Software Requirement Specifications

Medicine Inventory Management System

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1. Introduction

1.1 Purpose:

Medicine Inventory Management System facilitates the user(owner) of the software to manage the medicines in his/her inventory. It allows user to track where does the medicine is stored in the whole inventory. It also allows user to add new medicines and it's details and the vendor details.

1.2 Scope:

The scope of the project we are designing is mentioned in this section. Here we list the significant inclinations of our project and what area it gives importance to, and what area of inventory management it is not associated with.

Focuses on Inventory stock:

There are lots of medicines stored in the inventory with variable expiry date for each of the medicine, Our system follow up all the expiry date with the present date and display an error or alert message when a medicine is about to expire.

Focuses on Newly arrived stock:

Sometimes a new stock of medicines with different names and with new expiry date gets imported into the inventory and our system will enter the details into the database.

1.3 Definitions, Acronyms and Abbreviations

1.3.1 SRS: Software Requirement Specifications

1.3.2 www: World Wide Web

1.3.3 GUI: Graphical User Interface

1.3.4 MIMS: Medicine Inventory Management System

1.4 References:

- 1.4.1 IEEE standard 830-1998 recommend practice for software requirements specifications Description.
- 1.4.2 IEEE software requirements specifications template.

1.5 Overview:

The overview description provides interface requirements for a Medicine Inventory Management System, Product Perspective, Hardware Interfaces, Software Interfaces, Communication Interfaces, Memory Constrains, Product Functions, User Characteristics, and other constraints involved in the software and which are responsible for the working of the Medicine Inventory Management System.

2. Overall Description

2.1 Product Perspective

2.1.1 Hardware Interfaces

- a) Hard Disk: The database connectivity requires a hardware configuration that is online. This makes it necessary to have a fast database system(such as RDBMS) running on high rpm hard disk permitting complete data redundancy and backup system to support the primary goal of reliability.
- b) The system must interface with the standard output device, keyboard and mouse to interact with the software.

2.1.2 Software Interfaces

Any database management software: MySQL

For GUI and user interaction: Microsoft Visual Basic 6.0

2.2 Product Functions: -

- (i) Calculating average number of medicines sales over one week.
- (ii) Generating medical items to be ordered.
- (iii) Entering new supply details.
- (iv) Issuing and printing cheque for vendors.
- (v) Updating database of medicines with new medicine introduces.
- (vi) Generating a code number for new medicines.
- (vii) Getting inventory information about a particular medicine.
- (viii) Generating a list of expired medicines and their vendors.

- (ix) Case Receipt would be printed after every sale.
- (x) Generating revenue and profit.
- (xi) Showing vendor-wise payments for given period.

2.3 User Characteristics

- 2.3.1 The intended user of this software need not have specific knowledge as to what is the internal operation of the system. Thus the end user is at a high level of abstraction that allows easier, faster operation and reduces the knowledge requirement of end user.
- 2.3.2 The product is absolutely user friendly, so the intended users can be the naïve users.
- 2.3.3 The product does not expect the user to posses nay technical background. Any person who know to use the mouse and keyboard can successfully use this product.

2.4 Constraints

- 2.4.1 At the time of creating the new account of searching for a specific medicine the user(owner) will enter the details of the medicine like medicine name or serial no.
- 2.4.2 At the time when the new stock arrives the user enters the details of the medicine like medicine name expiry date and vendor details.

3. Specific Requirements

3.1 Fxternal Interfaces

3.1.1 User Interface

The immediate user interface would be a page with an alert message when a certain medicine is out of stock or else it is going to be expired soon.

In the right corner, there is a search bar in which the user(owner) can enter the details of the medicine like medicine name or serial no. and it will display the row and stack number in which the medicine is stored.

3.2 Functions: -

3.2.1 Calculating Threshold Value: -

- i) Shop owner want to follow Just in Time Philosophy.
- ii) Items in stock should be above in number than threshold value.
- iii) Threshold value is average number of medicines sales for one week for each part.
- iv) Information about Number of medicines sales can be get through database.

3.2.2 Generating list of Items to buy: -

- i) Generating the list which contains items which stock is below threshold value.
- ii) That list contains

- (1) Medical Description
- (2) Quantity Required (Threshold Value of that medicine Present stock)
- (3) Address of the vendor who supply that medicine
- iii) We get medical description and address of vendor from Medicine Database.
- iv) We get quantity from Inventory.

3.2.3 Updating Inventory: -

- i) Updating the stocks of medicine when new medicine or new supply arrives.
- ii) With stocks, there would also be entries of
 - (1) Item Code Number
 - (2) Batch Number
 - (3) Expiry Date
 - (4) Vendor Number

3.2.3 Managing Payments to Vendors: -

- i) System should print out cheque to the vendors for the items supplied.
- ii) Made every time whenever there is a new supply.

3.2.4 Updating Database with new medicine: -

- Software should be able to update the database, whenever shop owner met with new medicines.
- ii) Software would allow attributes of medicines such as
 - (1) Medicine Trade Number
 - (2) Generic Number
 - (3) Vendors
 - (4) Unit Selling
 - (5) Purchasing Price
- iii) Code number should also be generated for new medicine so that shop owner would paste the code number in the rack where this medicine would be stored.

3.2.5 Getting stock of medicine: -

- i) Shop owner would query about medicine using generic name or trade name.
- ii) Software should able to fulfill the query of by displaying medicine's code number and the present quantity.

3.2.6 Generating list of expired medicines: -

- i) Software should present list of expired medicines over shop owner command.
- ii) Software should prepare vendor-wise list of the expired items.

3.2.7 Printing cash receipt: -

- i) After every sale, shop owner enter code number of each medicine and the corresponding quantity sold.
- ii) And, software will print out the cash receipt for customer.
- iii) Inventory will also be updated.

3.2.8 Calculating revenue and profit: -

- i) The shop owner would define a period.
- ii) For that every period, software will generate revenue and profit.
- iii) And also show vendor-wise payments for the period.

3.3 Performance Requirements

The system would work in real time environment, so it should be fast enough to display the row and stack number where the medicine is stored or else it will lead to major decrease in the sales of the dealer.

3.4 logical Database Requirements

The system should contain databases that include all the necessary information for the product to function according to the requirements. These include relations such as medicine details, expiry date and amount of medicine available.

3.5 Design Constraints

The system should provide user interface through a standard application installed in the device. The system should use MySQL database for maintaining the data.