

School of Information Technology and Engineering

Title: Online Electronic Store Management using Dolibarr

A PROJECT REPORT

For

Cloud Computing

Submitted By

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Abstract:

Online Electronic shop management system is a system which will help the owners of the electronic equipment shops to carry out the day to day businesses in a smooth and organized way. This system is developed specifically to ease the needs of the Department of sales and purchase. The Online electronic shop management system complete project gives the complete details of the electronic shop management application in detail. In addition to this the application also supports feature to generate different kinds of reports that is maintained through this application. The user interface must be simple and easy to understand even by the common man. This will be one of the interesting applications that one can work on and implement in real time world. This system becoming an essential to efficiently manage inventories in computer age. Online Electronic Shop Management System is a workable application for retail store inventory and accounts management. It keeps a list stocks and products at Astore and can-do operations on them.

Project Description:

Tool Used: Dolibarr

- Dolibarr Cloud CRM is an open source, free software package for companies of any size, foundations or freelancers. It includes different features for enterprise resource planning (Cloud) and customer relationship management (CRM) but also other features for different activities.
- ➤ There are several feature modules that can be enabled or disabled, as needed. This software is free under GNU General Public License 3.0. It is a web-based application and can therefore be used wherever an internet service is available. Dolibarr aims to offer free open source Cloud and CRM features for people with no technical knowledge, by providing a simple solution.
- ➤ Dolibarr includes all the important features of an Cloud CRM suite. It is modular and is thus characterized by its ease of installation and use, despite the large number of features.

Main Features of the tool (Dolibbar):

- > CRM / Sales Management
- > CMS and Website Management
- **E-Commerce**
- ➤ Product and Stock Management
- > Finance and Billing
- ➤ Productivity Management
- > Marketing
- > Integration

Devices Supported:

- > Linux
- > Android
- ➤ iPhone/iPad/Mac
- > SaaS

Customer Types:

- Small Business
- ➤ Medium Business
- > Freelancers

Literature survey:

- 1. This article provides a way to categorize online retail stores based on a sample of 137 such stores taken in August 1996. The technique uses 35 visible characteristics of these stores and their websites as the input to classify them into groups. Statistics for 44 variables were used to give an overview of the important attributes and features of these stores. Further analysis using cluster and factor techniques resulted in the identification of five separate categories of web catalog interfaces: large stores, stores focused on promotions, simple sales stores, single-page stores, and stores that only list products. The main differences between these stores were found to be in terms of their size, the services they offer, and the quality of their interface.2015-peter Spiler.
- 2. With the rise of e-commerce, there is a growing demand for new payment systems that go beyond the traditional methods. All parties involved are exploring different forms of electronic payments, which can be categorized

into four main types: online credit card payment, electronic cash, electronic check, and smart card-based payment systems. These payment systems each have their own pros and cons and it is important to consider factors like security, convenience, cost, anonymity, control, and traceability when making a choice. Researchers approach the comparison of these systems by examining what is being transmitted over the network and evaluating the requirements, features, and suitability of each one. 2010 - Singh Sumanjeet.

- 3. The paper presents research on how consumer choice between online and offline channels is influenced by various parameters such as transportation costs, disutility costs, and prices of retailers. The study uses data from Amazon to analyze consumer behavior in 1,497 locations in the US. The results show that the opening of a local store leads to decreased online purchases and that offline transportation costs are significant factors. The study also reveals that offline entry reduces consumer sensitivity to online price discounts, but there is no clear evidence that the product line at a local store affects purchases. Overall, the results provide support for existing models of channel substitution. 2022- Anindya Ghose, Avi Goldfarb.
- 4. These days, everyone needs to use e-commerce technologies, which are important for both consumers and business players. The intention to use E-Commerce technology is not widely shared among practitioners, especially in Malaysia's retail sector where many businesses continue to choose for expensive traditional marketing. The research applies theoretical frameworks and models to actual scenarios in order to build a value proposition in the real world by employing 11Street as the company under investigation and contrasting it with Lazada as a significant competitor in the industry. 2019-Nurhizam Safie Mohd Satar.
- 5. This study looked into the factors that contribute to the disparities in search effort across online and offline settings. An experimental method was employed to replicate actual search conditions in a variety of scenarios in order to evaluate hypotheses. Two products from the fields of computers, communications, and consumer electronics were chosen as the experimental ones. Results showed that the primary cause is the distinction between the perceived prices of searches and price sensitivity in online versus offline contexts. Understanding the motivations behind search behaviour can aid online merchants in strategically manipulating these aspects to decrease consumers' search effort and hence increase the effectiveness of consumers' purchasing decisions. 2018- Yu-Ping Chiu, Shao-Kang Lo.
- 6. Digital Electronic Shop is a place where customers come to purchase daily using products. These digital electronic shops chains are attempting to reduce

- the labour cost by shifting to digitalization. Ye, F.; Liang, L.; Tong, Y.. IEEE Transactions on Engineering Management.
- 7. Ordering products is not only a complicated but also detail eland unavoidable task in IC test industry for clients order to make the moto differentiate their from different grades and increase yield by increase their manufacturing process to make products.2019- Kazmin, Amy.
- 8. Call Detail Records(CDR) are the computer records produced by a telephone switch containing details of calls that passed through hit based on the telecommunication details works on calculating the bill payments. Being a Computer Technology understudy, we needed to be going to the business office to take in some essential deals and administration strategies to build our scholarly comprehension on the current venture which would be extremely testing. Building a standard Electronic store administration framework was not a simple undertaking taking the issues of existing manual framework.2018- Barrett, Clear.
- 9. In India, e-retailing has grown to be a prominent player in the retail sector. Three companies—Flipkart, Amazon, and Snap Deal—compete fiercely against one another. In Indian online shopping platforms, these merchants enjoy a substantial competitive advantage over other merchants when it comes to electrical items. Therefore, the aim of this article is to comprehend and analyses how satisfied Indian consumers are with their overall perception of buying electronic goods from these e-commerce businesses. To comprehend customer happiness and consumer perception, we have used hypothesis testing and analysis of variance. The findings indicate that Flipkart has the greatest overall customer happiness. Other factors that influence a customer's view of online buying are the product's quality and physical appeal. 2020 Gunjan Malhotra, Ranjana Aggarwal.
- 10. Several industries are impacted by cloud computing, including: e-learning, healthcare, and e-commerce. It provides online services with a high level of economic value and at a low cost. It is without a doubt the upcoming revolution in both the corporate and Internet worlds. More e-commerce businesses are now utilising cloud computing to create great practical value. This paper provides an overview of cloud computing in e-commerce by examining multiple definitions for both concepts, emphasising the advantages and difficulties of using cloud computing in e-commerce, and presenting data from a literature review. 2019- Tamara Almarabeh, Yousef Majdalawi
- 11. According to the current circumstances, Chinese e-commerce enterprises are growing more quickly, and e-commerce platforms' sales records keep breaking. However, because of this quick progress, several issues have come

to light. There are numerous basic distinctions between the risks encountered by traditional e-commerce organisations and traditional enterprises because B2C e-commerce business management approaches diverge from traditional business management methods. The risks that e-commerce businesses confront are more complicated and unclear than those encountered by traditional businesses, and the corresponding risk management strategies have not kept up with the rate of B2C e-development commerce's and are still in the exploratory stage. The need for e-commerce data management model study is important given the prevalence of online shopping and its wide range of applications. 2021 - Hailan Pan and Xiaohuan Yang.

- 12. With the quick development of new economic construction, a variety of information competence is growing in today's technological world. By applying the cutting-edge cloud computing business model, businesses have found a solution to the issues of a lack of resources, a skilled workforce, and technology—all of which are essential for running successful e-commerce operations. Through ecommerce applications, cloud computing may play a crucial role in enhancing business processes, resulting in better financial value for businesses. Consequently, it has been suggested in this research that Cloud Computing assisted Enterprise Resource Planning (CCAERP) be based on an e-commerce application for enterprise administration. 2021 Xiaotian, Shanmugan Joghee, Abdul Salam Mohammed
- 13. The phrase "cloud computing" has gained popularity in recent years. When it comes to pricing, security, availability, and IT resources (hardware, software, and services), cloud computing can help small and medium-sized businesses (SME's) with a variety of issues. In order to please their consumers and generate good profits, Small and Medium-Sized Enterprises (SME's) must provide excellent customer service through e-commerce. These businesses had to deal with a variety of problems and difficulties, including a lack of resources, security concerns, high implementation costs, and others. This essay examines the benefits of cloud computing, the problems that small and medium-sized businesses (SME's) in the e-commerce industry encountered, and the ways in which cloud computing might address these problems. 2019 Samer Jamal Abdulkader, Abdallah Mohammad Abualkishik.
- 14. Multiple computing paradigms, most recently cloud computing, have emerged as a result of significant technological advancements in the information and communication technologies (ICT) sector over the past few decades, with internet services and virtualization techniques showing the most notable improvements. Many major cloud service providers throughout the world offer a variety of cloud services and solutions that people and organisations

- can use. As a result, more companies are moving to the cloud, which is fueling the growth of the cloud services sector. While there are many ways in which cloud technology can benefit businesses, there are also risks and problems associated with this concept. By making it simpler for people to buy and sell goods, cloud computing helps Ecommerce. The concept and characteristics of cloud computing are explained in this essay. 2022 Mayasim A. Abdulkadim Altemimi and Abbas H. Hassin Alasadi.
- 15. One of the newest technologies in the field of information technology is cloud computing. Cloud computing has evolved over the past few years from a theoretical idea to actual applications in telecommunications and healthcare. To manage user data and applications, cloud computing employs the Internet and remote servers. Customers and enterprises can access their personal files, data, and information from anywhere in the globe using the internet and use programmes without installing them. Different kinds of software programmes are currently operating in the cloud computing environment. One of the key services of cloud computing is e-commerce. To satisfy them, small and medium-sized businesses must offer better services through e-commerce. 2020 - Satinder, Niharika.
- 16.E-commerce website accumulates a large number of customer reviews for merchandise and online shopping services. E-commerce enterprises and manufacturers could get customer opinion to improve service and merchandise through mining customer reviews. 2020 Abbas H. Hassin Alasadi.
- 17.Online store is convenient than a physical store, but the development of China's Internet store also in its infancy. Many literatures for the network study the trust, however, most of them studied before buying and e-commerce environment. My study hopes to buy a whole online store for the flow-way trust the focus of the theoretical study to explore the impact of today's trust. Yukun Cao Lu Sun 31 December 2017.
- 18. The intention of conducting such the research was to evaluate mediating roles of IT service management on information system success model and IT governance, further boosting E-service quality. A method combining convergent triangulation and an explanatory, follow-up design was implemented. The population engaged middle-up online stores that have marketed products online in five-year time in West Kalimantan. Questionnaires were completed by 99 out of 112 managers. Sandy Kosasi Vedyanto 03 February 2020.

- 19. With the online shopping market growing year by year, how to manage customer relationship has become an important issue for the online business industry. It is worth studying whether the relationship marketing theories of the past based on the physical channels are applicable to the Internet environment. Ling-Chu Huang 19 June 2015.
- 20. The convenience brought by the online store is more than a physical store, but the development of China's Internet store is also in its infancy, at present, there are a number of related thesis for the network which study the trust, but the result observed in the research is related to most of the trust before buying and e-commerce environment of trust. Xu Yongzhi, Sun lu 29 March 2010.

Innovation Component in the Project:

This software, in its current scope, basically enables to automate his/her stock records and ensures smooth management of product service and maintenance Department. The organization has so many departments sand its time is too costly, particularly when there is a long queue of customer, and waiting for the information about the product. Payment of the Product service as per the rules of warranty is quite difficult for the employee of the organization to manage and to provide the information about the product status, a little mistake can be lost of thousands or lakhs so removing all these types of mistakes and anomalies this software is developed, this project is very useful when an old customer came with receipt number and give the customer and the product within seconds, on which further operation can be done.

Background (System Study Details in brief):

The Online Electronic Store Management system has been developed override the problems in the practising annual system. This software is supported to eliminate and, in some cases, reduce the hardships faced by this existing system. Moreover, the system is designed for the particular need of the company to carry out operations in a smooth and effective manner. This application is reduced as much as possible to avoid errors while entering the data. It also provides error message while entering invalid data. No formal knowledge is needed for the user to use the system. Thus, by this all it proves it is user friendly. Online Electronic Store Management system, as describe above can lead to error free, secure and fast management system. It can assist the user to concentrate on their other activities rather to concentrate on record keeping. Thus, it will help organization in better utilization of resources. Every organization, whether big or small as challenges to overcome and managing the information of devices, devices store, company, sales, inventory. Therefore, we design exclusive employ management system. This system will ultimately allow you to better manage resources.

Problem Statement:

Being a Computer Technology understudy, we needed to go into the business office to take in some essential deals and administration strategies to buildout scholarly comprehension on the current venture which would beet remedy testing. Building a standard Electronic store administration framework was not a simple undertaking taking the issues of existing manual framework.

The factors for these difficulties are:

- ➤ Time Consumption
- ➤ Poor Communication
- ➤ Daily Purchases
- Ordering Purchases

Time Consumption:

Manual frameworks are tedious, as the entrepreneur must monitor Electronic deals every day, while refreshing the frame work physically toward the day's end.

Poor Communication:

A manual electronic store administration framework requires representatives and directors to record each time a thing is expelled from the store. In the event that one worker neglects to specify that the last thing has been expelled from the electronic store, a director anticipates that the thing will in any case be accessible for a client amid a deal. Contrasted and a specialized electronic store administration framework, a manual electronic store administration framework does not help the correspondence in the working environment.

Daily Purchases:

Monitoring day by day buys is another troublesome controlling measure with manual electronic store administration frameworks. A manual electronic store administration framework requires the representatives to record the things sold amid a solitary work day. This can be a troublesome assignment, as one representative may lose the rundown of things sold or another may neglect to record ideal.

Ordering Purchases:

A manual electronic store administration framework does not refresh by the day's end with refreshed electronic store.

Importance:

- ➤ Powerful inventory management software takes care of your inventory, purchases, sales orders, payments and full filament.
- ➤ It protects your company from potential damage.
- ➤ Inventory management is important for every business type.
- > It can store accurate data.
- ➤ We can update records with details.
- ➤ Automatic reordering.

Proposed System Overview:

- > System needs to store information about new entry of electronic store.
- > System needs to help the internal staff to keep information of medicines and find them as per various queries.
- > System need to maintain quantity record.
- > System need to keep the record the stocks.
- > System need to update and delete the record.

Challenges:

- ➤ They have workload, so they also have problem in dealing with their customer.
- > At the end they also have problem in calculating their profit, sales, purchases.
- > They also have problem to find specific product.
- > Problem occur when creating invoice and reports.
- > The problem to maintain record of daily transaction.

Assumptions:

The customer, supplier and the electronic details are stored as database in the system. While searching for a gadget in menu, if the specified gadget doesn't exist in stock then the output display as out of stock.

Architecture Specifications:

- > Customer.
- Supplier.
- ➤ Gadget info. Stock details.
- ➤ Billing report.
- > Purchase details.

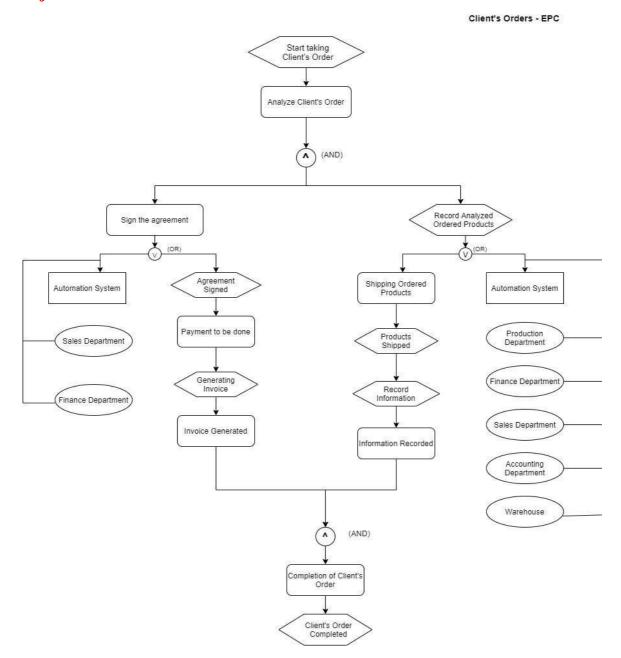
System Design:

Entities:

- Customer.
- Supplier.
- Gadget.

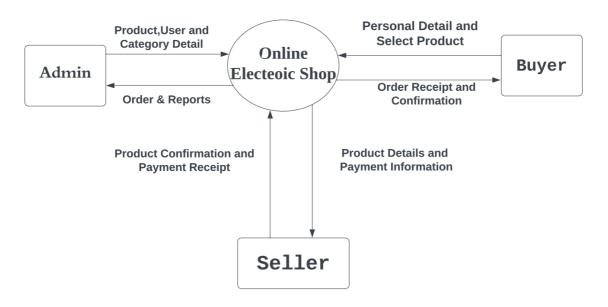
- ➤ Bill.
- > Stock details.

Project Architecture:

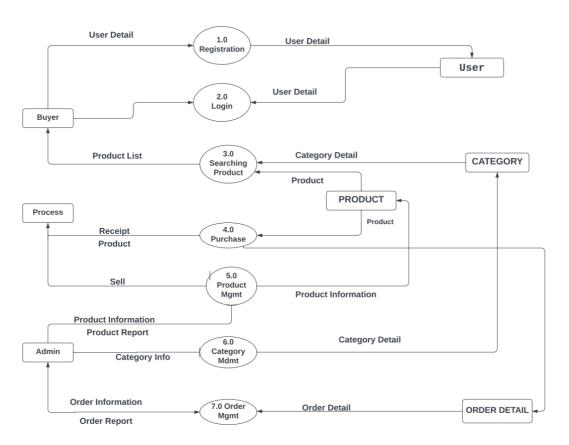


DFD Diagram

Zero- Level DFD



First - Level DFD



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Process Operations:

Marketing/Sales:

Sales and marketing departments can track the customer experience from presale activities, which begin with contacting the customer, through the actual dispatch of the customer's order. Tasks related to customer visits, expenses, shipping, invoicing, forecasting and competitor analysis can be automated and/or enhanced through an Cloud system. Employees can contact customers, follow up on invoices and track orders.

Customer Relationship Management:

Cloud perform also can incorporate customer relationship management (CRM)modules to focus on how a business communicates with its customers. This may include departments such as sales and marketing, and call centre support, as well as functions such as customer interaction data, sales pipeline management, lead prioritization and customer retention.

Supply Chain Management:

Cloud modules supporting supply chain management may feature functions for purchasing, product configuration, supplier scheduling, goods inspections, claims processing, warehousing and more. There are also related modules to manage order processing and distribution tasks. Manufacturing engineering, scheduling capacity, quality control, workflow and product life management are among the core functions that conflicting an Cloud system's manufacturing module.

Accounting/Finance:

By automating and streamlining tasks related to budgeting, cost and cash management, activity-based costing and other accounting/finance functions, Cloud systems can provide businesses with real-time data and insights on performance while also ensuring compliance with relevant financial regulations.

Human Resources:

Human resources modules within an enterprise resource planning system may include tools and dashboards to gather and interpret data on training, recruiting, payroll, benefits, 401(k), retirement and diversitymanagement.HR managers also can monitor and measure key performance indicators (KPIs) for individual employees, job roles and departments.

Modules Developed:

Human Resource Management:

- ➤ Users & Groups.
- Members.
- > Leave Request Management.

Customer Relationship Management:

- > Third party.
- > Sales order.

Vendor Relationship Management:

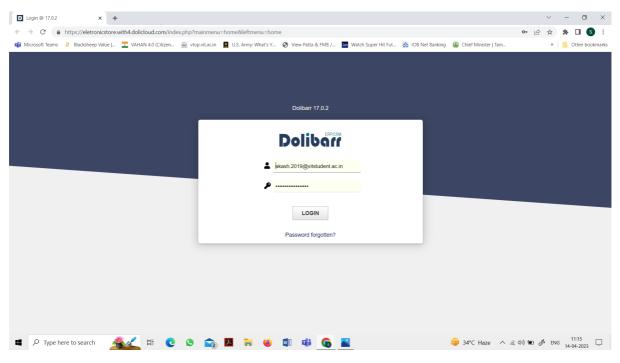
- > Vendor.
- > Sales and Purchase Orders.

Accounting/Finance:

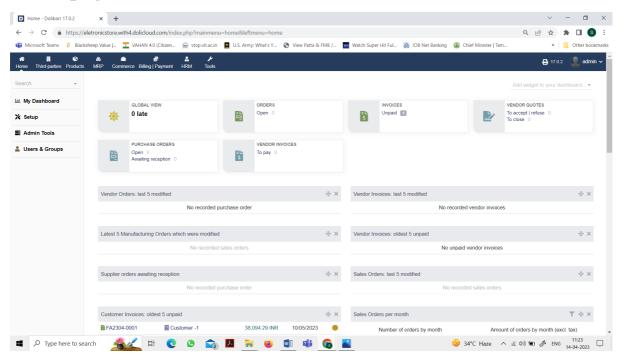
- > Customer invoices.
- Vendor invoices.
- Bank and cash.
- ➤ Billing and payments.

Implementation Screen Shots:

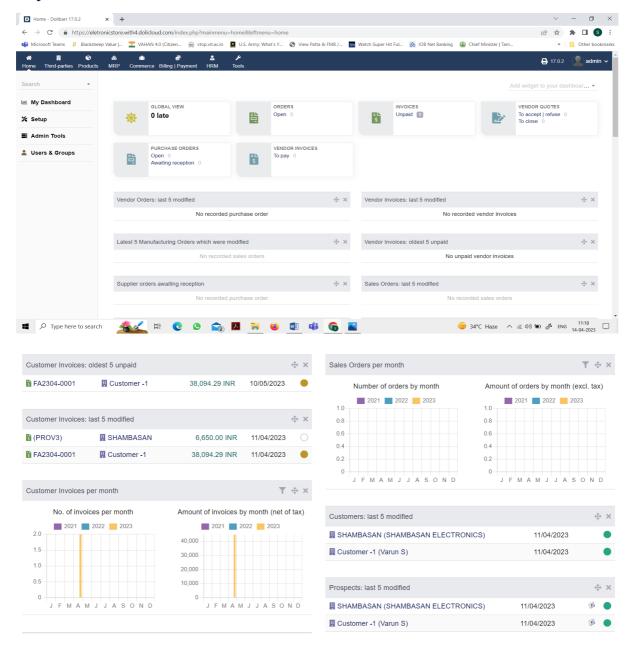
Login Page:

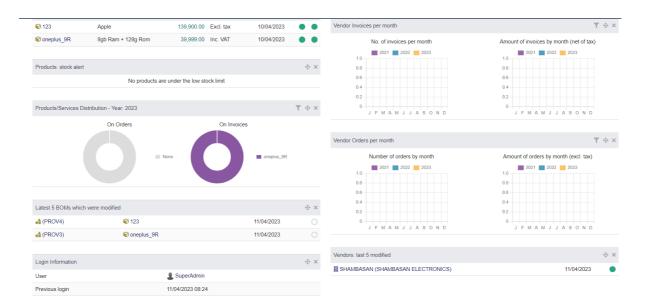


Home page:

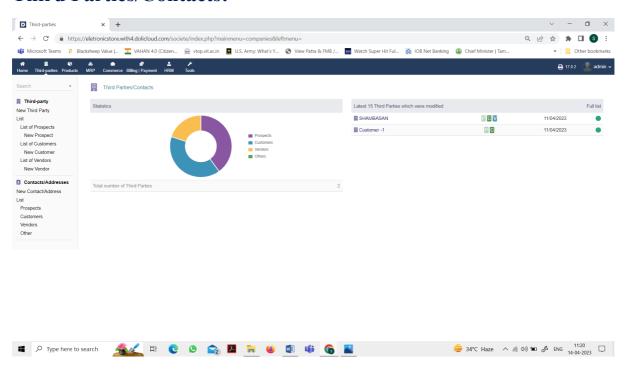


My Dashboard:

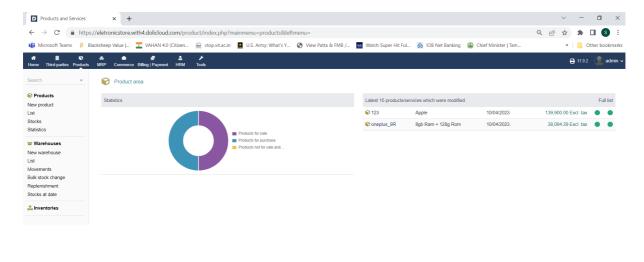




Third Parties/Contacts:

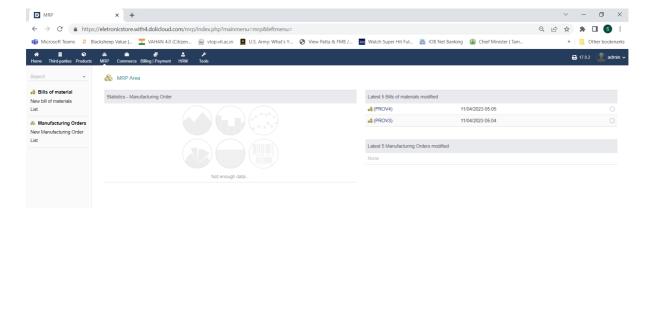


Product area:

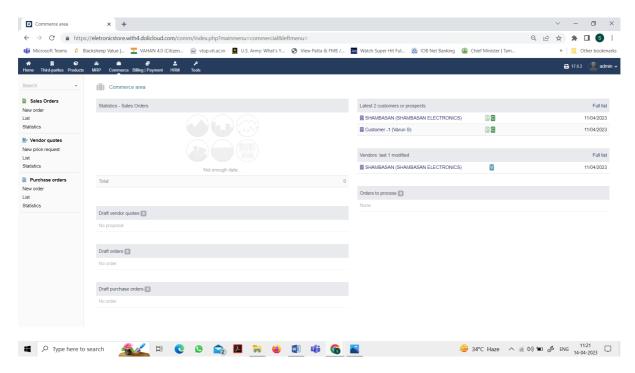




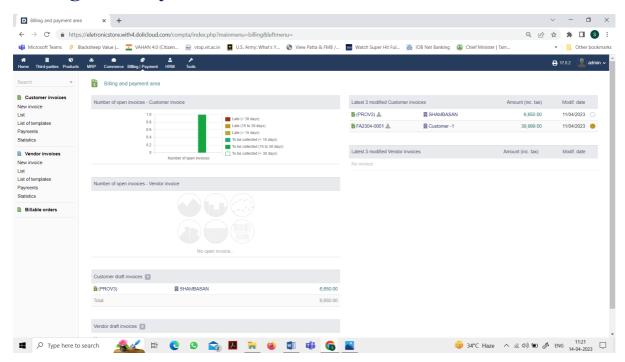
MRP:



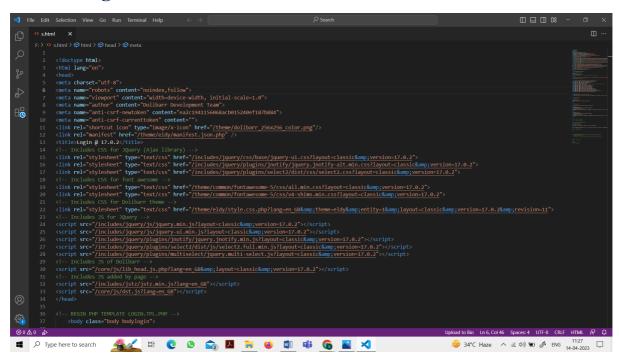
Commerce:

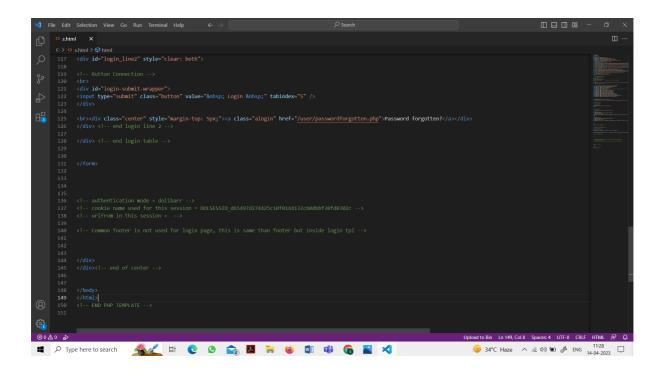


Billing and Payment:



Proof image:





Success and Failure of the Cloud system:

Success of Cloud system:

- Clear understanding of strategic goals.
- > Commitment by top management.
- > Excellent project management.
- Organizational change management.
- ➤ A great implementation team.
- > Data accuracy.
- > Extensive education and training.
- > Focused performance measures.

Failure of Cloud system:

- Lack of Adequate Resources.
- ➤ Most organizations downplay the resources required for Cloud implementation.
- > Inexperienced Consultants.
- > Secondary Customization.
- Project Management.
- > Poor Implementation Strategy.

Reasons:

Realistic Development of Project Schedule and Plan:

Cloud implementations can fail because organizations underestimate the magnitude of the undertaking and develop a project plan with an unrealistic timeline that leaves no flexibility to accommodate delays due to even minoring fore seen circumstances. In fact, these "unknowns" can result insignificant project delays, as the dependencies between activities end to affect project schedule and resource costs because team member aren't effectively utilized. Planning and managing milestones are critical success factors for the execution of a successful Cloud project schedule. While it's important to consider resource loading to ensure the teams equipped to handle the project, it's extraordinarily difficult to maintain fully resource-balanced plan at the task level for a large Cloud implementation.

Appropriate Business Involvement:

Another potential risk area during the Cloud implementation process is lack of appropriate involvement from the functional

areas of the business. Each business process (e.g., Order to Cash, Record to Report and Requisition to Payment) on a large implementation should have a process owner whose full-time job is the success of the Cloud implementation. Process owners should be empowered to make functional decisions about the "tobe "business processes, as well as for scoping, testing and issue resolution. In large organizations, the process owner role may become permanent, continuing after implementation to provide global decision-making, issue resolution and governance for units conducting business with in the same Cloud system.

Organizational Change Management:

The impact the user community has on the overall success of an Cloud system implementation should not be ignored. An Cloud solution will change the way people work in the organization, making their activities much more connected and transparent. Existing business processes are likely to change or even become unnecessary, as might the responsibilities of individual employees. Change management – a planned approach to change in an organization – is vital to providing structure for the workforce's transition and acceptance of the Cloud system. A common mistake is to think of change management as simply "training." A formal change management plans should be developed, and a change management team gathered to work throughout the Cloud project life cycle to support change management issues related to the system's implementation.

Project Management and Executive Sponsorship:

Cloud systems are supposed to promote the flow of information throughout the organization and enhance communication and decision-making. Yet one of the most significant and frequently identified risks to project successes lack of communication and slow decision-making among key stakeholders – such as executive management, the IT organization, business process owners, and compliance. The view that an Cloudimplementation is simply an "IT project" affects lack of engagement by stakeholders. Quite often, core business process owners are assigned responsibility for managing all aspects of the process, from overseeing system design to go-live, even if they have little or no experience as project managers or understanding of Cloud systems.

Technical Infrastructure and Custom Development:

There is a wide range of technical issues – some anticipated informal risk assessment, some not – which can result in delay or failure inaner implementation.

Common issues include:

- ➤ Insufficient knowledge transfer from the system integrator otherling-term support team.
- ➤ Network and service-level issues associated with upgrading or outsourcing of data centres.
- ➤ Insufficient system resources allocated for high demand on middle ware and interface architectures.
- > Stressed network or insufficient bandwidth, especially at remote sites, due to inadequate volume and stress testing of the infrastructure.
- ➤ Ineffective technical change management processes.
- ➤ Inadequate or unproven business continuity and disaster recovery plans.

Conclusion:

The project entitled Online Electronic Store Management was completed successfully. The system has been developed with much care and free of errors and at the same time it is efficient and less time consuming. The purpose of this project was to develop a web application and an android application for purchasing items from a shop. This project helped using waning valuable information and practical knowledge on several topics like designing web pages using HTML, CSS & Dolibarr, usage of responsive templates, designing of android applications, and management of database using MySQL. The entire system is secured. Also, the project helped understanding about the development phases of a project and software development life cycle. We learned how to test different features of project. There is a scope for further development in our project. A number of features can be added to this system as soon as possible.

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