

Professional Skills

Malabe Campus – Weekdays

2nd year 2nd semester

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How to commercialize your 2nd year project?

Our 2nd year ITP project is a Retail Management System made for a client who owns a footwear shop. Initially we made this project for the client but we can commercialize it by modifying the site to be used by any retail store. There are more than 100,000s of retail stores in Sri Lanka, some of them are already using a retail management system, some are fear of using a retail management system, some are planning to use a retail management system and some are using a retail management system but are fed up of using due to the poor service provided by the companies. So we can commercialize our project by approaching the client and explaining our system and modifying our system to suit their needs. We can also commercialize a system by building another website that will advertise and explain the features of the system. So clients can visit the website explore the features of the system, try a demo and enjoy a trial of the system for 7 days. So clients can continue by subscribing to a paid plan. This method will not only commercialize the system in Sri Lanka but also globally clients will be able to use our system. During this trial period we will provide them a best service and try to call and convert them to paid customers. So these methods will help to commercialize the ITP Project.

Value Proposition

Retail management System

Automate the daily transactions of a retail store

Analyze your sales in seconds

Accurate reports to make important decisions

Easy billing

Access from any where at any time in any device

SWOT Analysis

Strengths –

- **Presence of a dedicated team to improve and build a better system**
- **Financial Stability**
- **The system is a cloud based system so it can be commercialized all around the globe.**
- **The system is built using all the latest and trending technologies.**

Weaknesses –

- There might be some errors that we might not even know.

Opportunities -

- Many people are starting new businesses so we can approach them.
- Availability of many online advertising platforms to advertise the system.
- Many businesses are looking for an affordable and quality retail management system, so we can provide our system at an affordable price.
- People in Sri Lanka are starting to automate

Threats –

- There are many competitors in this fields.
- There are many multi national companies who have already been established in this field.
- Many businesses have already moved to retail management systems.
- Technology is developing daily so need to be ready to adopt latest technological changes

PEST Analysis

Political –

Increasing governmental support for development of IT industry.

Increasing governmental support for automation of organizations.

Political Stability

Economic –

Economical Instability of the country

Currency Fluctuation

Certain taxes on businesses have been waived off

High growth of developed countries may be an opportunity when we approach customers globally.

Social –

Stable demand for high quality customer support service.

Technological –

Increasing automation in business

Changes in technology incentives

Availability of Internet to most parts of the world

Problem	Solution	Unique Value Proposition	Unfair Advantage	Customer Segment
Difficult to manage sales. Difficult to analyse profit and loss Difficult to manage stocks	Using of a Retail Management System with an integrated POS system can solve all the problems	Automating the daily transactions of the store. Analyse your sales in seconds Easy billing Saves time Accurate reports to make important decisions Access from anywhere at any time in any device.	Lower price for a high-quality system	Retail Store Merchants
Existing Alternative	Key Metrics	High-Level Concept	Channels	Early Adopters
Presence of Retail Management Systems	Number of retail stores using old manual methods	Automate the store to make an analyse a transaction within seconds.	Website Through personal contacts Advertising	Willing to automate the store Doesn't have a retail management system Already have a retail management system but the system doesn't have all the required characteristics.
Cost Structure			Revenue Structure	

Employee Payroll Taxes Hosting Cost Marketing and Ads	Paid membership plans Paid service plans
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Strategies

We are planning to adopt a client focused strategy in order to achieve growth. Rather than focusing on clients only in Sri Lanka we are planning to focus on clients all around the world. We are planning to offer high quality affordable price system in order to attract more clients and establish our company. We will give more priority customer service because customers always expect a good service for the value they pay. Providing a good and friendly customer service will help the client to stick with our product for a long period of time. We will focus on emerging trends and technologies and giving the clients the best possible system to automate their tasks. In summary our key strategies are affordable, quality and good customer service.

Description

We have to build a system to a real client in this semester. This system would build for solve a real-time problem. This is built by a team with 8 members. We have to deliver it to our client and solve his work place problem.

Feelings

This is a real system to use by the client. Actually, is was different experience because we are always seen POS systems using in the market. But using our own system is an awesome feeling and it cannot get to everyone. We had not any experience but we started from basics. Then developed step by step. YouTube tutorials, some online courses were very helpful to do this.

Evaluation

This app is made for solve a problem of the users who are using the system. Without planning, any task cannot be done successfully. From the UI designing, we planned everything if the system. The nature of the system, for what this system, who are the users are the things we considered before we build.

This was a real responsibility because the system we build should reliable because it is going to use by real users in a real work place. So, we had a huge responsibility to make a successful system to satisfy our client.

Analysis

The client is already using a shop management system to manage his shop. The client uses this shop management system to manage the stock, employees and sales of the store. Even though the client uses a shop management system to manage the shop he is not satisfied with the current system due to lack of services provided by the software company and due to unfulfilled requirements by the current software.

Due to this the client uses both the software and manual methods to manage the transactions of the store. Therefore, this result is inaccuracy and improper decision making.

- ❖ Improper stock management,
- ❖ Difficult to transfer stock between inventories
- ❖ Difficult to perform inventory counts
- ❖ Unable to implement loyalty programs
- ❖ Difficult to manage and automate promotions
- ❖ Difficult to manage payment to vendors
- ❖ Difficult to maintain the staff attendance
- ❖ Unable to generate and manage vouchers.

As a solution for the above-mentioned problems our team proposed to shift to a new system of online Retail Management system with a cloud database management system.

This Retail management System contains all the basic functionalities of a retail management system and also the special requirements of the client to solve the above-mentioned problems.

Conclusion

It was a pleasure to build an app like that because of its usefulness. It was a huge experience for all because it was the first android app we built.

There are many benefits of using this POS system.

- ▶ Easy Data Access
- ▶ High Security
- ▶ Better Information
- ▶ Increased efficiency
- ▶ Ease of Use
- ▶ Greater Accuracy
- ▶ Expanded Payment Capabilities.
- ▶ Simplified Accounting
- ▶ Saves Time
- ▶ Competitive Advantage

Action plan

All members had contributed for UI designing. After agreed to one decision.

Initially we used a private repository to do the version controlling of the project and for the submission we created a public repository and pushed all the commits to the public repository. The private repository is the repository with every branch.

All members in the team, did their part and pushed to the Git repository. And merged there.

We have to test the app several times before we deliver to the client. Because we had to make sure system is error free and user friendly.

We had decided to use some tools and technologies to build the system.

Tools:

- ❖ Visual Studio Code
- ❖ GitHub
- ❖ AWS Cloud Relational Database
- ❖ Barcode Scanner
- ❖ Thermal Printer

Technologies:

❖ **Front end**

- HTML 5
- CSS3
- JavaScript
- Laravel Livewire
- Bootstrap
- jQuery

❖ **Backend**

- PHP using Laravel Framework
- MySQL