Lab 2: Design and Develop Your Big Idea!

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Course: Comsc165-5039

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Deliverables for this (Lab 2) assignment:

1. Write up a small summary of what you would like your project to be ( yes, YOU get to determine your final (lab 5) project--- remember, the final (lab 5) project must adhere to the above specifications. In this summary, please be sure to describe FULLY the project that you will complete. IMPORTANT NOTE: submission of a message such as, "I don't know what to write..." is not an option and will be assigned a grade of "0".

2) Create a SMALL demonstrative prototype of your final project. Of course, the above specifications will not be met in this SMALL demonstrative prototype --- but I need to see that you've given your idea some thought and have begun.

3) Source code for your prototype and a screenshot of the prototype running on your computer.

1).Background introduction:

Small and medium-sized supermarkets usually buy thousands of items. Effective management of these goods is essential. Each project usually needs to record basic information about the project, name, category, price, and quantity. Information about supermarket projects needs to be stored in the file system. Usually, you can provide operations such as adding, editing, deleting, joining new staff and exiting.

I want to design a small supermarket merchandise management system that provides functions such as add, search, and staff registration for the merchandise system. Similar systems mostly use arrays of structures to manipulate data. The system uses a linked list structure to manipulate data, improving the efficiency of data processing.

2).The main function of the program

1. Add the items information

2. Search function: according to the name of the product.

(display the name, quantity, type, price)

1. New staff register

4. Return to the menu: Return to the menu page.

5. exit the program.

3). Description of the program object

The program defines two object:

1. Commodity information object

struct itemMarket

{

char item\_name[100];////the name of item

string item\_type;//the type of item

int item\_quantity;//the quantity of item

int item\_price;//the price of item

int i;//Defining variables

void input();//enter the item imformation

};// an object ty

1. staff information object

struct store\_staff

{

char staff\_name[100];//the name of staff

int staff\_password;//the password of staff

};//an object type about staff

1. Module analysis of the program:
2. Struct store\_item

The object tye commodity.

1. Staff information object

The object type staff.

1. String searchItem

The object of search the item.

string searchItem(string itemName, store\_item iteml)

{

if(iteml.item\_name == itemName)

{

return iteml.item\_name + iteml.item\_type + iteml.item\_quantity + iteml.item\_price;

}

else

{

return "Unavailble."

}

}

4.New staff register

string getStaffName(string staffName)

{

cout << "Enter the new staff name: " << endl;

cin >> staffName;

staff\_name = staffName;

}

string getStaffPassword(string staffPassword)

{

cout << "Enter the new staff password: " << endl;

cin >> staffPassword;

staff\_password = staffPassword;

}

5.Void showMenu

The function object about the menu.

void showMenu()

{

cout << "This is a online store, please choose a option: " << endl;

cout << "1. Add the items information." << endl;

cout << "2. Search for an item." << endl;

cout << "3. change the item(s)." << endl;

cout << "4. Show the options menu again" << endl;

cout << "5. New staff register" << emdl;

cout << "6. Quit" << endl;

}

1. Add the item information

void item::input(string item)

{

cout << "Please enter the name of item: " << endl;

cin >> item\_name;

cout << "Please enter the type of item: " << endl;

cin >> item\_type;

cout << "Please enter the quantity of item: " << endl;

cin >> item\_quantity;

cout << "Please enter the price of item: " << endl;

cin >> item\_price;

}

7.Quit the program

Just end and leave the program.