hours	
19/07/2023	8: 10	9:40	1:40	
	am	am	hours	
28/07/2023	7	7: 30	30	
	am	am	min	
09/08/2023	9: 55	10: 35	40	
	am	am	min	
