

Radio Frequency Identification Stock Control System

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Proposed System

Overview

The main purpose of the system is to ensure optimum stock levels and minimize stock wastage leading to increased productivity and profitability. The system that would be incorporated by Marks and Spencer would be RFID (Radio frequency identification stock control system). The system would be able to effectively control Marks and Spencer's stock-related Activities. Moreover, it would also aid in reducing costs such as storage costs due to overstocking. (GS1, n.d.)

Specification And Features Of The System

- Analysis of total purchase and sale of stock
- Has options that are customizable for easy usage
- The inventory data is displayed clearly, and the interface is user-friendly
- Enhances customer relationship management as it maintains a record of customers.
- It would display accurate stock-related information and would ensure security throughout the operation of the retailer, i.e., Shopping.
- It involves automated calculation, saving time.
- It maintains numerous databases to Store stock information
- Minimum errors in transaction

The system basically will work like this:

Marks and Spencer would have an online stock control system in place. The system would display the product information and the current level of stock in the warehouse as well as on the shelves. The items stored would have RFID tags that would allow the quick counting and scanning of the available stock. The RFID would count any item with the RFID tags, and the total stock count would be readily available to be stored in the software. The stock supplied to Marks and Spencer would have RFID tags attached. After reaching the warehouse, the RFID reader would be used to count and scan the stock supplied.

The RFID readers transmit the digital identities of the stock wirelessly. The RFID would be able to scan

the whole container in a matter of minutes and would store the exact count of stock automatically in the server linked to it. There exist numerous servers and software on the market that can be purchased by Marks and Spencer to use along with the hardware RFID readers. This software also maintains customer records, thus enhancing customer relationship management. Moreover, RFID software also offers services such as reporting, security management, and items entry and purchasing. The stock can be scanned from time to time by using RFID readers to keep updated with the stock levels and automatically store stock information in the database for the purpose of reordering. The servers can also be linked directly to the e-commerce website of Marks and Spencer to maintain an updated record of stock in demand and available quantity. (Want, 2006)

How Organizations Can Conduct Business Transactions Over the Internet

Secure electronic payments are a key factor in the success of e-business. It is also important to analyze how private individuals and organizations make payment transactions over the Internet. All transactions can be divided into

- credit card transactions
- digital money and electronic wallets
- smart cards

Credit Card Transactions

- It is the most popular and widespread method of payment on the Internet.
- Primary resistance to safety-related issues: 95% of retail transactions are carried out through credit cards
- Transactions on credit cards in the network (Online) Authorization determines the availability of the required amount of money on the account to complete the transaction

Electronic Wallets

- Store your account details and address so that when operating on member sites, this information is entered with a single click.
- Store electronic checks, electronic money, and credit card information
- Credit card companies offer various electronic wallets
- Electronic wallet Visa
- The electronic wallet allows you to make purchases with one click on the participating sites.
- The Electronic Wallets Manufacturers Group has developed a standardized technology using the Electronic Commerce Modeling Language (ECML)

- Alternative methods of payment by consumers
- Checks or money orders sent by regular mail
- Direct Letter of Credit (COD)

Smart Cards

- A card with a built-in computer chip containing more information than an ordinary magnetic stripe card
- To read and update information on a smart card, it is necessary to place the card on a special device by reading/writing information on a smart card.

Advantages And Disadvantages Of Using The Internet As A Business Tool

What is e-commerce?

E-commerce is a sphere of the economy that includes financial and trade transactions, the implementation of which takes place through computer networks.

Advantages And Disadvantages Of E-Commerce

Advantages

E-commerce, for many modern businessmen, has become an integral part of life. This is not surprising because the benefits of e-commerce are obvious:

- The opportunity to reach the global market. The needs of not only the national but also the international market are serviced here. Prospects for e-commerce are huge, as business is not limited to geographic boundaries. With the help of this commerce, even small businesses are able to access the world market.
- This a unique opportunity for the client to choose not-so-expensive and thus high-quality goods. There is such an opportunity for consumers to easily research the product of interest and learn about the manufacturer. Shopping online is always very fast and convenient. In addition, there is the opportunity to review the reviews of those who have already purchased the goods or used the service.
- For companies and firms, this type of commerce reduces the costs associated with marketing, customer service, and storage and processing of information and contributes to better customer service. There is such an opportunity to process and collect information about the behavior of

buyers.

Disadvantages

- Distrust of buyers. Although many online purchases have become commonplace, there are still those who do not trust the sellers on the Internet and prefer to buy in offline stores and supermarkets.

References

GS1. (n.d.). EPC/RFID. <https://www.gs1.org/standards/epc-rfid>

Want, R. (2006). An introduction to RFID technology. IEEE Pervasive Computing, 5(1), 25–33.
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