Project report. SHOEZY Online Store.

Find your perfect pair Step up with Shoezy

- Project Title: Shoezy Online Shoe Store
- Module: Web Application Development
- Module leader: Mr. Saravanapavan Nasiketha
- Date: 17.09.2025
- GROUP U



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1.Team members

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Student name	Student ID
P.A.D.S.Kavindu	36527
H.K.P.K.Induwara	36388
R.M.D.O.Pathirana	36984
H.S.Y.Perera	36464
Kavindu Ayesh	36622
H.KHemachandra	37075
T.P.T.Perera	36241
S.H.G.Sooriyaarachchi	36881
I.B.Dadigama	36515
A.T.Jansen	36417



2. Abstract

The Shoezy Online Shoe Store is a web-based e-commerce platform that aims to simplify shoe shopping with its adaptable and user-friendly interface. Customers have the ability to register, log in, add items to their shopping cart, peruse by category, and place orders. The administrator may manage inventory, categories, and orders via an integrated control panel. This project demonstrates the integration of frontend design (HTML, CSS, JavaScript), backend functionality (PHP), and relational database management (MySQL). The outcomes include a completely functional prototype, testing validation, and a foundation for future enhancements such as mobile apps, payment gateways, and AI-powered recommendations.

3.Introduction

3.1.Problem Statement:

The traditional method of shoe shopping is time-consuming and involves customers visiting physical stores with a small selection. E-commerce platforms address this, although many of them are convoluted or cluttered. Shoezy provides a streamlined, academic-level e-commerce system and an efficient online purchasing experience to demonstrate fundamental web development skills.

3.2.Objectives

Make the website easy to use so that people may browse shoes.

Use PHP sessions to implement cart functionality.

Use a MySQL relational database to effectively manage data.

Permit administrators to examine customer orders and add, modify, and manage products.

Showcase essential e-commerce features in a classroom context.

3.3.Scope

- Frontend: HTML/CSS provides structure and style, while JavaScript allows for interaction.
- PHP is used on the backend to handle requests and process data.
- Database: MySQL schema containing tables for users, products, orders, and order item.
 Product categories (Men, Women, Kids, and Sports), checkout, admin dashboard, cart, user registration, and login are among the features.

4.Background

Existing Systems

Although well-known e-commerce platforms like Amazon, Flipkart, and Shopify provide comprehensive solutions, they are usually complex and resource-intensive

Uniqueness of Shoezy:

Shoezy's unique selling point is that it has been purposefully made simpler to aid in academic learning, highlighting the fundamentals of e-commerce (login, basket, checkout, admin). avoids employing modules that are currently too complex, such as secure payment. For learning and experimentation, setting up XAMPP on local servers is simple.



5. System Requirements

5.1.Hardware Requirements
 A laptop or PC with at least 4 GB of RAM
 A CPU with a speed of at least 2 GHz
 500 MB of spare disk space

• 5.2.Software Requirements

System software: Windows 10 or later

Database and Web Server: XAMPP (Apache, PHP, MySQL)

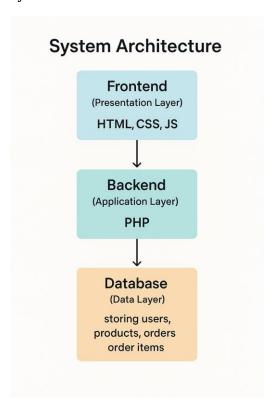
Visual Studio Code as an editor

Web browsers: Google Chrome, Microsoft edge

GitHub is used for version control.

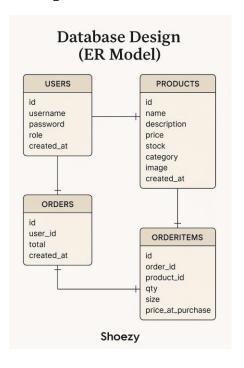
6. System Design

System Architecture

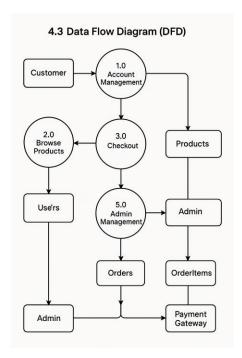




ER Diagram



Data Flow Diagram (DFD)





7. Implementation

a.)Frontend (CSS, JS, HTML)

HTML is used to create the homepage, product listing, and cart pages.

Custom CSS and Bootstrap 4 were used for the styling.

Interactivity is improved via JavaScript (form validation, cart updates).

b.)PHP backend

PHP and MySQL queries are used to manage registration and login.

Up until checkout, the cart is managed using session variables.

The admin dashboard lets you view orders and add or remove products.

c.)Database(sql)

Database includes Users, Products, Orders, and OrderItems tables.

Database Implementation:

Users: role and account details.

Products: product information with a categorization based on text.

Orders include user reference, date, and total.

OrderItems: linkage between order and product with quantity, size, and cost upon purchase.

8. Testing

8.1Examining Units

Sample accounts were used to validate the login and registration.

The cart's ability to add and remove goods has been tested.

8.2 Examining Integration

The entire checkout process (browse \rightarrow cart \rightarrow checkout \rightarrow order confirmation) was tested.

8.3 Testing Databases

Insert, update, and delete operations tested in MySQL.

9. Deployment

The Shoezy Online Shoe Store was set up in a local development environment using XAMPP. This ensured that the system would be thoroughly tested before going live. Deployment includes setting up the server environment, configuring the database, and implementing version control for collaboration.

9.1 Local Deployment

The project was deployed locally using XAMPP. After XAMPP was installed, the project folder was placed under the htdocs directory. The database schema (shoezy_schema.sql) was imported using phpMyAdmin, and the application's URL was http://localhost/SHOEZY_DB_wired_categories/



9.2. GitHub Integration

Version control was managed using GitHub, which made branching, rollback, and collaboration possible. The repository ensures that deployment may be easily replicated by importing the database and copying the code.

9.3.Future Scope

Future deployment plans include using cloud-based databases for scalability, hosting on a live web server, and implementing CI/CD pipelines for automated upgrades and secure hosting.

10. Results

The Shoezy Online Shoe Store was successfully built and tested using a local server configuration. By combining an admin and customer module, the project achieved its main goals.

Customer Module: Users can safely sign up and log in.

You can explore products by category.

It is possible to add or remove items from the shopping basket.

Orders are saved in the database when customers finish the checkout procedure.

Module of Administration:

i)A secure dashboard is accessible to administrators.

ii)It is possible to manage products.

iii)Customers' orders can be tracked and reviewed.

iv)System Performance: The system reacted rapidly during local testing, displaying correct database transactions and seamless page navigation. Order placements and cart updates are completed promptly.

Usability: Because the interface was created with simplicity in mind, even novice users will find it easy to use. Access to essential features (including browsing, checkout, and login) is simple, and navigation is obvious.

11. Conclusion & Future Enhancements

11.1. Conclusion

An effective example of how web technologies may be leveraged to develop a functional e-commerce platform is the Shoezy Online Shoe Store project. It combines a MySQL database, a PHP backend, and a responsive frontend to offer standard shopping features including browsing, cart management, order placing, and administrative control. The project meets its academic objectives by showcasing expertise in database design, web development, and system integration.



11.2. Future Enhancements

Although the existing solution provides a thorough functioning model, there are several ways to increase scalability, security, and usability:

Integrating a payment gateway (such as PayPal or koko) is necessary for safe online payments.

Advanced Search and Filters: More intelligent product discovery is made possible by multicriteria filtering.

Mobile App Support: Particular iOS and Android apps that improve accessibility.

AI Suggestions: Customized product suggestions based on user behavior.

Cloud Deployment: Expert cloud platform hosting with pipelines for ongoing delivery and integration.

12. References

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13. Appendices

