

I Q R A
UNIVERSITY



FINAL PROJECT (PF LAB)

FOXTROT MART SYSTEM

MEMBERS

MUHAMMAD USMAN (21294)

MOHAMMAD OWAIS SHAIKH (22848)

YUMNA BAIG (23003)

INSTRUCTOR

Sir Adnan Wahid

INTRODUCTION OF THE SOURCE CODE

Using C++ as our programming language, we developed the MART. With the help of the C++ programming language, we may also make a wide range of other programs, including games, calculators, management systems, and more.

DESCRIPTION OF THE SOURCE CODE

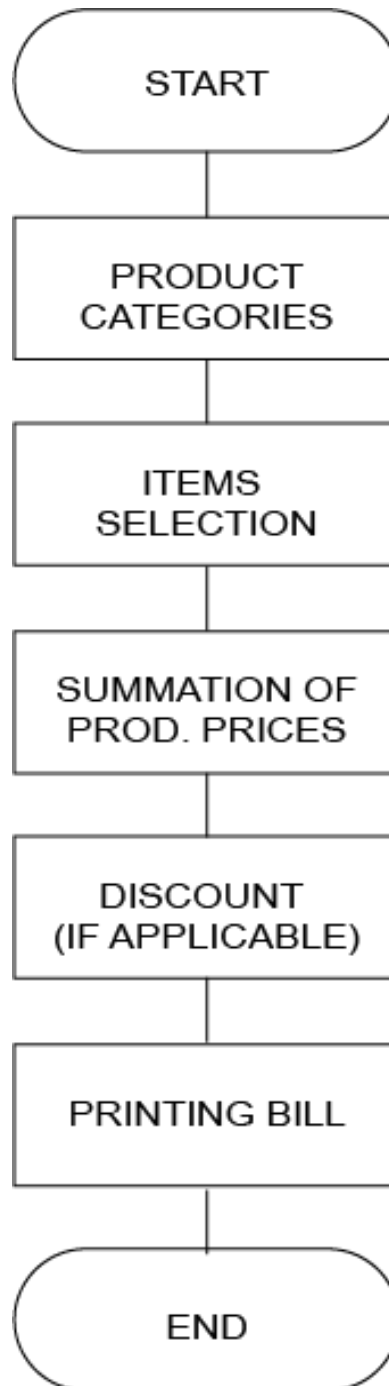
This code creates a simple console-based program that simulates a shopping experience at a store called "Foxtrot Mart." The program presents the user with options for different types of items to purchase, such as food items or cleaning items. The user can select a category and then select a specific item from that category. The code then calculates the total cost of the items selected and applies a discount if the total cost is above a certain amount. The program also allows the user to continue shopping after making a purchase.

ALGORITHM

This program goes through the following steps:

1. Display welcome message and discount offer
2. Show options for different types of items to purchase
3. Ask user to select a category
4. Show options for specific items within the selected category
5. Ask user to select a specific item
6. Ask user for the quantity of the selected item
7. Add the cost of the selected item to the running total
8. Ask user if they would like to continue shopping
9. If yes, repeat steps
10. If no, calculate the total cost and apply discount if applicable
11. Display the final total cost and the amount of discount (if any)

FLOW CHART



SOURCE CODE

(HEADER FILE CODE)

```
#include<iostream>
```

```
using namespace std;
```

```
void foodItems(){
```

```
    cout << " _____FOOD ITEMS _____";
```

```
    cout << endl << endl;
```

```
    cout << "1) Shwarma-----$8." << endl;
```

```
    cout << "2) French Fries-----$5." << endl;
```

```
    cout << "3) Zinger Burger-----$20." << endl;
```

```
    cout << "4) Pizza-----$30." << endl;
```

```
    cout << "5) Pizza Fries-----$15." << endl;
```

```
    cout << "6) Club Sandwich-----$10." << endl;
```

```
}
```

```
void cleaningItems(){
```

```
    cout << " _____CLEANING ITEMS _____";
```

```
    cout << endl << endl;
```

```

cout << "1) Teeth brush-----$8." << endl;
cout << "2) Bottle spray-----$5." << endl;
cout << "3) Dishwasher soap-----$20." << endl;
cout << "4) Sponge-----$3." << endl;
cout << "5) Shoe polish-----$15." << endl;
cout << "6) Shoe brush-----$10." << endl;
}

```

```

void sportsItems(){

```

```

    cout << " _____SPORTS ITEMS_____ ";
    cout << endl << endl;
    cout << "1) Tennis Racket -$8." << endl;
    cout << "2) Football -----$30." << endl;
    cout << "3) Cricket Bat ---$60." << endl;
    cout << "4) Cricket Ball --$25." << endl;
    cout << "5) Golf Ball -----$15." << endl;
    cout << "6) Hockey -----$50." << endl;
}

```

```

void computerItems(){

```

```

    cout << " _____COMPUTER ITEMS_____ ";
    cout << endl << endl;
    cout << "1) Keyboard-----$4." << endl;
    cout << "2) Mouse-----$4." << endl;
    cout << "3) Speakers-----$20." << endl;
    cout << "4) LED-----$50." << endl;
    cout << "5) Handfree-----$3." << endl;

```

```
    cout << "6) Mouse Pad-----$2." << endl;
}
```

```
void options(){
    cout << "1) Food Items" << endl;
    cout << "2) Cleaning Items" << endl;
    cout << "3) Sports Items" << endl;
    cout << "4) Computer Items" << endl;
    cout << "5) Exit." << endl << endl;
}
```

(MAIN CODE)

```
#include<iostream>
```

```
#include "myfirst.h"
```

```
using namespace std;
```

```
int main()
```

```
{
```

```
    int opt1;
```

```
    int opt2;
```

```
    int q;
```

```
    bool choice;
```

```
    int sum = 0;
```

```
    cout << " _____ " << endl;
```

```
    cout << "| _____ WELCOME TO FOXTROT MART _____ |" << endl << endl;
```

```
cout << endl;
```

```
cout << "There will be a 10% DISCOUNT On $150 OR more than $150 shopping" << endl << endl;
```

morebilling:

```
options();
```

```
cout << "Enter the Option: ";
```

```
cin >> opt1;
```

```
cout << endl << endl;
```

```
if (opt1 == 1)
```

```
{
```

```
    foodItems();
```

```
    cout << "Select option: ";
```

```
    cin >> opt2;
```

```
    cout << endl;
```

```
    if(opt2 == 1){
```

```
        cout << "Shwarma-----$8." << endl;
```

```
        cout << "Quantity: ";
```

```
cin >> q;
sum +=8*q;
}
else if(opt2== 2){

cout << "French fries-----$5." << endl;
cout << "Quantity: ";
cin >> q;
sum += 5*q;
}
else if(opt2== 3){

cout <<"Zinger Burger-----$20." << endl;
cout << "Quantity: ";
cin >> q;
sum +=20*q;
}
else if(opt2== 4){

cout << "Pizza-----$30." << endl;
cout << "Quantity: ";
cin >> q;
sum +=30*q;
}
else if(opt2== 5){

cout << "Pizza Fries-----$15." << endl;
cout << "Quantity: ";
cin >> q;
```



```

sum +=15*q;
}
else if(opt2== 6){

cout << "Club Sandwich-----$10." << endl;
cout << "Quantity: ";
cin >> q;
sum +=10*q;
}
else {
    cout << "Invalid selesction" << endl;
}
cout << "Want to buy more? (1/0)" << endl;
cin >> choice;
cout << endl;
if (choice == 1){
    goto morebilling;
}
}

```

```

else if (opt1 == 2)
{
    cleaningItems();
    cout << "Select option: ";
    cin >> opt2;
    cout << endl;
    if(opt2 == 1){

```

```
cout << "Teeth brush-----$8." << endl;
```

```
cout << "Quantity: ";
```

```
cin >> q;
```

```
sum +=8*q;
```

```
}
```

```
else if(opt2== 2){
```

```
cout << "Bottle spray-----$5." << endl;
```

```
cout << "Quantity: ";
```

```
cin >> q;
```

```
sum +=5*q;
```

```
}
```

```
else if(opt2== 3){
```

```
cout << "Dishwasher soap-----$20." << endl;
```

```
cout << "Quantity: ";
```

```
cin >> q;
```

```
sum +=20*q;
```

```
}
```

```
else if(opt2== 4){
```

```
cout << "Sponge-----$3." << endl;
```

```
cout << "Quantity: ";
```

```
cin >> q;
```

```
sum +=3*q;
```

```
}
```

```
else if(opt2== 5){
```

```
cout << "Shoe polish-----$15." << endl;
```

```
cout << "Quantity: ";
```

```

        cin >> q;
        sum +=15*q;
    }
    else if(opt2== 6){
        cout << "Shoe Brush-----$10." << endl;
        cout << "Quantity: ";
        cin >> q;
        sum +=10*q;
    }
    else {
        cout << "Invalid selesction" << endl;
    }
    cout << "Want to buy more? (1/0)" << endl;
    cin >> choice;
    cout << endl;
    if (choice == 1){
        goto morebilling;
    }
}

```

```

else if (opt1 == 3)
{
    sportsItems();
    cout << "Select option: ";
    cin >> opt2;
    cout << endl;
    if(opt2 == 1){

        cout << "Tennis Racket-----$8." << endl;
    }
}

```

```
cout << "Quantity: ";  
cin >> q;  
sum +=8*q;  
}  
else if(opt2== 2){  
  
cout << "Football-----$30." << endl;  
cout << "Quantity: ";  
cin >> q;  
sum +=30*q;  
}  
else if(opt2== 3){  
  
cout << "Cricket Bat-----$60." << endl;  
cout << "Quantity: ";  
cin >> q;  
sum +=60*q;  
}  
else if(opt2== 4){  
  
cout << "Cricket Ball-----$25." << endl;  
cout << "Quantity: ";  
cin >> q;  
sum +=25*q;  
}  
else if(opt2== 5){  
  
cout << "Golf Ball-----$15." << endl;  
cout << "Quantity: ";
```

```

        cin >> q;
        sum +=15*q;
    }
    else if(opt2== 6){
        cout << "Hockey-----$50." << endl;
        cout << "Quantity: ";
        cin >> q;
        sum +=50*q;
    }
    else {
        cout << "Invalid selesction" << endl;
    }
    cout << "Want to buy more? (1/0)" << endl;
    cin >> choice;
    cout << endl;
    if (choice == 1){
        goto morebilling;
    }
}

```

```

else if (opt1 == 4)
{
    computerItems();
    cout << "Select option: ";
    cin >> opt2;
    cout << endl;
    if(opt2 == 1){

        cout << "Keyboard-----$4." << endl;
    }
}

```

```
cout << "Quantity: ";  
cin >> q;  
sum +=4*q;  
}  
else if(opt2== 2){  
  
cout << "Mouse-----$4." << endl;  
cout << "Quantity: ";  
cin >> q;  
sum +=4*q;  
}  
else if(opt2== 3){  
  
cout << "Speakers-----$20." << endl;  
cout << "Quantity: ";  
cin >> q;  
sum +=20*q;  
}  
else if(opt2== 4){  
  
cout << "LED-----$50." << endl;  
cout << "Quantity: ";  
cin >> q;  
sum +=50*q;  
}  
else if(opt2== 5){  
  
cout << "Handfree-----$3." << endl;  
cout << "Quantity: ";
```

```

        cin >> q;
        sum +=3*q;
    }
    else if(opt2== 6){
        cout << "MousePad-----$2." << endl;
        cout << "Quantity: ";
        cin >> q;
        sum +=2*q;
    }
    else {
        cout << "Invalid selesction" << endl;
    }
    cout << "Want to buy more? (1/0)" << endl;
    cin >> choice;
    cout << endl;
    if (choice == 1){
        goto morebilling;
    }
}

```

```

else if(opt1 == 5){
    cout << "You are exited" << endl;

}
else{
    cout << "Invalid" << endl;
}
cout << "Your bill is $" << sum << endl;
cout << "-----" << endl;

```

```
if (sum>=150){  
    sum = sum- (10*sum/100);  
    cout << "After discount, The bill is $" << sum << endl;  
    cout << "-----" << endl;  
}  
cout << endl << endl;  
cout << "-----" << endl;  
cout << "Thanks for coming!" << endl;  
cout << "-----" << endl;  
  
return 0;  
}
```