Online Shopping System

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Abstract: The average percent of shopping online is greater than half of the total population and the platform is highly profitable. Hence, this paper aims to develop an online shopping system that can be used and monitored only within an organization. No outside party can access the portal or shop on it. The technology helps the members of the organization to have an additional income by selling their products on the website developed. This also helps in bringing out the talent of an individual as a craftsman and also develops their marketing skills. The organization is also benefited along with its employees by taking a small percentage of income from the products sold. The products' availability, shipping, delivery time, delivery date, customers frequently using, product sellers, etc. are regularly updated and maintained in the database.

Keywords: Database - MySQL, Portal - Dot.Net.

1. Introduction

Due to the pandemic situation, the world shut down and it was completely dependent on the internet. According to the survey, the entire population of the world is around 7 billion, and almost 24 million people were found using a particular website at the same time. This indeed proves the amount of dependency on the internet. The most outreaching and targeted field on the internet is online shopping websites. This is the reason the ONLINE SHOPPING SYSTEM was developed. This system has three different modules. The admin module is used only by the admin. The admin is responsible for generating the user id, maintaining the consumers and seller's database, the product availability, and delivery. The user module consists of the web page where the user can view and add products to the cart and buy those using online payments or COD. The seller module consists of the page where he could only add the products and check the number of products available. Every module has a different user id and has a different purpose. The page is designed in a way where the user finds two tabs, one for shopping and the second for the recent updates presented in the organization such as events to be conducted and the achievements made by the employees or the technology being spoken in the world around or the company's status in the market. These updates can be done only by the admin.

2. Review on Literature

From the recent survey on online shopping during the COVID – 19 has been reported that 14% of the population starts newly to shop online where 56% of the population increases their purchase and the stoppage of online percentage is only 6%

of the total. The survey conducted by UNCTAD and Net comm Suisse e-Commerce Association has noted that the travel rate has demolished whereas the online shopping rate has increased to more than 6 - 10%. They also believe that the range might decrease after this situation but not really to the fullest. More than 50% of the added grocery to the cart once in a week or more which proves that the growth of the market is still to peek. As an overall review, it is said that 40% of the population have spent \$100 on online shopping other than groceries every month. The remaining wish to spend \$50 every month.

3. Related Work

From [1] the amount of online shopping is higher than that of physical shopping. The age of 18-33 are more attracted towards the internet and are fonder of shopping. From [2] it is made sure that online shopping is very famous among people and they need it more. It also defines the age group of people who can be attracted. From [3] the comparison of product, consumer review, time of delivery, price comparison, and other factors are found and it provides a wider view of the requirement of online shopping. From [4] the problems and recent trends in online shopping can be understood. From [5] the impact imposed due to online shopping and the difficulties are to be faced and the security of the system is described.

4. Proposed System

The proposed system can be used only within the organization. No non-organization member can buy the product. The benefit of the proposed system is that the sellers have a smaller circle to sell the products and the other legal documents need not be created by every individual seller as the documentation would be submitted in the name of the organization.

5. Software Used

1) Windows 10

Windows 10 is an operating system which is developed by Microsoft. Its interface is user – friendly and it overcomes all the shortcomings of its previous version windows 8.1. The security in windows 10 is higher than the others and it is been developed according to the standards of FIDO Alliance.

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Fig. 1. Windows 10

2) Visual Studios 2008

Visual Studio is an Integrated Development Environment (IDE) that was developed by Microsoft. The web application was developed using the Visual Studio software. The visual studio platform has a built database design and also supports the SQL server 2008.



Fig. 2. Visual studio

3) SQL server 2008

SQL Server 2008 is a relational database management system. The software was developed by Microsoft. Its main purpose is to store and retrieve data and transfer to application in need of the information. The software was written in C and C++. The data storage is in the form of tables i.e. rows and columns.



Fig. 3. SQL server

4) Within an organization

The organization is benefited by taking a small percentage according to its norms which helps the growth of the organization. The individuals are free to sell products using their consumer login. As the portal is used within an organization, in terms to produce higher marketing the organization provides additional offers as a part of their contribution which benefits the consumer.

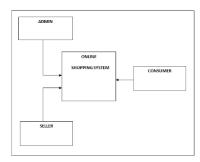


Fig. 4. Flowdiagram

5) ASP.NET



Fig. 4. ASP Net

ASP stands for Active Server Pages, a Microsoft technology. ASP runs inside a browser. When the browser calls for a simple HTML page the ASP sends the request to the server and the server returns a file. The default language used in ASP.NET is VBscript which is Microsoft's lightweight Visual Basic.

6) Java script



Fig. 5. Java script



Fig. 6. SQL

JavaScript is a simple programming language used in web development It is the most famous programming language among coders. It is a language that is used alongside HTML, CSS. The language does not support networking, storage, and graphics. JavaScript supports the structured programs from C.

6. Implementation and Working

Implementation is one of the most an important process in the development. Every module was tested individually with data stored. The admin is responsible for maintaining the users and log in. The user can log in using the provided user id and password. The product can be purchased using online payment. Once the product is purchased, it can be viewed by the user in the orders tab. The user can track the shipping details and delivery time of the product. The seller has a different login and can upload the products using that login. The seller can see the stock availability of the product. The admin maintains the overall record of the process taking place within the software.

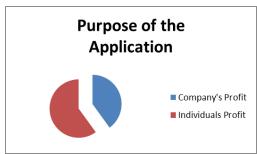


Fig. 7. Purpose of application

In random, if considered a single employee sells for Rs. 500 a week and the organization takes the 20% profit from it. Then in a year the employee would have sold for about Rs. 20,000 and the organization would have made a profit of about Rs. 5000 from single employee's sales. Then when considered for the entire organization then it would make a ratio of minimum 60:40 for the employees and organization respectively. The purpose of reducing the profit percentage of the organization to 40 is because the offers provided to consumers may reduce the income. These offers are provided to increase the number of the consumers.

7. Result

The software is used for shopping within an organization. The software is developed using ASP.NET, DBMS in Visual studios, and SQL Server. The Online Shopping System benefits both the organization and individual employees of the organization.



Fig. 8. Login

8. Conclusion and Future Work

The Online Shopping System helps the members of an organization to purchase and sell goods on their own. It is userfriendly and the number of errors is reduced. It also notifies the error if the input is wrong. In the future, the module can be updated where the delivery process can be updated through a phone message. The page along with news updates can have pages where people can interact as a social platform such as Instagram, Facebook. The consumer can also have direct contact with the sellers. The database is a collection of data stored for retrieval in the future by the application. The relational database is one of the popular ways used to store and maintain data. The data is stored in tables and they are retrieved by using keys. It is used in most web-based developed projects.

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