MATERIAL MANAGEMENT AND LOGISTICS

By

T.Alagu

Reg. No 71203621003

of

KUMARAGURU COLLEGE OF TECHNOLOGY

COIMBATORE

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BONAFIDE CERTIFICATE

Certified that this project report titled

MATERIAL MANAGEMENT AND LOGISTICS

Is the bonafide work of

MS. T. Alagu (Reg. No: 71203621003)

who carried out the research under my supervision. Certified further that to the best of my knowledge the work reported here in does not form part of any other project report or dissertation on the basis of which a degree or award was conferred on an earlier occasion on this or any other candidate.

PROJECT GUIDE 21/6/06

HEAD OF THE DEPARTMENT

We examined the candidate with university Registration Number. 71203621003

In the project Viva- Voce Examination held on 29.06.06

INTERNAL EXAMINER 29/6

EXTERNAL EXAMINER 29/6/06

OPTIM TECHNOLOGIES

No. 53/4, Sowdarya Colony, Anna Nagar, West Extn., Chennai - 600101 Phone : 044-26152027

OPTL/ADMIN/69/06 01/06/2006

TO WHOMSOEVER IT MAY CONCERN

This is to certify that Miss.T.Alagu (03MCA03), Kumaraguru College of Technology, Coimbatore has successfully completed the project titled **"MATERIAL MANAGEMENT AND LOGISTICS"** for our concern, under the guidance of Mr. R.Prem (Project Leader). Her effort towards successful completion of the project from January 2006 to June 2006 is appreciable.

We wish all the best in her future endeavors.

For Optim Technologies,

Sureshkumar S

Administrator

ABSTRACT

The Enterprise Logistics Management System is designed to enable the strategic, operational, and tactical business processes that support movement of goods and information. The movement of products and information is vital to modern business and can produce competitive advantage and analytical status of the goods. Without an effective and efficient distribution logistics system, all the businesses are operating sub-optimally. Managing logistics is now a major management task requiring professional experts for implementing cost benefit transportation process for a business scenario.

It enables transporters and third-party logistics providers (3PL) and allows them to provide on-line logistics and delivery services to portals, exchanges or corporate customers using web. It provides application-to-application connectivity between transporters. The focus of the business is to provide data visibility to all levels of management, from the managing director down to the data clerk regarding the goods status and movement. Logistics involves the integration of information, transportation, warehousing, material handling and packaging.

The goal of logistics is to achieve a targeted level of customer service at the lowest possible cost. Logistics objective is to minimize total cost given the customer service objective, where, total costs equals warehousing costs, order processing, information costs and inventory carrying costs.

It involves various processes of Marketing, Purchase, Inventory, Sales, Logistics, Vendor, Administrator, and Reports. Each unit of the application is modulated with redefining the Enterprise Logistics as a powerful application.

ACKNOWLEDGEMENT

I wish to acknowledge my sincere gratitude and heartfelt thanks to our beloved principal, **Dr. Joseph V. Thanikal** and our former principal, **Dr. K. K. Padmanaban** for having given me the adequate support and opportunity for completing this project work successfully.

I express my sincere thanks to **Dr. M. Gururajan** professor and Head, Department of Computer Applications, who with his careful supervision has ensured me in attaining perfection of work.

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I regard my heartfelt thanks and everlasting gratitude to my Project guide **Ms. P. Parameswari,** Senior Lecturer, Department of Computer Applications for uplifting ideas and inspiring guidance, which have been very helpful in refining up the project.

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LIST OF SYMBOLS, ABBREVATIONS AND NOMANCLATURE

CL221	Client
HW220	Hardware Category Code
ET320	Electrical Category Code
PO1123	Purchase Order No
RF10012	Transaction Reference No
VS614	Vehicle Supplier
VD335	Vendor
LM207	Logistics Department
PM103	Purchase Department
SM210	Sales Department
IM300	Inventory Department
AD110	Administrator

CHAPTER 1
INTRODUCTION

1.1 OVERVIEW OF PROJECT

1.1.1 MATERIAL MANAGEMENT AND LOGISTICS

"Enterprise Logistics Management" system is a highly enhanced form of the existing system. The customers are provided with user-friendly interactive system. It automates the logistics company to provide flexible services. The customers are able to order for the delivery of their goods, online. They are updated with the status of their goods. Billing and data processing are handled with accuracy.

Automated online services for the logistics enterprise enhance the facilities with implementing latest technologies. This application enables instant access of information globally for the customers, which increases the customer services, and satisfaction that keeps building the Business volume towards Logistics. Organizational process and information distribution for the Enterprise Logistics Management is implemented using J2EE Architectures. Technologies enable the application with scalability and extended performance measurements for Enterprise Logistics Management.

In this system the customer can do his transactions online and find the rates and other detail regarding logistics, online. He is well aware of the status of his goods throughout the transit.

1.1.2 PROJECT SCOPE

- Online transactions
- High level of security
- Instant data access
- Technology integration
- Price and Location Finder

1.2 ORGANIZATION PROFILE

Optim Technologies is a young, dynamic and aggressively growing Software Development Center in Chennai. Optim offers clients a wide range of IT Services including Web Designing, Customized Product Design and Development, delivering a high quality, cost effective software solutions that meet and exceed client's expectation. Optim gives their clients the power to address their challenges to gain a competitive edge in the IT Market. Optim client base includes a wide spectrum of companies ranging from small start up companies to many industry leaders. Optim believes in developing a strong relationship with their clients and is committed to provide the highest of customer satisfaction.

Optim Technologies is communities to providing innovative Software Solutions to its clients and recognizes the importance of technology. Optim's seasoned software Professionals have expertise in a wide range of technologies including,

- Web Technology
- Client Server Technology
- Database Design, Development and Administration
- Customized Package Software implementation like Accounts
- Healthcare Packages Software

Optim undertakes short term and long-term projects on a contract and regular basis with reputed clients. Optim's goal is to clearly understand their client's need and provide them with real and lasting solutions that meet and exceed their expectations.

Optim recognize the power of technology and information in opening new horizons in business Practices and providing profitable and Practical Solutions. Optim benefits their clients by turning their technological challenges into opportunities that expand their reach and increase their ability to prosper.

Optim recognizes the traditional challenges in every project as well as the Circumstances and goals that make each project Unique. Optim is committed to our vision and solutions that meet and exceed out Client's business requirement while advancing technology and developing innovative approaches.

CHAPTER 2
SYSTEM REQUIREMENT AND SPECIFICATION

2.1 HARDWARE REQUIREMENTS

Processor	:	Intel Pentium III 800 MHz
Primary Memory (RAM)	:	256 MB
Secondary Memory (Hard disk)	:	40 GB
Monitor	:	Samsung, COLOR, 15inch
Display card	:	SVGA
Mouse	:	Logitech
Keyboard	:	Samsung Standard 101 Keys

2.2 SOFTWARE REQUIREMENTS

Operating System	:	Windows XP and above
Language	:	J2EE
Back-End	:	MICROSOFT SQL-SERVER 2000.
Server	:	TOMCAT
Browser	:	Internet Explorer, Netscape, Opera

2.3 SOFTWARE OVERVIEW

2.3.1 Java Server Pages (JSP)

Java Server Pages (JSP) technology provides a simplified, fast way to create dynamic web content. JSP technology enables rapid development of web-based applications that are server-independent and also platform-independent. JavaServer Pages (JSP) technology enables Web developers and designers to rapidly develop and easily maintain, information-rich, dynamic Web pages that leverage existing business systems. As part of the Java technology family, JSP technology enables rapid development of Web-based applications that are platform independent. JSP technology separates the user interface from content generation, enabling designers to change the overall page layout without altering the underlying dynamic content. The benefits of JSP for developers include simple to learn and use, easily extensible.

2.3.2 Servlets

Java Servlet technology provides Web developers with a simple, consistent mechanism for extending the functionality of a Web server and for accessing existing business systems. A servlet can almost be thought of as an applet that runs on the server side–without a face. Java servlets make many Web applications possible. Servlets are the Java platform technology of choice for extending and enhancing Web servers. Servlets provide a component-based, platform-independent method for building Web-based applications, without the performance limitations of CGI programs. And unlike proprietary server extension mechanisms (such as the Netscape Server API or Apache modules), servlets are server- and platform-independent. This leaves you free to select a "best of breed" strategy for your servers, platforms, and tools.

Servlets have access to the entire family of Java APIs, including the JDBC API to access enterprise databases. Servlets can also access a library of HTTP-specific calls and receive all the benefits of the mature Java language, including portability, performance, reusability, and crash protection.

Today servlets are a popular choice for building interactive Web applications. Third-party servlet containers are available for Apache Web Server, Microsoft IIS, and others. Servlet containers are usually a component of Web and application servers, such as BEA WebLogic Application Server, IBM WebSphere, Sun Java System Web Server, Sun Java System Application Server, and others.

2.3.3 JSP Technology and Servlets

JSP technology uses XML-like tags that encapsulate the logic that generates the content for the page. The application logic can reside in server-based resources (such as JavaBeans component architecture) that the page accesses with these tags. Any and all formatting (HTML or XML) tags are passed directly back to the response page. By separating the page logic from its design and display and supporting a reusable component-based design, JSP technology makes it faster and easier than ever to build Web-based applications.

Java Server Pages technology is an extension of the Java Servlet technology. Servlets are platform-independent, server-side modules that fit seamlessly into a Web server framework and can be used to extend the capabilities of a Web server with minimal overhead, maintenance, and support. Unlike other scripting languages, servlets involve no platform-specific consideration or modifications; they are application components that are downloaded, on demand, to the part of the system that needs them. Together, JSP technology and servlets provide an attractive alternative to other types of dynamic Web scripting/programming by offering: platform independence; enhanced performance; separation of logic from display;

ease of administration; extensibility into the enterprise; and, most importantly, ease of use.

The main reasons for choosing JSP and Servlet for this project are:

- The MVC architecture for GUI applications was well suited to JSP/Servlets.
- JSP and Servlets compliment each other well for web applications
- The portable nature of Java which is the basic language for both JSP and Servlets was needed for the project for client systems was multi-platform.
- The easy availability of JSP Engines and Servlet containers
- Servlet Container and JSP Engine

The next consideration was choosing a suitable JSP engine and Servlet container. We chose Oracle JDeveloper 9.05(10g). The choice was for following reasons

- It had both a centralized Servlet Container (Embedded OC4J Server) and a JSP Engine.
- It had a well developed IDE for coding
- Testing and debugging features were available
- Project Management and Repository Features were available

The Analysis stage gave various insights into the module that we had overlooked earlier.

2.4 DESIGN

The module was highly GUI centric and needed more than two-tiers in its application framework. We chose MVC (Model View Controller) as the design for the project. Since it is a one time implementation project with no strict revisions required, the need to follow a strict MVC architecture was analyzed. The architecture was itself analyzed to make subtle changes in the design of the module

2.4.1 Study of MVC Architecture

A design pattern describes a proven solution to a recurring design problem, placing particular emphasis on the context and forces surrounding the problem, and the consequences and impact of the solution. The main reasons for choosing MVC architecture are their reusable nature, providing flexibility to the application and most importantly their expressive power. One of these patters is Model-View-Controller (MVC). Smalltalk defined it in the 70's. Since that time, the MVC design idiom has become commonplace, especially in object-oriented systems.

The goal of the MVC design pattern is to separate the application object (model) from the way it is represented to the user (view) from the way in which the user controls it (controller). The Model object knows about all the data that need to be displayed. It also knows about all the operations that can be applied to transform that object. The View object refers to the model. It uses the query methods of the model to obtain data from the model and then displays the information. The Controller object knows about the physical means by which users manipulate data within the model. A controller translates interactions with the view into actions to be performed by the model.

A block diagram of MVC Model 2 architecture is given below:

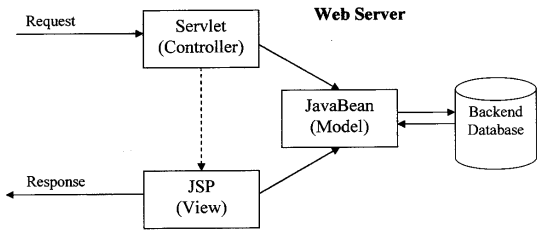


Fig 2.4 .1 MVC Model 2 Architecture

2.4.2 High Level Design

The high level design of the QA Automation Tool is given below:

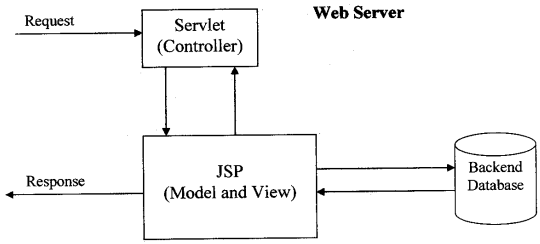


Fig 2.4.2 QA Automation Tool – High Level Design

CHAPTER 3
SYSTEM ANALYSIS

3.1 EXISTING SYSTEM

The current systems process follows manual and tedious process task, which shows distance between the process and operations.

The drawbacks are,

- More man power
- Time consumption
- Order processing delay
- Delay in updating of data
- Inefficient approach
- Lack of information
- Lack of accuracy
- Inefficient inventory maintenance

3.2 PROPOSED SYSTEM

The proposed system provides enhanced functionality and efficient process design that enables the application to facilitate the user with scheduling, better-cost preparation, operational performance improvement and business forecasting and planning.

The features are,

- Provide enhanced Scheduling & Planning Capability.
  Benefits Operational Performance Improvement.
  Superior market understanding and business planning capability.
  Meet various major logistics requirements and can be designed to different requirements and help customers to provide "one-stop" logistics services.
- Integrate information system with customer's legacy systems such as ERP. Provide various modern logistics technologies and can be integrated with various logistics facilities.
- Integrate modern logistics management methods, such as warehouse management, automatic picking.
- Reduce time and improve services towards the logistics application.
- Improve goods tracking and accurate transaction
- Support non-transfer delivery and manufacturing business

CHAPTER 4
SYSTEM DESIGN

4.1 INPUT DESIGN

The input design is the process of converting the user-oriented inputs in to the computer-based format. The goal of designing input data is to make the automation as easy and free from errors as possible. For providing a good input design for the application easy data input and selection features are adopted.

The input design requirements such as user friendliness, consistent format and Interactive Dialogue for giving the right message and help for the user at right time are also considered for the development of the project.

The input forms compromises of login form, which are used by the vendors, and employees to access the Enterprise Logistics Management Services. The purchase requisition form is used to place the requests for the order. The Sales Manager Verify the Order details form and confirm the orders. The order copy form prepared by the Inventory Manager with the confirmed orders. The Logistics use this form. Logistics Manager used this form for transporting goods.

The design decisions for handling input specify how data are accepted for computer processing. The design of input also includes specifying the means by which end - users and system operators direct the system in which actions to take. For example, a system user interacting through a workstation must be able to tell the system whether to accept input, produce a report, or end processing. Online systems include a dialogue or conversation between the user and the system. The arrangement of messages and comments in online conversations, as well as the placements of data, heading, and titles on display screens or source documents, is also part of input design.

The following points should consider while designing the input.

- What data to input?
- What medium to use?
- How the data should be arranged or coded?
- The dialogue to guide users in providing input
- Data items and transactions needing validation to detect errors
- Methods for performing input validation and steps to follow when errors
- occur

In this project all the text boxes are validated. If any field is not filled then it will display the message "fill the text box". The dialogue boxes are used to guide the user while giving inputs. The list boxes are used to reduce the user inputs. He will select one of the items in list boxes. Radio buttons are used to select the options. The following design guidelines will result in a friendly and efficient interface.

- Minimize the number of input actions required from user. This can be accomplished by using the mouse to select from predefined set of inputs.
- In application the user can select the options by using the mouse. The user is allowed to choose priority, mode of transport using predefined set of values.
- Maintain consistency between information display and data input. The visual characteristics of the display(e.g. text size, color etc) should be carried over to the input domain. In this project the status informations are represented by different colors.
- Allow the user to customize input. An expert user might decide to create customer commands or dispense with some types of warning messages and action verification.
- Deactivate commands that are inappropriate in the context of current actions. This protects the user from attempting some action that could result in an error.

- In any form while adding the user can't do modification or view or delete. Once the user pressed the button add it will deactivate all the buttons except save button so that the user can't do any other operations.
- Let the user control the interactive flow. The user should be able to jump unnecessary actions, change the order of required actions(when possible in the context of application).

4.2 OUTPUT DESIGN

The output implementation in Enterprise Logistics Management enables the end user to analyze the business process through effective reports. The reporting system in Enterprise Logistics Management is designed weekly, monthly, quarterly and annually, which enables the enterprise members and customer to view the process status. The application output design is customized based on users input, which will generate the data depending on users requirement. The accessibility of the output design is secured in the system with user authentication and rights.

When designing output, systems analyst must accomplish the following:

- Determine what information to present
- Decide whether to display, print the information and select the output medium
- Arrange the presentation of information in an acceptable format
- Decide how to distribute the output to intended recipient

4.4 TABLE DESIGN

1 Bill Table

Primary Key - bill_no

Field Name	Data Types	Length	Description
bill_no	Char	10	Bill number
bill_date	Datetime	8	Bill date
bill_amt	Float	8	Bill amount
item_code	Char	10	Item code
item_name	Char	10	Item name
item_qty	Int	4	Item quantity
item_cost	Float	8	Item cost
bill_type	Char	10	Bill type
order_id	Int	4	Order id

2 Item Details Table

Primary Key - item_code

Field Name	Data Types	Length	Description
item_code	Char	10	Item code
item_name	Char	10	Item name
item_cost	Float	8	Item cost
warehouse_id	Char	10	Warehouse id

3 Login Table

Primary Key - user_id

Field Name	Data Types	Length	Description
user_id	Char	10	User id
pwd	Char	10	Password

4 Market Details Table

Primary Key – order_id

Field Name	Data Types	Length	Description
order_id	Int	4	Order Id
item_code	Char	10	Item code
item_name	Char	10	Item name
item_qty	Int	10	Item quantity
market_status	Char	10	Market status
location	Char	10	Location
date_required	Datetime	8	Required date

5 Production Registration Table

Primary Key - order_id

Field Name	Data Types	Length	Description
Order_id	Int	4	Order Id
item_code	Char	10	Item code
item_name	Char	10	Item name
item_qty	Int	4	Item quantity
date_curr	Datetime	8	Current date

6 Purchase Details Table

Primary Key - order_id

Field Name	Data Types	Length	Description
order_id	Int	4	Order id
item_code	Char	10	Item code
item_name	Char	10	Item name
item_qty	Int	4	Item quantity
item_cost	Float	8	Item cost
date_current	Datetime	8	Current date
status	Char	10	Status
inventory	Char	10	Inventory location
vendor_id	Char	10	Vendor id
vendor_name	Char	10	Vendor name
price_quoted	Float	8	Price quoted

7 Purchase Registration Table

Primary Key - order_id

Field Name	Data Types	Length	Description
date_of_req	Datetime	8	Date of requirement
date_current	Datetime	8	Current date
item_code	Char	10	Item code
item_name	Char	10	Item name
item_qty	Int	4	Item quantity
item_cost	Float	8	Item cost
status	Char	10	Status
inventory	Char	10	Inventory location
order_id	Int	4	Order id

8 Sales Details Table

Primary Key - order_id

Field Name	Data Types	Length	Description
order_id	Int	4	Order Id
item_code	Char	10	Item code
item_name	Char	10	Item name
item_cost	Float	8	Item cost
item_qty	Int	4	Item quantity
total_cost	Float	8	Total cost
status	Char	10	Status

9 Sales Registration Table

Primary Key - order_id

Field Name	Data Types	Length	Description
order_id	Int	4	Order Id
item_code	Char	10	Item code
item_name	Char	10	Item name
item_qty	Int	4	Item quantity
item_cost	Float	8	Item cost
status	Char	10	Status
location	Char	10	Location
date_required	Datetime	8	Required date
date_orderplacing	Datetime	8	Order placing date

10 Stock Details Table

Primary Key - warehouse_id

Field Name	Data Types	Length	Description
warehouse_id	Char	10	Warehouse id
reorder_level	Int	4	Reorder level
sales_qty	Int	4	Sales quantity
items_sold	Char	10	Items sold
purchase_qty	Int	4	Purchase quantity
items_purchased	Char	10	Items purchased

11 Third Party Bill Table

Primary Key - bill_no

Field Name	Data Types	Length	Description
bill_no	Char	10	Bill number
bill_date	Datetime	8	Bill date
tot_amt	Float	8	Total amount
bill_type	Char	10	Bill type

12 Third Party Details Table

Primary Key - tp_id

Field Name	Data Types	Length	Description
tp_id	Char	10	Third party id
warehouse_id	Char	10	Warehouse id
start_date	Datetime	8	Starting date
end_date	Datetime	8	Ending date

13 Third Party Registration Table

Primary Key - tp_id

Field Name	Data Types	Length	Description
tp_id	Char	10	Third party id
tp_name	Char	10	Third party name
hire_status	Char	10	Hire status

14 Third Party Warehouse Table

Primary Key - warehouse_id

Field Name	Data Types	Length	Description
warehouse_id	Char	10	Warehouse id
warehouse_name	Char	10	Warehouse name
warehouse_locn	Char	10	Warehouse location
warehouse_rent	Float	8	Rent of the warehouse
tp_id	Char	10	Third party id

15 Vendor Details Table

Primary Key - vendor_id

Field Name	Data Types	Length	Description
vendor_id	Char	10	Vendor id
vendor_name	Char	10	Vendor name
price_quoted	Float	8	Price quoted
item_code	Char	10	Item code
vendor_locn	Char	10	Vendor location
status	Char	10	Status
item_name	Char	10	Item name
packaging	Char	10	Packaging

16 Vendor Registration Table

Primary Key - vendor_id

Field Name	Data Types	Length	Description
vendor_id	Char	10	Vendor id
vendor_name	Char	10	Vendor name
status	Char	10	Status
pwd	Char	10	Password

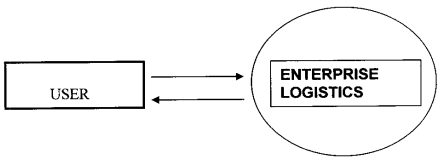
17 Warehouse Details Table

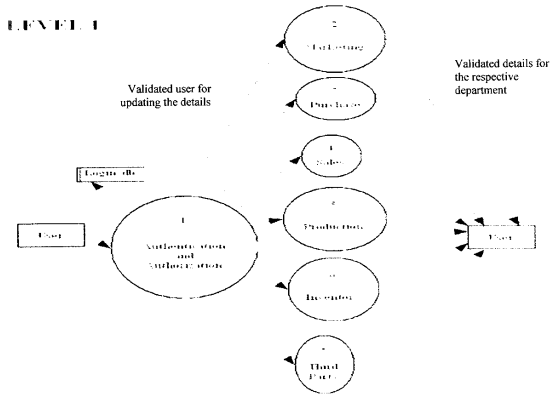
Primary Key - warehouse_id

Field Name	Data Types	Length	Description
warehouse_id	Char	10	Warehouse id
warehouse_locn	Char	10	Warehouse location
item_code	Char	10	Item code
item_name	Char	10	Item name
reorder_level	Int	4	Reorder level
item_qty	Int	4	Item quantity
warehouse_cap	Float	8	Warehouse capacity

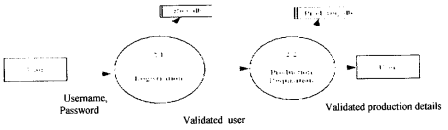
CHAPTER 5
DATA FLOW DIAGRAM

CONTEXT LEVEL DIAGRAM

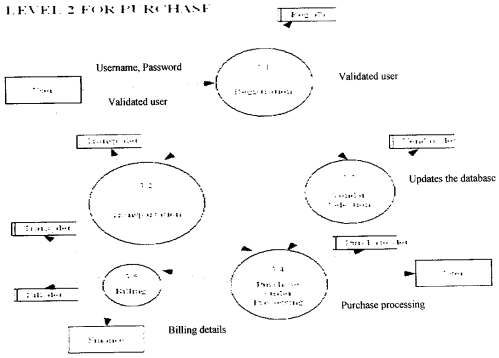




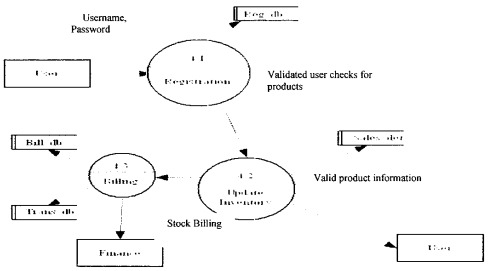
LEVEL 2 FOR MARKETING



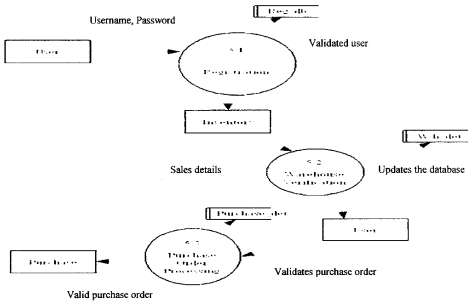
LEVEL 2 FOR PURCHASE



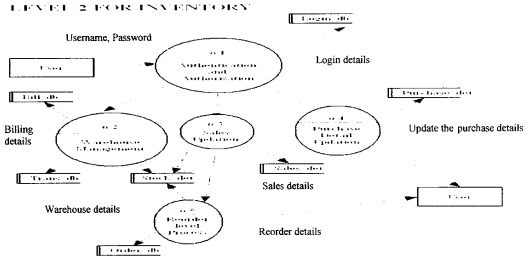
LEVEL 2 FOR SALES



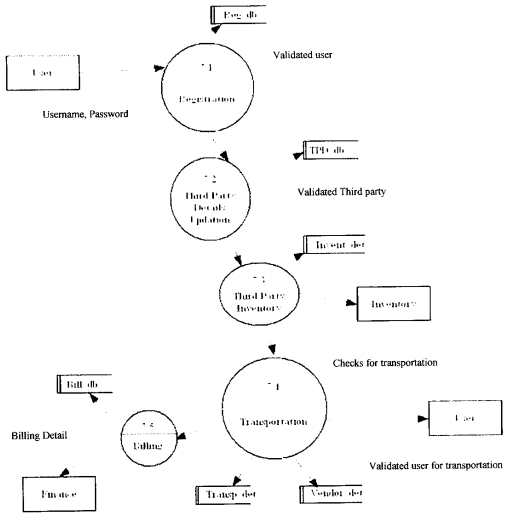
LEVEL 2 FOR PRODUCTION



LEVEL 2 FOR INVENTORY



LEVEL 2 FOR THIRD PARTY



CHAPTER 6

SYSTEM TESTING AND IMPLEMENTATION

Software designed to break down any defense that have been constructed

6.1 System Testing

Software testing is an important element of software quality assurance and represents the ultimate review of specification, design and coding.

Testing Objectives:

There are several rules that can serve as testing objectives. They are

- Testing is a process of executing a program with the intent of finding an error.
- A good test case is one that has a high probability of finding an undiscovered error.
- A successful test is one that uncovers an undiscovered error.

If testing is conducted successfully according to the objectives stated above it will uncover errors is the software.

White Box Testing:

White box testing is a text case design method that uses the control structure of the procedural design to derive test cases.
Using the white box testing methods, the software engineer can derive test cases with the following qualities.

- The test cases guarantee that all independent paths within a module have been exercised at least once.
- The test cases exercises all logical decisions on their true and false sides.
- The test cases execute all loops at their boundaries and within their operational bounds and
- The test cases exercise internal data structures to ensure their validity.

In this project all the modules are tested. The logical decisions are also tested. The bounds in the loops of the project are tested correctly. The internal data structures are validated. In this project the logical conditions of the status of the application are tested. The condition testing method focuses on testing each condition in the program.
Condition testing strategies have two advantages.

- The measurement of the test coverage of a condition is simple.
- The test coverage's of conditions in a program provides guidelines for the generation of additional tests for the program

The program is tested with different conditions. For a compound condition c, the true ad false branches of c and very simple condition is c need to be executed at least once. The test to be derived for a relational expression of the form e1 <relational operator> e2 are tested. The branch and relational operators are tested correctly.

Data Flow Testing:

The data flow testing method selects a test paths of a program according to the locations of definitions and uses of variables in the program. In this project the flow of application numbers from one program to another program is tested. The user name, user password, application numbers are tested in different levels.

Black Box Testing:

The black box testing methods focus on the functional requirements of the software. Therefore, black box testing enables the software engineer to derive sets of input condition a that will exercise all the functional requirements for a program. The black box testing attempts to find errors in the following categories.

- Incorrect or missing functions.
- Interface errors.
- Errors in data structures or external database access.
- Performance errors.
- Initialization and termination errors.

Unit Testing:

Unit testing focuses verification effort on the smallest unit of software design or module. The unit testing is always white box oriented and the step can be conducted in parallel for modules. Unit testing is considered an equivalent to the coding step.

After the source level code has been developed, reviewed and verified for correct syntax. The modules tested in this project are application form, status, modification etc.,

Integration Testing:

Integration testing is a systematic technique for constructing the program structure while at the same time conducting tests to uncover errors associated with interfacing. Top down integration is an incremental approach to the construction of program structure. Modules are integrated by moving downward through the control hierarchy, beginning with the main program module. The module subordinates to

the main program module are incorporated into the structure. The bottom up integration begins construction and testing with the modules at the lowest level in he program structure.

Validation Testing:

Software testing and validation is achieved through a series of black box tests that demonstrate conformity with the requirements. Using java script validates the fields in the application form. It will display a dialogue box while entering the data into the application form.

System Testing:

System testing is series of different tests whose primary purpose is to fully exercise the computer based system. Although each test has a different purpose, all the work should verify that all system elements have been properly integrated and perform allocated functions. In system testing the sub - systems are integrated to make up the entire system. The testing process is concerned with finding errors that result from the unanticipated interaction between sub - system components.

Security Testing:

During this testing, the tester plays the role of the individual who desires to lack the system. The tester may attempt to acquire passwords through external clerical means and may attack the system with custom

6.2 SYSTEM IMPLEMENTATION

Implementation is the last stage in the project where the theoretical design is turned into a working system. Here the most crucial stage in achieving a new successful system and in giving confidence on the new system for effective and efficient results. The change over plan selected is used to chance the existing manual system to the new proposed system.

6.2.1 IMPLEMENTATION PROCESS

The system is developed in such a way that the existing facilities are enough for implementation. The hard ware facilities are made sufficient enough to implement the newly developed.

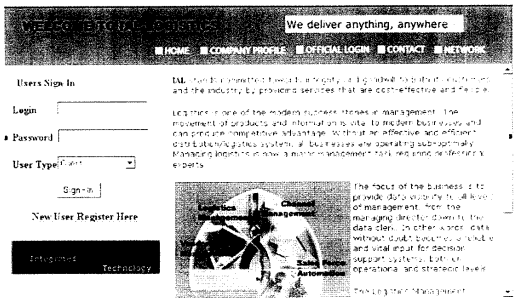
The first step in implementation the approval from the users. The data entry through various screens and reports that the system is capable of producing is shown to the staff.

When the Administrator department is satisfied, he is asking to give approval to the new system. The system has been successfully implemented in the organization with full cooperation of the management. Finally the system is handed over to the organization.

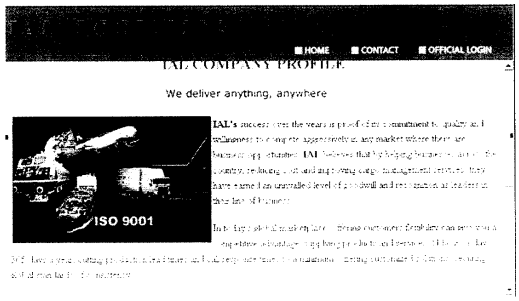
APPENDICES

APPENDIX 1

HOME PAGE



COMPANY PROFILE



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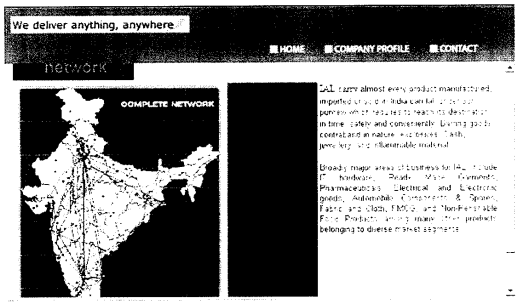
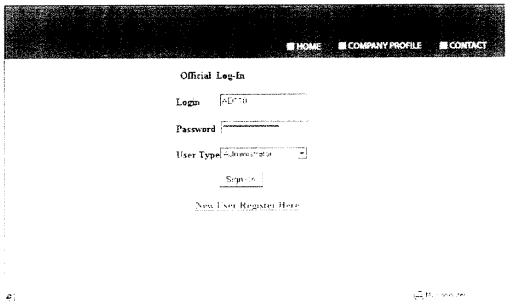
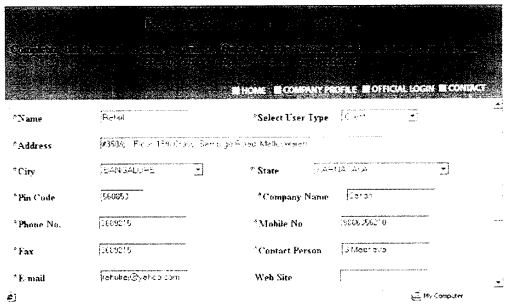


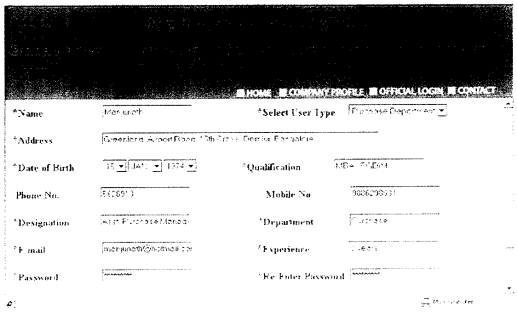
OFFICIAL LOGIN



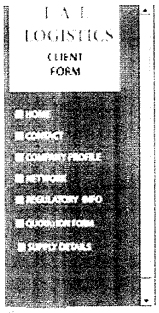
NEW USER REGISTRATION



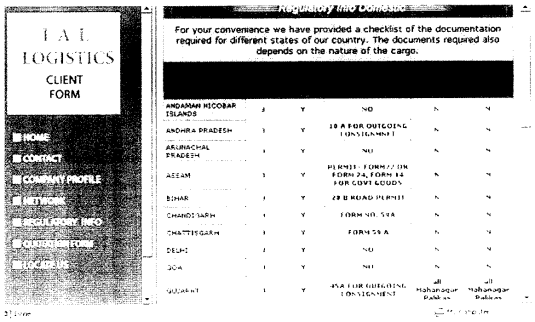
NEW OFFICAL REGISTRATION FORM



CLIENT FORM

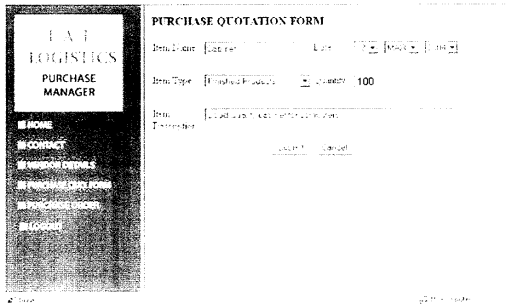


CLIENT REQULATORY INFORMATION FORM

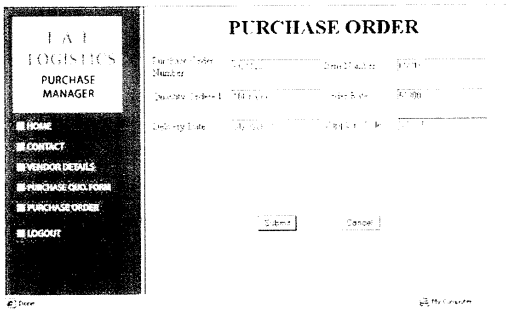


PURCHASE DEPARTMENT FORM

PURCHASE – PURCHASE QUOTATION FORM



PURCHASE – PURCHASE ORDER FORM



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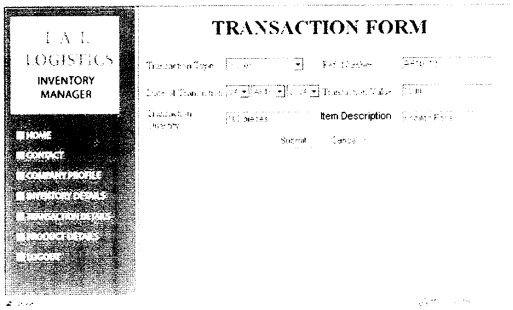
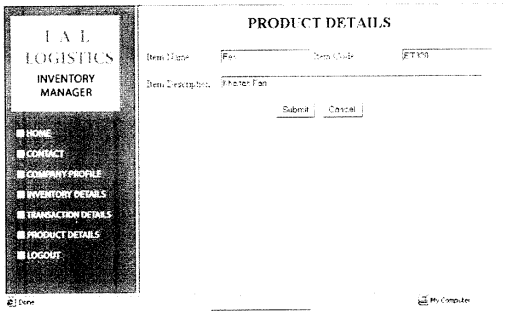
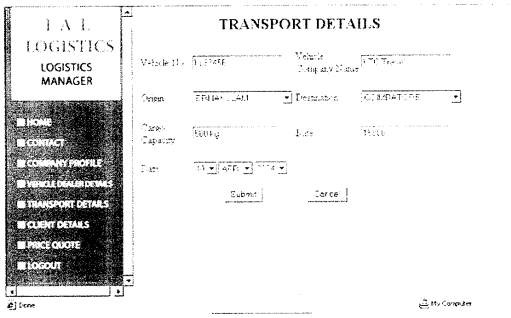


INVENTORY – PRODUCT DETAILS

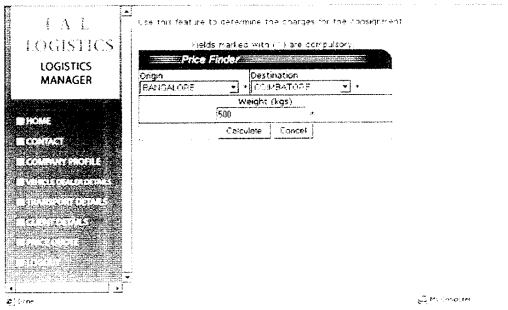


LOGISTICS DEPARTMENT

LOGISTICS – TRANSPORT DETAILS



LOGISTICS – PRICE QUOTE



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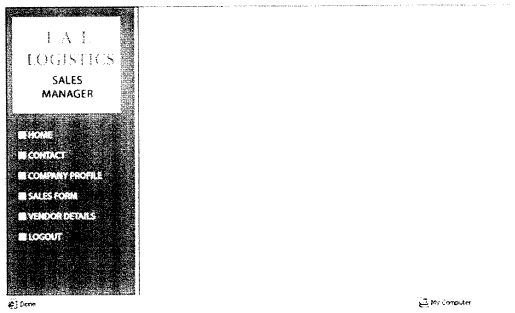

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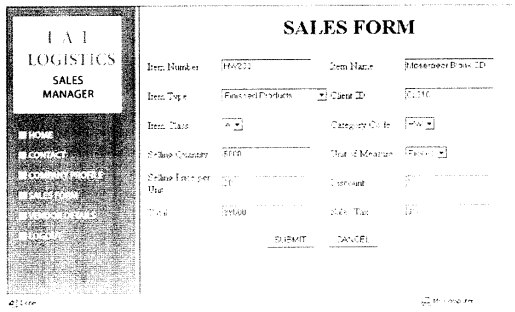
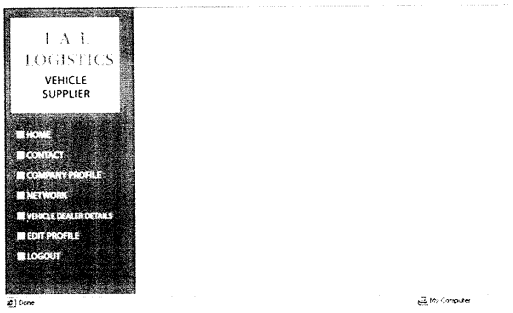
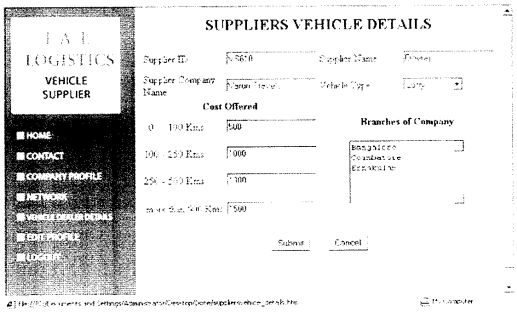


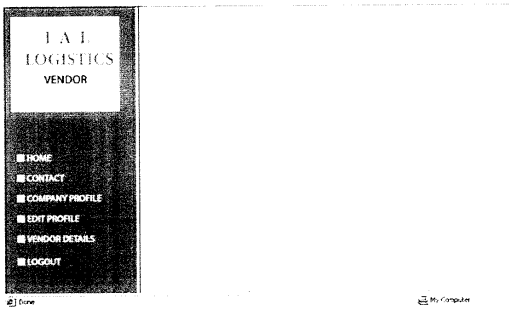
VEHICLE SUPPLIER FORM



VEHICLE SUPPLIER – DEALER DETAILS



VENDOR FORM



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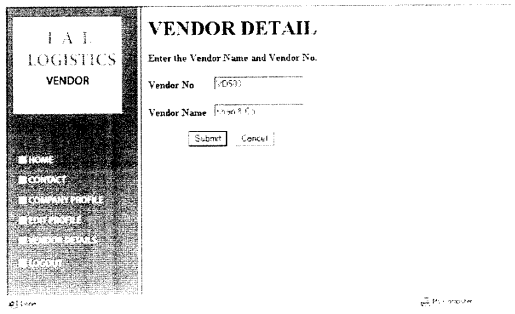
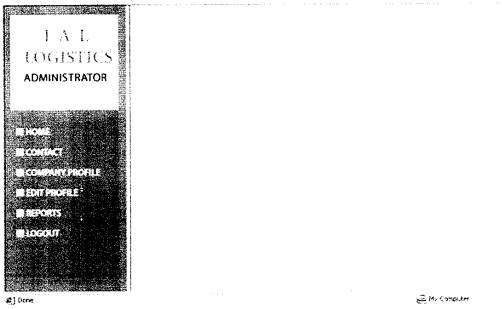


ADMINISTRATOR FORM



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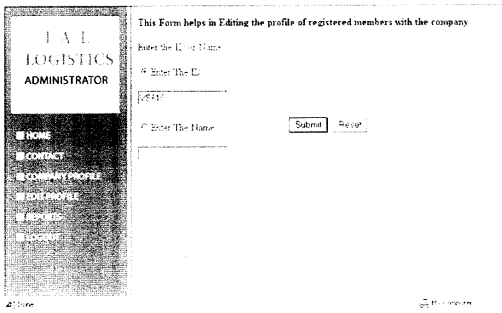

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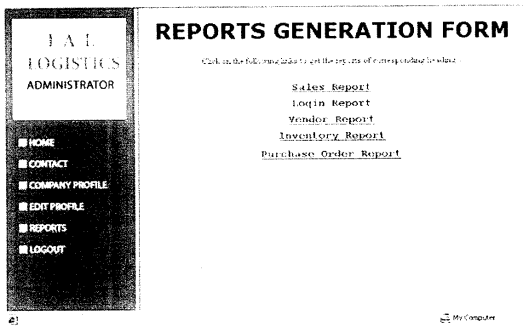

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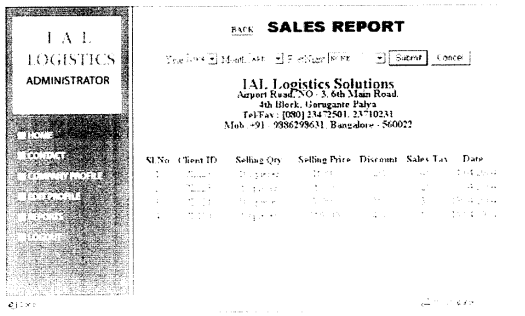

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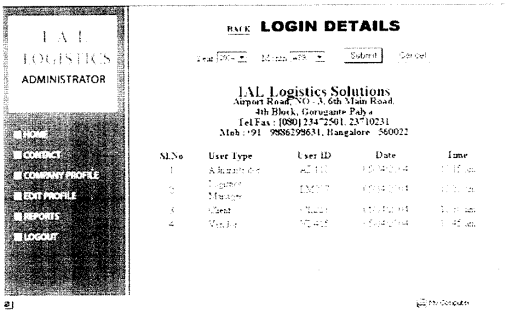

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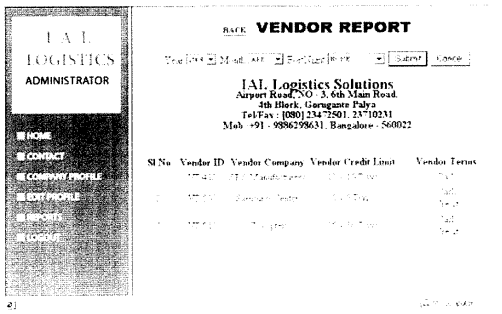

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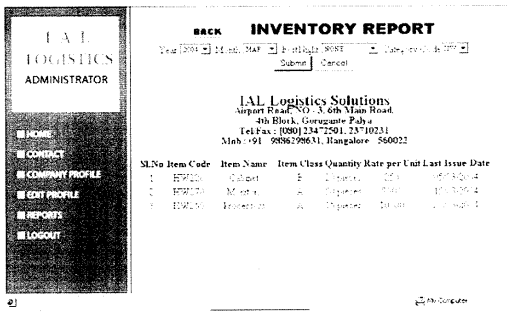
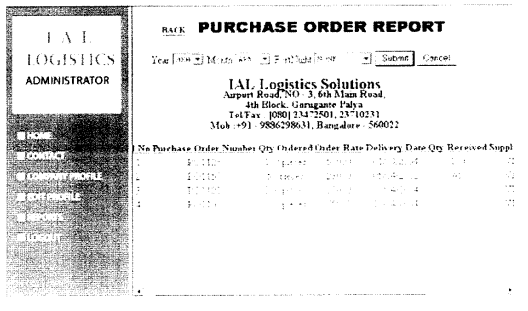


PURCHASE ORDER REPORT



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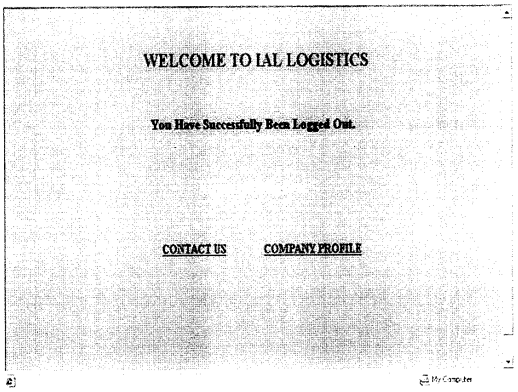

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