



Cashier Less Shopping

Pranav Jandu¹, Mohit Sharma², Ankit Lodhi³

Department Of Information Technology, HMR Institute Of Technology And Management, Guru Gobind Singh
Indraprastha University, Delhi, India^{1,2,3}

Abstract: Shopping has been a current trend in today's stream. The billing time is getting much more than collecting your products from the store. The purpose of this paper is to give solutions through cashier-less shopping. The customer segment includes the buyer, the seller. This project has proposed conceptual solutions through Business Model Canvas (BMC), Value Proposition Canvas (VPC), and Environment Map (EM).

Keywords: Internet, e-commerce, traditional Stores, website.

1. INTRODUCTION

In this globalization era where most people are exposed to various types of new technology, there are still many people who are stuck in the long queues of billing. Some people prefer offline transactions instead of online transactions like Amazon Go, Decathlon Scan & Go. It might be because of the fear of getting scammed or not believing in the new upcoming technologies. However, nowadays everyone is in hurry, technology is trying to make their lifestyle faster but people are not adopting that positively. So, the public tries to find less crowded stores instead of having one with good offers and with a little bit less crowded environment. Now a day is time is money so we get up with a great idea for optimizing your shopping time. The thing we are going to implement is giving you the power to collect and generate your bills yourself by our Cashier-less Shopping web app.

II. PROGRAM BACKGROUND

This proposes a business model that will implement Cashier less Store that will help the customer to avoid long lines for billing. The main objective of the system is to remove the process of checkout counters and providing that functionality in your mobile phone. A customer just needs a basic web browser, not even any android apps, Customer will scan the QR code or barcode of the product and the product will get automatically added to the cart. In the cart, section the user can verify his/her product and increase or decrement the quantity and checkout. Once the customer has done the billing, they will receive a QR code which they need to show the guard. The guard has his own QR code scanning app which will help him to verify the bill and allow a pass way.

We have seen that there are long lines for billing, the customer has to wait for so long doing nothing. Now they can add the product to the online cart just before putting it basket. Also, it will help to maintain social distancing guidelines like common touching during scanned by the cashier, crowd congestion on billing counters. Talking about the benefits of store owners, it will help to reduce the staff and providing fast checkout services.

III. PROBLEM STATEMENT

There are numerous of stores that exist today. the popular ones are Big Marts, local stores, more. People spent see you later in collecting the products and within the end many gets disappointed after seeing long queue and also once we reach the cashier it takes time for scanning the products and putting back to your basket. repeatedly cashiers mistakenly register extra products or forget some.

Under this pandemic of covoid-19 our idea of cashier less shopping could help the shop owners to create the customer flow fast and effective. Cashier less shopping allows a customer to scan products, pay, and walk out of the partnered store without standing within the queue. The webapp allows one to scan the barcode of the merchandise, and pay the shop directly through debit/ credit cards or UPI. The customer may use their self-checkout kiosks founded within the partner stores. The verification mechanism at the tip ensures zero theft and also the whole process of checkout is probably going to require but a moment for a customer.

Our goal is to form the in-store shopping experience fun. the primary step towards this is often to get rid of the concept of queuing. Retailers too always have this problem on their priority list since it directly affects their sales However, it absolutely was difficult to convince retailers that self-checkout is feasible in India, too. it's become a believable concept now since retailers can witness self-checkout themselves in stores. it's just that they need such a lot of books that take their space. Since they think that by donating the books would solve their problems since the



books is also still during a shape. it absolutely was a challenge to integrate the software into the system and make sure that it runs smoothly. the first reason for the complexity is that the extreme legacy software's utilized by all the retailers believed in their product and supported them. "When someone of that stature, believes in your ideas and products, it gives the energy to travel the additional mile and do the impossible. However, it absolutely was challenging to convince retailers that self-checkout is feasible in India, too. it's become a believable concept now since retailers can witness self-checkout themselves in stores.

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IV. METHODOLOGY

In order to grasp the matter faced by the purchasers, stores, questionnaire has been generated as methodology in gaining information for the project. The answer from the respondents is accustomed know their problems and benefits that they think they will get from the system. 20 to 30 respondents have participated within the data gathering. The questions are divided into two parts, seller part and buyer part. there's no scope for the target respondents hence it's hospitable all to answer. The questionnaire is finished through Google Forms and distributed among potential users of our website in national capital and Selangor area. Business Model

Canvas (BMC) (Osterwalder, A. & Pigneur, Y., 2010) is additionally been produced to understand how the system can generate money and profit. so as to grasp the what the customer needs through their views, Value Proposition Canvas (VPC) (Osterwalder, A. et al. ,2014) has been created. this can be done to understand what are the factors that fit into customer needs. Besides that, EM (Osterwalder, A. et al., 2014) is produced to understand the economic process, competitive analysis, macroeconomics and therefore the foresight of the system.

2.SYSTEM DESIGN AND IMPLEMENTATION:

- HTML, CSS, JavaScript are used for the planning and implementation of the webpage of the project.
- MYSQL Lite is employed for creating the info base of the system.

2.1. SYSTEM DESIGN:

Home page:

This is the initial page displayed after user logging in successfully. it'll display the most recent books with name and image which are available within the store and its Scanner, Contact, My Cart.

My Cart:

In My Cart the customer are going to be able to access a go-cart that contains all the products he/she has selected. The customer will able to see the merchandise with name, price, quantity and total price and customer are allowed to feature or delete a book. within the full overview the My Cart contains all the things selected by the customer and total cost of the chosen items giving five for excellent, four for specific, three permanently, two for normal and one for low.

Checkout:

On that page customer can verify the products added in the cart and increase and decrease the quantity then proceed towards the final checkout.

Guard Page:

Here we have provided guard app to the guard for product verification purchased by the customer during the final checkout. Guard can verify the Qr code and will get bill on the screen, then guard can verify the products.

Admin Login:

The Admin Login has the special functions like



Adding new book into the shop.

Deleting the book which don't seem to be available in shop.

Deleting the unauthenticated user the web site of the bookstore

Adding a brand new category of the books

Login

Use: allows the Administrator to access all the functionalities of Online Book Store by logging into the account using the username and password.

B. Management of the Orders

Use: the administrator can remove or add an order, he can try this by his management rights.

3. CONCLUSION

The system was design in such a way that future modification can be done easily. The following conclusions can be deduced from the development of the project:

Automation of the entire system improves the efficiency.

It provides a friendly graphical user.

It will provide the facility to the user so that they can keep tracks of all the orders they ordered.

Shopping becomes so easier.

System security, data security and reliability are the striking features.

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