Final Report (SERVICES OF A GENERAL STORE)

Course Code: CS110 Course Title: Computer Programming

Semester: B. Tech 2nd Sem Section: S3

Academic Year: 2019-20 Course Instructor: Vaishnavi T

Team Members:

1.A SAI SRUJAN, ME101, 8500460484, nanisai4953@gmail.com

2.B MADHAN, ME121, 8431753378, madhankumar2060@gmail.com

3.KANCHARLA SNEHITH BHAGAVAN, MT020, 9505643569, snehithbhagavan 963@gmail.com

4.KUNDETI VAMSI,ME144,8179163699,kundetivamsi24j@gmail.com

1 Abstract

The project "services of a general store" in its present form has been developed by c programming language. the idea behind the project was to develop an user friendly grocery purchase counter that helps the customer to buy their essential goods without any knowledge of the working mechanism behind it. the project here helps us to overcome the problems present in the manual system. all the information like the item no, price and quality of products available are stored and displayed according to their category to enable the customer to find his product easily and quickly from the large list of items. the customer can enter the product he wants to buy, just by specifying the item no and bill will be calculated without any error. discounts provided for some items are also displayed. The projects after computation of bill provides many options like shipping, payment preferences and use of coupon code. the customer can enter his coupon code if he has and can avail discounts of 20 percent on his bill account. coupon code provided by the user is compared with predefined active coupon code and discounts are provided accordingly the customer is provided with the options of getting his products at the store or if he prefers his products are shipped to his address. the details of the customer opting for ship at house are collected. payment can be made either by providing cash at counter or even through online payment via debit cards. the customer are then asked to rate and provide suggestions for any improvement. it minimizes human effort and help general store enhance quality of its service.

2 Introduction

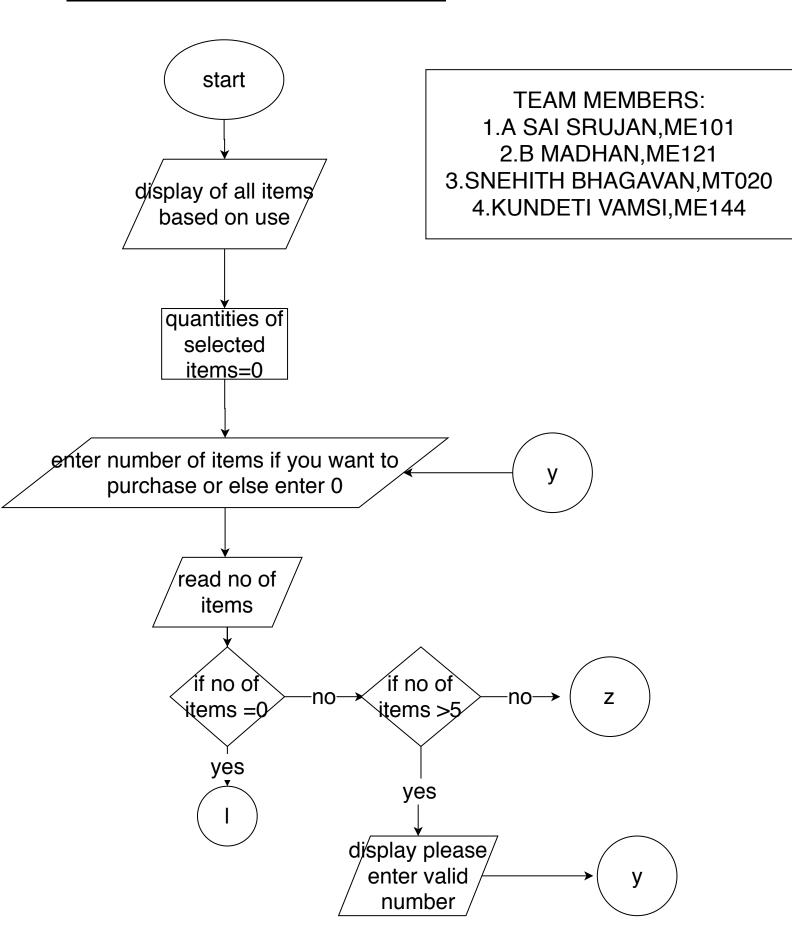
The mini project "Services of a general store" is developed to solve the problems existing in the present manual system. The purpose of this application is to reduce the manual work for managing stock, products, offers etc. Every general store has challenges to overcome and managing the information of sales, stock, discounts, offers etc. This application also displays an error message if the user enters invalid data. It can be easily understood by the user.

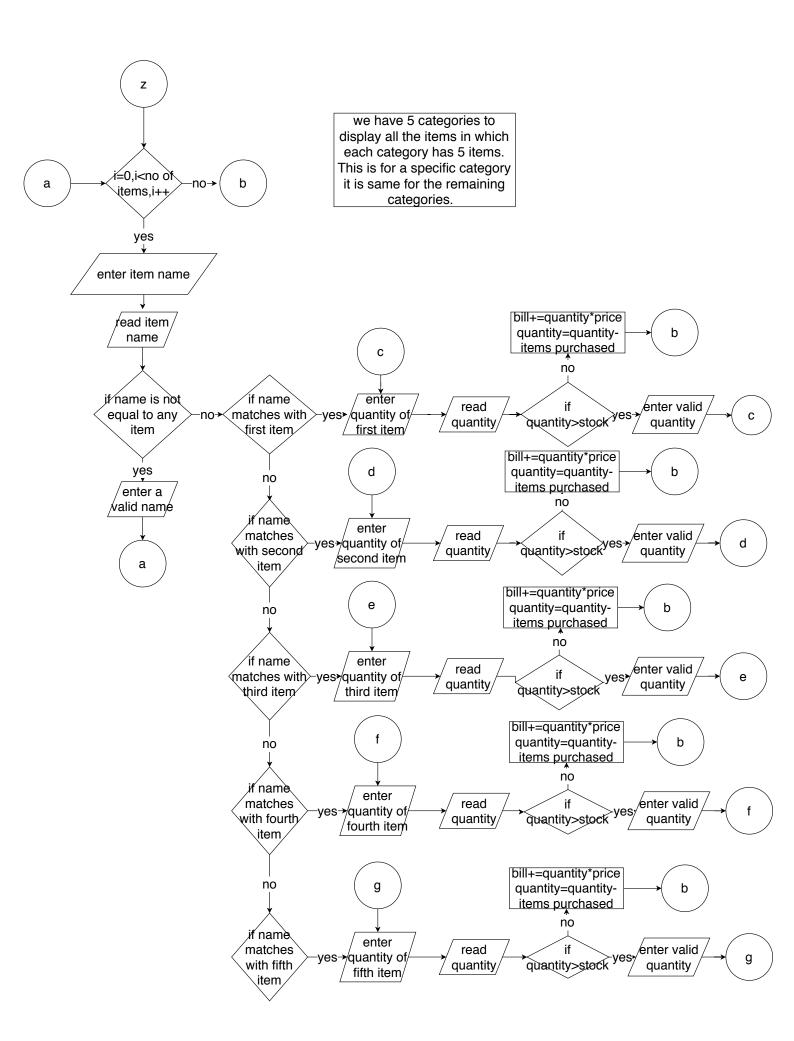
It also saves the time of the customers. It keeps track of all the information related to stock availability, discounts, offers etc. This application is developed to meet the particular needs of the general stores. It minimises the human effort and helps the general stores to improve their quality of services. It increases the productivity of general stores in less time.

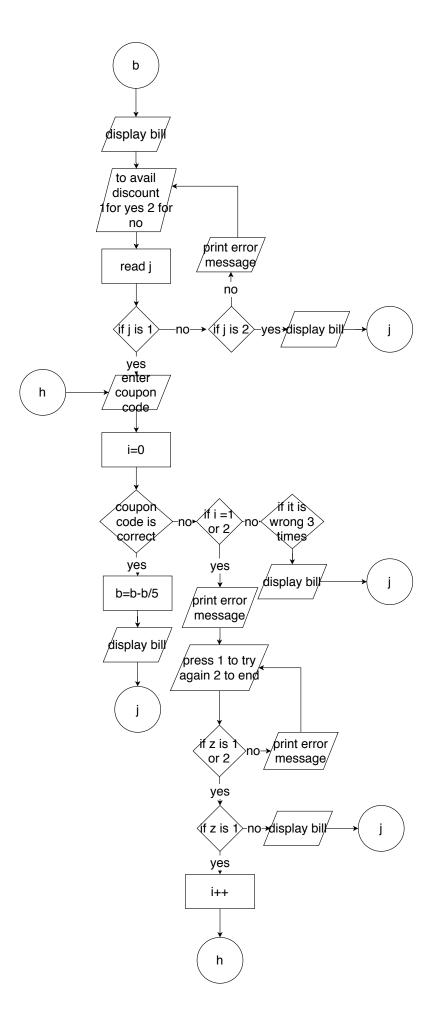
It contains all the necessary information related to items available. Hence the user can easily search for the items he would like to purchase. The bill is also generated as soon as the user completes purchasing the items. This application is error free and it carries out operations in smooth and effective manner.

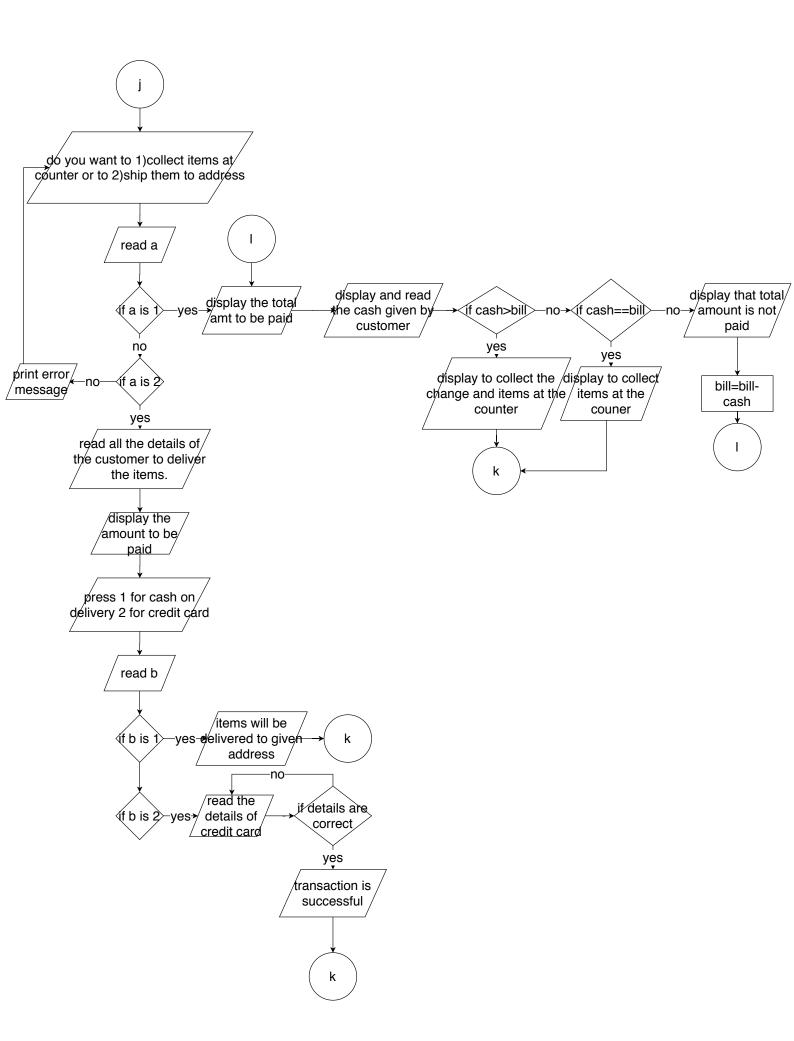
3 Flowchart or Algorithm

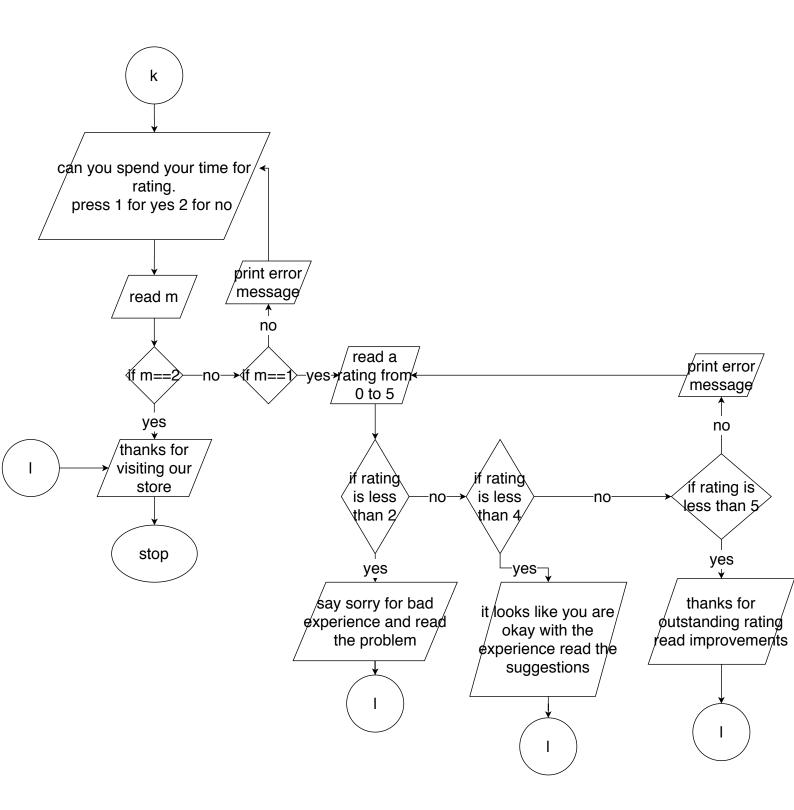
SERVICES OF A GENERAL STORE











4 Source Code

1.main.c

```
//MINI PROJECT ON SERVICES OF A GENERAL STORE
#include<stdio.h>
#include < string.h>
int totitems;
//structures to store all the items based on different categories
struct medical
  char item_name [20];
  char item_no[10];
  int p, q;
  float dp;
};
struct grocery
  char item_name [20];
  char item_no[10];
  int p, q;
  float dp;
};
struct cosmetics
{
  char item_name [20];
  char item_no[10];
  int p, q;
  float dp;
};
struct daily_essential
```

```
{
  char item_name [20];
  char item_no[10];
  int p, q;
  float dp;
};
struct stationery
{
  char item_name [20];
  char item_no[10];
  int p, q;
  float dp;
};
struct general
{
  struct medical m[10];
  struct grocery g[10];
  struct cosmetics c[10];
  struct daily_essential d[10];
  struct stationery s[10];
} item;
//function to store all the items
void stock (struct general *item);
//function to display all the items
void display (struct general *item);
//function for coupon code
float offer (struct general *item, float b);
//functions to calculate bill amount
float medical_bill (struct general *item);
float grocery_bill (struct general *item);
float cosmetics_bill (struct general *item);
```

```
float daily_essential_bill (struct general *item);
float stationery_bill (struct general *item);
//function to pay bill on cash
void bill (float bi);
//function to ship to an address
void ship (float bi);
//function to take review from the customer
void review ();
void file (struct general *item);
                        -----main-
int
main ()
{
  int j, n;
  float mb, gb, cb, db, sb, tot;
  struct general *ptr;
  FILE *dis;
  ptr = \&item;
  printf ("\tWELCOME TO OUR GENERAL STORE \n");
  stock (&item);
  display (&item);
  printf ("EXCLUSIVE 5 percent DISCOUNTS ON TOMATOES AND NAIL POLISH \n");
  printf
    ("10 PERCENT DISCOUNTS ON THERMOMETER, HAIRGEL, CANOLA OIL AND
   CALCULATORS \setminus n \setminus n");
 mb = medical_bill (\&item);
  gb = grocery_bill (&item);
  cb = cosmetics_bill (&item);
  db = daily_essential_bill (&item);
  sb = stationery_bill (&item);
  tot = mb + gb + cb + db + sb;
  printf ("\nBILL:\nTOTAL NUMBER OF ITEMS PURCHASED=%d\n", totitems);
```

```
printf ("TOTAL PRICE=%f \ n", tot);
tot = offer (&item, tot);
printf ("How do you want to take your Items?\n");
printf ("1.At the Counter\n2.To Ship them to an address\n\t");
scanf ("%d", &n);
if (n = 1)
 {
    bill (tot);
 }
else
  {
    ship (tot);
 }
review ();
dis = fopen ("display.txt", "w");
if (dis = NULL)
  printf ("file doesn't exist\n");
else
 {
    fprintf (dis, " MEDICAL PRODUCTS: \n");
    for (j = 0; j < 5; j++)
      fprintf (dis, "quantity of %s=%d\n", item.m[j].item_name,
               item.m[j].q);
    fprintf (dis, "\n");
    fprintf (dis, "GROCERY PRODUCTS: \n");
    for (j = 0; j < 5; j++)
      fprintf (dis, "quantity of %s=%d\n", item.g[j].item_name,
               item.g[j].q);
```

```
fprintf (dis, "\n");
      fprintf (dis, "COSMETIC PRODUCTS: \n");
      for (j = 0; j < 5; j++)
        fprintf (dis, "quantity of %s= %d\n", item.c[j].item_name,
                  item.c[j].q);
      fprintf (dis, "\n");
      fprintf (dis, "DAILY ESSENTIALS: \n");
      for (j = 0; j < 5; j++)
        fprintf \ (\,dis\;,\;"\,quantity\;\;of\;\;\%s\!\!=\!\!\%d\;\;\backslash n"\;,\;\;item\;.\,d\,[\,j\,\,]\,.\,item\_name\;,
                  item.d[j].q);
      fprintf (dis, "\n");
      fprintf (dis, "STATIONERY PRODUCTS: \n");
      for (j = 0; j < 5; j++)
        fprintf (dis, "quantity of %s=%d\n", item.s[j].item_name,
                  item.s[j].q);
      fprintf (dis, "\n");
    }
  fclose (dis);
  return 0;
                         ----stock:to define all the stock-
void
stock (struct general *ptr)
  strcpy (item.m[0].item_name, "Syringes");
  strcpy (item.m[0].item_no, "m1");
```

}

{

```
item .m[0].p = 20;
item .m[0].q = 20;
item .m[0].dp = item .m[0].p;
strcpy (item.m[1].item_name, "Thermometer");
strcpy (item.m[1].item_no, "m2");
item.m[1].p = 60;
item.m[1].q = 10;
item.m[1].dp = item.m[1].p - item.m[1].p / 10.0;
strcpy (item.m[2].item_name, "Aspro_Tablet");
strcpy (item.m[2].item_no, "m3");
item.m[2].p = 10;
item.m[2].q = 50;
item .m[2].dp = item .m[2].p;
strcpy (item.m[3].item_name, "paracetamol");
strcpy (item.m[3].item_no, "m4");
item .m[3].p = 40;
item.m[3].q = 25;
item.m[3].dp = item.m[3].p;
strcpy (item.m[4].item_name, "Rapid_Insulin");
strcpy (item.m[4].item_no, "m5");
item.m[4].p = 50;
item .m[4].q = 15;
item .m[4].dp = item .m[4].p;
strcpy (item.g[0].item_name, "Madhur_Sugar");
strcpy (item.g[0].item_no, "g1");
item.g[0].p = 50;
item.g[0].q = 15;
```

```
item.g[0].dp = item.g[0].p;
strcpy (item.g[1].item_name, "Basmati_Rice");
strcpy (item.g[1].item_no, "g2");
item.g[1].p = 100;
item.g[1].q = 20;
item.g[1].dp = item.g[1].p;
strcpy (item.g[2].item_name, "Canol_Oil");
strcpy (item.g[2].item_no, "g3");
item.g[2].p = 80;
item g[2] \cdot q = 40;
item.g[2].dp = item.g[2].p - item.g[2].p / 10.0;
strcpy (item.g[3].item_name, "Tomatoes");
strcpy (item.g[3].item_no, "g4");
item.g[3].p = 30;
item.g[3].q = 30;
item.g[3].dp = item.g[3].p - item.g[3].p / 20.0;
strcpy (item.g[4].item_name, "potatoes");
strcpy (item.g[4].item_no, "g5");
item.g[4].p = 20;
item .g[4].q = 60;
item.g[4].dp = item.g[4].p;
strcpy (item.c[0].item_name, "Lakme_Cream");
strcpy (item.c[0].item_no, "c1");
item.c[0].p = 25;
item.c[0].q = 15;
item.c[0].dp = item.c[0].p;
strcpy (item.c[1].item_name, "Nail_Polish");
```

```
strcpy (item.c[1].item_no, "c2");
item.c[1].p = 15;
item.c[1].q = 30;
item.c[1].dp = item.c[1].p - item.c[1].p / 10.0;
strcpy (item.c[2].item_name, "Hair_Gel");
strcpy (item.c[2].item_no, "c3");
item.c[2].p = 65;
item.c[2].q = 20;
item.c[2].dp = item.c[2].p;
strcpy (item.c[3].item_name, "Body_Lotion");
strcpy (item.c[3].item_no, "c4");
item.c[3].p = 30;
item.c[3].q = 50;
item.c[3].dp = item.c[3].p;
strcpy (item.c[4].item_name, "Lip_Balm");
strcpy (item.c[4].item_no, "c5");
item.c[4].p = 5;
item.c[4].q = 40;
item.c[4].dp = item.c[4].p - item.c[4].p / 20.0;
strcpy (item.d[0].item_name, "Tooth_brush");
strcpy (item.d[0].item_no, "d1");
item d[0].p = 25;
item .d[0].q = 30;
item.d[0].dp = item.d[0].p;
strcpy (item.d[1].item_name, "Milk");
strcpy (item.d[1].item_no, "d2");
item.d[1].p = 20;
item.d[1].q = 30;
```

```
item.d[1].dp = item.d[1].p;
strcpy (item.d[2].item_name, "Shampoo");
strcpy (item.d[2].item_no, "d3");
item.d[2].p = 5;
item.d[2].q = 40;
item.d[2].dp = item.d[2].p;
strcpy (item.d[3].item_name, "Soaps");
strcpy (item.d[3].item_no, "d4");
item . d[3] . p = 20;
item.d[3].q = 50;
item .d[3].dp = item .d[3].p;
strcpy (item.d[4].item_name, "Tooth_paste");
strcpy (item.d[4].item_no, "d5");
item.d[4].p = 10;
item.d[4].q = 40;
item.d[4].dp = item.d[4].p;
strcpy (item.s[0].item_name, "Books");
strcpy (item.s[0].item_no, "s1");
item.s[0].p = 30;
item.s[0].q = 80;
item.s[0].dp = item.s[0].p;
strcpy (item.s[1].item_name, "Pens");
strcpy (item.s[1].item_no, "s2");
item.s[1].p = 5;
item .s[1].q = 100;
item.s[1].dp = item.s[1].p;
strcpy (item.s[2].item_name, "Calculator");
```

```
strcpy (item.s[2].item_no, "s3");
  item .s[2].p = 120;
  item.s[2].q = 30;
  item.s[2].dp = item.s[2].p - item.s[2].p / 10.0;
  strcpy (item.s[3].item_name, "Envelopes");
  strcpy (item.s[3].item_no, "s4");
  item.s[3].p = 5;
  item .s[3].q = 50;
  item.s[3].dp = item.s[3].p;
  strcpy (item.s[4].item_name, "Dolls");
  strcpy (item.s[4].item_no, "s5");
  item .s[4].p = 150;
  item .s[4].q = 10;
  item.s[4].dp = item.s[4].p;
}
                     ————display:to display all the items—
void
display (struct general *ptr)
{
  int j;
  printf (" MEDICAL PRODUCTS: \n");
                     item no price quantity price_after_discount \n"
  printf ("itemname
  for (j = 0; j < 5; j++)
    printf (" %s\t %s %10d %10d %10f \n", item.m[j].item_name,
            item.m[j].item_no, item.m[j].p, item.m[j].q, item.m[j].dp);
  printf ("\n");
  printf (" GROCERY PRODUCTS: \n");
  printf ("itemname item no price quantity price_after_discount \n")
```

```
for (j = 0; j < 5; j++)
  printf (" %s\t %s %10d %10d %10f \n", item.g[j].item_name,
         item.g[j].item_no, item.g[j].p, item.g[j].q, item.g[j].dp);
printf ("\n");
printf (" COSMETIC PRODUCTS: \n");
                       item no price quantity price_after_discount \n"
printf ("itemname
for (j = 0; j < 5; j++)
  printf (" %s\t %s %10d %10d %10f \n", item.c[j].item_name,
         item.c[j].item.no, item.c[j].p, item.c[j].q, item.c[j].dp);
printf ("\n");
printf (" DAILY ESSENTIALS: \n");
printf ("itemname
                  item no price quantity price_after_discount \n"
for (j = 0; j < 5; j++)
  printf (" %s\t %s %10d %10d %10f \n", item.d[j].item_name,
         item.d[j].item_no, item.d[j].p, item.d[j].q, item.d[j].dp);
printf ("\n");
           STATIONERY PRODUCTS: \n");
printf ("
printf ("itemname
                   item no price quantity price_after_discount \n"
for (j = 0; j < 5; j++)
  printf (" %s\t %s %10d %10d %10f \n", item.s[j].item_name,
         item.s[j].item_no, item.s[j].p, item.s[j].q, item.s[j].dp);
printf ("\n");
return;
                         —offer:for coupon codes—
```

}

```
float
offer (struct general *ptr, float b)
 int x, y, i = 0, x1;
 printf
    ("\n Would you like to avail some discount on your bill using
    coupon code? \n");
label1: printf ("type n 1.YES n 2.NO(n");
 scanf ("%d", &x);
 if (x != 1 \&\& x != 2)
      printf (" \nINVALID INPUT \n");
      goto label1;
    }
  if (x = 2)
   {
      printf ("Your bill amount is %f \n ", b);
      return b;
    }
  if (x = 1)
    {
    label: printf ("\n Enter your 5 digit coupon code \n ");
      scanf ("%d", &y);
      if (y = 12345 \mid | y = 13579 \mid | y = 24680 \mid | y = 98765)
        {
          printf
            ("\n You have availed a discount of 20 percent through your
            coupon code \n");
          b = b - b / 5;
          printf ("The bill amount is \%f \setminus n", b);
          return b;
        }
      else
```

```
{
          if (i = 0 | | i = 1)
            {
               printf ("INVALID coupon code \n");
            label2: printf ("WOULD YOU LIKE TO TRY AGAIN? \n");
               printf ("type \n 1.YES \n 2.NO\n");
              scanf ("%d", &x1);
               if (x1 != 1 \&\& x1 != 2)
                   printf ("\n INVALID INPUT \n");
                   goto label2;
                }
               if (x1 = 1)
                {
                   i++;
                  goto label;
                }
               else
                {
                   printf ("Your bill amount is %f", b);
                  return b;
                }
            }
          printf
            ("\nYou have inputed wrong code 3 times in a row \n.
            You cannot use your coupon code again to avail benefits \n");
          printf (" \n Your bill amount is %f", b);
          return b;
        }
    }
}
                             -medical_bill-
float
```

```
medical_bill (struct general *ptr)
{
  char name [2];
  int a, b, c, d, e, n, i;
  float bill = 0;
label6:
  printf
    ("Enter number of items if you want to buy in medical else enter 0: ");
  scanf ("%d", &n);
  totitems = n;
  if (n = 0)
   return bill;
  else if (n > 5)
    {
      printf ("please enter valid number\n");
      goto label6;
    }
  else
  label:
    {
      for (i = 0; i < n; i++)
        {
          printf ("Enter item number %d you would like to buy in medical: ",
                  i + 1);
          scanf ("%s", name);
          if (strcmp (name, "m1") != 0 && strcmp (name, "m2") != 0
              && strcmp (name, "m3") != 0 && strcmp (name, "m4") != 0
              && strcmp (name, "m5") != 0)
            {
              printf ("please enter valid item number\n");
              goto label;
            }
          else if (strcmp (name, "m1") == 0)
```

```
{
  label1:
    printf ("Enter quantity of syringes: ");
    scanf ("%d", &a);
    if (a > item.m[0].q)
      {
        printf ("please enter valid quantity\n");
        goto label1;
      }
    else
      {
        bill = bill + a * 20;
        item .m[0] . q = a;
      }
 }
else if (strcmp (name, "m2") == 0)
 {
  label2:
    printf ("Enter quantity of thermometers: ");
    scanf ("%d", &b);
    if (b > item.m[1].q)
      {
        printf ("please enter valid quantity\n");
        goto label2;
      }
    else
      {
        bill = bill + b * 57;
        item.m[1].q -= b;
      }
 }
else if (strcmp (name, "m3") == 0)
  {
```

```
label3:
    printf ("Enter quantity of Aspro tablets: ");
    scanf ("%d", &c);
    if (c > item.m[2].q)
      {
        printf ("please enter valid quantity\n");
        goto label3;
      }
    else
      {
        bill = bill + c * 10;
        item.m[2].q = c;
      }
 }
else if (strcmp (name, "m4") == 0)
 {
  label4:
    printf ("Enter quantity of Paracetamol: ");
    scanf ("%d", &d);
    if (d > item.m[3].q)
      {
        printf ("please enter valid quantity\n");
        goto label4;
      }
    else
      {
        bill = bill + d * 40;
        item.m[3].q -= d;
      }
 }
else if (strcmp (name, "m5") == 0)
  {
  label5:
```

```
printf ("Enter quantity of Rapid Insulin: ");
               scanf ("%d", &e);
               if (e > item.m[4].q)
                 {
                   printf ("please enter valid quantity\n");
                   goto label5;
                 }
               else
                 {
                   bill = bill + e * 50;
                   item .m[4].q = e;
                 }
            }
        }
      return bill;
    }
}
                             —grocery_bill —
float
grocery_bill (struct general *ptr)
{
  char name [2];
  int n, i;
  float bill = 0, a, b, c, d, e;
label6:
  printf
    ("Enter number of items if you want to buy in grocery else enter 0: ");
  scanf ("%d", &n);
  totitems += n;
  if (n = 0)
    return bill;
```

```
else if (n > 5)
 {
    printf ("please enter valid number\n");
    goto label6;
  }
else
label:
  {
    for (i = 0; i < n; i++)
      {
        printf ("Enter item number %d you would like to buy in grocery: ",
                i + 1);
        scanf ("%s", name);
        if (strcmp (name, "g1") != 0 && strcmp (name, "g2") != 0
            && strcmp (name, "g3") != 0 && strcmp (name, "g4") != 0
            && strcmp (name, "g5") != 0)
          {
            printf ("please enter valid item number\n");
            goto label;
          }
        else if (strcmp (name, "g1") == 0)
          {
          label1:
            printf ("Enter quantity of Madhur sugar (in kgs): ");
            scanf ("%f", &a);
            if (a > item.g[0].q)
              {
                printf ("please enter valid quantity\n");
                goto label1;
              }
            else
                bill = bill + a * 50;
```

```
item g[0] q = a;
      }
 }
else if (strcmp (name, "g2") == 0)
  {
  label2:
    printf ("Enter quantity of Basmati rice (in kgs): ");
    scanf ("%f", &b);
    if (b > item.g[1].q)
        printf ("please enter valid quantity\n");
        goto label2;
      }
    else
      {
        bill = bill + b * 60;
        item.g[1].q = b;
      }
 }
else if (strcmp (name, "g3") == 0)
  {
  label3:
    printf ("Enter quantity of canol oil(in litres): ");
    scanf ("%f", &c);
    if (c > item.g[2].q)
      {
        printf ("please enter valid quantity\n");
        goto label3;
      }
    else
      {
        bill = bill + c * 72;
        item g[2] \cdot q = c;
```

```
}
 }
else if (strcmp (name, "g4") == 0)
  {
  label4:
    printf ("Enter quantity of tomatoes(in kgs): ");
    scanf ("%f", &d);
    if (d > item.g[3].q)
        printf ("please enter valid quantity\n");
        goto label4;
      }
    else
      {
        bill = bill + d * 28.5;
        item g[3] \cdot q = d;
      }
 }
else if (strcmp (name, "g5") == 0)
  {
  label5:
    printf ("Enter quantity of Potatoes(in kgs): ");
    scanf ("%f", &e);
    if (e > item.g[4].q)
      {
        printf ("please enter valid quantity\n");
        goto label5;
      }
    else
      {
        bill = bill + e * 20;
        item .g[4].q = e;
      }
```

```
}
        }
      return bill;
    }
}
                             -cosmetics_bill -
float
cosmetics_bill (struct general *ptr)
  char name [2];
  int a, b, c, d, e, i, n;
  float bill = 0;
label6:
  printf
    ("Enter number of items if you want to buy in cosmetics else enter 0: ");
  scanf ("%d", &n);
  totitems += n;
  if (n = 0)
    return bill;
  else if (n > 5)
    {
      printf ("please enter valid number\n");
      goto label6;
    }
  else
  label:
    {
      for (i = 0; i < n; i++)
        {
          printf ("Enter item number %d in cosmetics: ", i + 1);
          scanf ("%s", name);
          if (strcmp (name, "c1") != 0 && strcmp (name, "c2") != 0
```

```
&& strcmp (name, "c3") != 0
   && strcmp (name, "c4") != 0 && strcmp (name, "c5") != 0)
 {
    printf ("please enter valid item number\n");
    goto label;
 }
else if (strcmp (name, "c1") == 0)
  {
  label1:
    printf ("Enter quantity of Lakme cream: ");
    scanf ("%d", &a);
    if (a > item.c[0].q)
      {
        printf ("please enter valid quantity\n");
        goto label1;
     }
    else
      {
        bill += a * 25;
        item.c[0].q=a;
      }
  }
else if (strcmp (name, "c2") == 0)
 {
  label2:
    printf ("Enter quantity of Nail Polish: ");
    scanf ("%d", &b);
    if (b > item.c[0].q)
      {
        printf ("please enter valid quantity\n");
        goto label2;
      }
    else
```

```
{
        bill += b * 13.5;
        item.c[0].q = b;
      }
 }
else if (strcmp (name, "c3") == 0)
  {
  label3:
    printf ("Enter quantity of Hair gel: ");
    scanf ("%d", &c);
    if (c > item.c[2].q)
        printf ("please enter valid quantity\n");
        goto label3;
      }
    e\,l\,s\,e
      {
        bill += c * 65;
        item. c[2].q = c;
      }
 }
else if (strcmp (name, "c4") == 0)
  {
  label4:
    printf ("Enter quantity of Body lotion: ");
    scanf ("%d", &d);
    if (d > item.c[3].q)
      {
        printf ("please enter valid quantity\n");
        goto label4;
      }
    else
      {
```

```
bill += d * 30;
                   item.c[3].q -\!= d;
                 }
             }
           else if (strcmp (name, "c5") == 0)
             {
             label5:
               printf ("Enter quantity of Lip balm: ");
               scanf ("%d", &e);
               if (e > item.c[4].q)
                   printf ("please enter valid quantity\n");
                   goto label5;
                 }
               e\,l\,s\,e
                 {
                   bill += e * 4.75;
                   item.c[4].q=e;
                 }
             }
        }
      return bill;
    }
}
                          -----daily_essential_bill -
float
daily_essential_bill (struct general *ptr)
{
  char name [2];
  int a, c, d, e, i, n;
  float bill = 0, b;
label6:
```

```
printf
  ("Enter number of items if you want to buy in daily essentials else
  enter 0: ");
scanf ("%d", &n);
totitems += n;
if (n = 0)
  return bill;
else if (n > 5)
  {
    printf ("please enter valid number\n");
    goto label6;
  }
else
label:
  {
    for (i = 0; i < n; i++)
      {
        printf ("Enter item number %d: ", i + 1);
        scanf ("%s", name);
        if (strcmp (name, "d1") != 0
            && strcmp (name, "d2") != 0
            && strcmp (name, "d3") != 0
            && strcmp (name, "d4") != 0 && strcmp (name, "d5") != 0)
          {
            printf ("please enter valid item number\n");
            goto label;
          }
        else if (strcmp (name, "d1") == 0)
          {
          label1:
            printf ("Enter quantity of Tooth brushes: ");
            scanf ("%d", &a);
            if (a > item.d[0].q)
```

```
{
        printf ("please enter valid quantity\n");
        goto label1;
      }
    else
      {
        bill += a * 25;
        item d[0] \cdot q = a;
      }
 }
else if (strcmp (name, "d2") == 0)
  {
  label2:
    printf ("Enter quantity of Milk(in litres): ");
    scanf ("%f", &b);
    if (b > item.d[1].q)
      {
        printf ("please enter valid quantity\n");
        goto label2;
      }
    else
      {
        bill += b * 20;
        item.d[1].q = b;
      }
  }
else if (strcmp (name, "d3") == 0)
  {
  label3:
    printf ("Enter quantity of shampoo packets: ");
    scanf ("%d", &c);
    if (c > item.d[2].q)
      {
```

```
printf ("please enter valid quantity\n");
        goto label3;
      }
    e\,l\,s\,e
      {
        bill += c * 5;
        item d[2] \cdot q = c;
      }
 }
else if (strcmp (name, "d4") == 0)
  label4:
    printf ("Enter quantity of Soaps: ");
    scanf ("\%d", \&d);
    if (d > item.d[3].q)
      {
        printf ("please enter valid quantity\n");
        goto label4;
      }
    else
      {
        bill += d * 20;
        item.d[3].q -= d;
      }
  }
else if (strcmp (name, "d5") == 0)
  {
  label5:
    printf ("Enter quantity of Tooth pastes: ");
    scanf ("%d", &e);
    if (e > item.d[4].q)
      {
        printf ("please enter valid quantity\n");
```

```
goto label5;
                  }
                else
                  {
                    bill += e * 10;
                    item.d\left[\,4\,\right].\,q\ -\!\!=\ e\ ;
                  }
             }
         }
       return bill;
    }
}
                               -stationary_bill -
float
stationery_bill (struct general *ptr)
{
  char name [2];
  int a, b, c, d, e, i, n;
  float bill = 0;
label6:
  printf
    ("Enter number of items if you want to buy in stationery else
    enter 0: ");
  scanf ("%d", &n);
  totitems += n;
  if (n = 0)
    return bill;
  else if (n > 5)
    {
       printf ("please enter valid number\n");
       goto label6;
    }
```

```
else
label:
 {
    for (i = 0; i < n; i++)
      {
        printf ("Enter item number %d in stationery: ", i + 1);
        scanf ("%s", name);
        if (strcmp (name, "s1") != 0
            && strcmp (name, "s2") != 0
            && strcmp (name, "s3") != 0
            && strcmp (name, "s4") != 0 && strcmp (name, "s5") != 0)
          {
            printf ("please enter valid item number\n");
            goto label;
          }
        else if (strcmp (name, "s1") == 0)
          {
          label1:
            printf ("Enter quantity of Books: ");
            scanf ("%d", &a);
            if (a > item.s[0].q)
              {
                printf ("please enter valid quantity\n");
                goto label1;
              }
            else
              {
                bill += a * 30;
                item .s[0].q = a;
              }
          }
        else if (strcmp (name, "s2") == 0)
          {
```

```
label2:
    printf ("Enter quantity of pens: ");
    scanf ("%d", &b);
    if (b > item.s[1].q)
      {
        printf ("please enter valid quantity\n");
        goto label2;
      }
    else
      {
        bill += b * 5;
        item .s[1].q = b;
      }
 }
else if (strcmp (name, "s3") == 0)
 {
  label3:
    printf ("Enter quantity of calculators: ");
    scanf ("%d", &c);
    if (c > item.s[2].q)
      {
        printf ("please enter valid quantity\n");
        goto label3;
      }
    else
      {
        bill += c * 120;
        item .s[2].q = c;
      }
 }
else if (strcmp (name, "s4") == 0)
  {
  label4:
```

```
scanf ("%d", &d);
          if (d > item.s[3].q)
            {
              printf ("please enter valid quantity\n");
              goto label4;
            }
          else
            {
              bill += d * 5;
              item.s[3].q=d;
            }
        }
      else if (strcmp (name, "s5") == 0)
        {
        label5:
          printf ("Enter quantity of Dolls: ");
          scanf ("%d", &e);
          if (e > item.s[4].q)
            {
              printf ("please enter valid quantity\n");
              goto label5;
            }
          else
            {
              bill += e * 150;
              item.s[4].q=e;
            }
        }
    }
  return bill;
}
```

printf ("Enter quantity of Envelopes: ");

}

-bill-

```
void
bill (float bi)
\{
  int a, b, c, d, e;
  float cash;
  printf ("The amount to be paid is \%f \setminus n", bi);
  printf ("Enter the cash n");
  printf ("Number of 50's ");
  scanf ("%d", &a);
  printf ("Number of 100's ");
  scanf ("%d", &b);
  printf ("Number of 200's ");
  scanf ("%d", &c);
  printf ("Number of 500's ");
  scanf ("%d", &d);
  printf ("Number of 2000's ");
  scanf ("%d", &e);
  cash = ((a * 50) + (b * 100) + (c * 200) + (d * 500) + (e * 2000));
  if (\cosh > bi)
    printf ("Please collect your change %f and your items at the counter\n",
            cash - bi);
  else if (\cosh = bi)
    printf
      ("The total bill is paid and Please collect your items at the counter\r
  else
    {
      printf ("The total bill amount is not paid\n Please pay again\n");
      bi = (bi - cash);
      bill (bi);
    }
```

```
}
                              -ship:to ship items to an address-
void
ship (float bi)
  int n, i;
  char name [100];
  long int pin;
  long long int num;
  struct address
    int flat;
    char street [100];
    char city [100];
    char state [100];
  } st;
  struct expdate
    int m;
    int y;
  };
  struct credit
  {
    long long int number;
    struct expdate e;
    int cvv[3];
  } cd;
  printf ("Enter the delivery Address:\n");
  printf ("Enter your full name: ");
  scanf ("%s", name);
  printf ("Flat no.: ");
  scanf ("%d", &st.flat);
  printf ("Street: ");
```

```
scanf ("%s", st.street);
  printf ("City: ");
  scanf ("%s", st.city);
  printf ("State: ");
  scanf ("%s", st.state);
  printf ("Enter your pincode\n");
  scanf ("%ld", &pin);
label11:
  printf ("Enter your 10 digit mobile number\n");
  scanf ("%lld", &num);
  if ((\text{num} \le 1000000000)) | (\text{num} \ge 9999999999))
    goto label11;
  printf ("Total payable amount is %f\n", bi);
  printf ("1. Cash On Delivery\n2. Credit Card Payment\n\t");
  scanf ("%d", &n);
  if (n = 1)
   {
      printf ("The items will be delivered to the given address\n");
      printf ("Expected Delivery: 2-3 days\n");
    }
  else
    {
    label: printf ("Enter the 16-digit credit card number\n");
      scanf ("%lld", &cd.number);
      printf ("Enter the expiry date\n");
      printf ("Month: ");
      scanf ("%d", &cd.e.m);
      printf ("Year: ");
      scanf ("%d", &cd.e.y);
    label15: printf ("Enter the CVV code\n");
      for (i = 0; i < 3; i++)
        {
          scanf ("%d", &cd.cvv[i]);
```

```
if ((cd.cvv[i] < 0) || (cd.cvv[i] > 9))
           {
             printf ("Please Enter single digit at a time\n");
             goto label15;
           }
       }
     {
       if ((cd.number >= 1000000000000000)
            && (cd.e.m < 13)
           && (size of (cd.cvv) == 12))
         {
           printf
             ("We Will Check the given details and send a message to the
             given number with tracking link of the order\n");
           printf ("Expected Delivery: 2-3 days\n");
         }
       else
         {
           printf ("Please enter valid details\n");
           goto label;
         }
     }
   }
}
                           -review: to take review from customer-
void
review ()
 int i, k, m;
 char s[1000];
 float j;
  printf ("Can you spend your esteemed time by giving a rating\n");
```

```
label2:
  printf ("Press 1 for yes and 2 for no\n");
  scanf ("%d", &m);
  if (m = 1)
    {
    label1:
      {
        printf ("please give a rating between 0 to 5 for our service.\n");
        scanf ("%f", &j);
        if ((j >= 0) \&\& (j <= 2))
            printf
              ("I am so sorry for such a bad experience, can you please write
              what was your problem.\n");
            scanf ("%s", s);
          }
        else if ((j > 2) \&\& (j <= 4))
          {
            printf
              ("It looks like you are ok with your experience. Please suggest
              some improvements to make it even more better.\n");
            scanf ("%s", s);
          }
        else if ((j > 4) \&\& (j <= 5))
          {
            printf
              ("Thank you so much for an outstanding rating. Please suggest
              some improvements to make it even more better.\n");
            scanf ("%s", s);
          }
        else
```

```
{
             printf ("Enter a valid rating.\n");
             goto label1;
          }
      }
      printf ("\tTHANKS FOR VISITING OUR STORE\n\t
      SEE YOU AGAIN. \n");
    }
  else if (m = 2)
      printf ("\tTHANKS FOR VISITING OUR STORE\n\t
      SEE YOU AGAIN.\n");
    }
  else
    {
      printf ("please enter 1 or 2 \setminus n");
      goto label2;
    }
}
}
2.display.txt
   MEDICAL PRODUCTS:
quantity of Syringes=20
quantity of Thermometer=10
quantity of Aspro_Tablet=50
quantity of paracetamol=25
quantity of Rapid_Insulin=15
```

GROCERY PRODUCTS:

- quantity of Madhur_Sugar=15
- quantity of Basmati_Rice=20
- quantity of Canol_Oil=40
- quantity of Tomatoes=30
- quantity of potatoes=60

COSMETIC PRODUCTS:

- quantity of Lakme_Cream= 15
- quantity of Nail_Polish= 30
- quantity of Hair_Gel= 20
- quantity of Body_Lotion= 50
- quantity of Lip_Balm= 40

DAILY ESSENTIALS:

- quantity of Tooth_brush=30
- quantity of Milk=30
- quantity of Shampoo=40
- quantity of Soaps=50
- quantity of Tooth_paste=40

STATIONERY PRODUCTS:

- quantity of Books=80
- quantity of Pens=100
- quantity of Calculator=30
- quantity of Envelopes=50
- quantity of Dolls=10

5 Results

	TO OUR G	ENERAL	STORE
MEDICAL PROI		price	quantity price after discount
Syringes	m1	20	20 20.000000
Thermometer	m2	60	10 54.000000
Aspro Tablet	m3	10	50 10.000000
paracetamol	m4	40	25 40.000000
Rapid Insulin		50	15 50.000000
Rapia_Institu	mo	30	13 30.00000
GROCERY PROI	OUCTS:		
itemname	item no	price	quantity price_after_discount
Madhur_Sugar	g1	50	15 50.000000
Basmati_Rice	g2	100	20 100.000000
Canol_Oil	g3	80	40 72.000000
Tomatoes	g4	30	30 28.500000
potatoes	g5	20	60 20.000000
COSMETIC PRO	DDUCTS:		
itemname	item no	price	quantity price_after_discount
Lakme_Cream	c1	25	15 25.000000
$Nail_Polish$	c2	15	30 13.500000
Hair_Gel	c3	65	20 65.000000
Body_Lotion	c4	30	50 30.000000
Lip_Balm	c5	5	40 4.750000
DAILY ESSENT			
itemname	item no	price	quantity price_after_discount
Tooth_brush	d1	25	30 25.000000
Milk	d2	20	30 20.000000
Shampoo	d3	5	40 5.000000
Soaps	d4	20	50 20.000000
Tooth_paste	d5	10	40 10.000000

```
d5
                           10
                                      40 10.000000
Tooth_paste
  STATIONERY PRODUCTS:
               item no price quantity price_after_discount
itemname
                           30
                                      80 30.000000
     Books
               s1
                            5
                                     100
                                          5.000000
      Pens
                s2
Calculator
                s3
                          120
                                      30 108.000000
                                           5.000000
                                      50
Envelopes
                s4
                            5
                s5
                          150
                                      10 150.000000
      Dolls
EXCLUSIVE 5 percent DISCOUNTS ON TOMATOES AND NAIL POLISH
10 PERCENT DISCOUNTS ON THERMOMETER, HAIRGEL, CANOLA OIL AND CALCULATORS
Enter number of items if you want to buy in medical else enter 0: 0
Enter number of items if you want to buy in grocery else enter 0: 0
Enter number of items if you want to buy in cosmetics else enter 0: 0
Enter number of items if you want to buy in daily essentials else enter 0: 0
Enter number of items if you want to buy in stationery else enter 0: 0
BILL:
TOTAL NUMBER OF ITEMS PURCHASED=0
TOTAL PRICE=0.000000
Would you like to avail some discount on your bill using coupon code?
type
1.YES
2.NO
Your bill amount is 0.000000
How do you want to take your Items?
1.At the Counter
2.To Ship them to an address
```

```
BILL:
TOTAL NUMBER OF ITEMS PURCHASED=0
TOTAL PRICE=0.000000
Would you like to avail some discount on your bill using coupon code?
type
1.YES
2.NO
Your bill amount is 0.000000
How do you want to take your Items?
1.At the Counter
2.To Ship them to an address
The amount to be paid is 0.000000
Enter the cash
Number of 50's 0
Number of 100's 0
Number of 200's 0
Number of 500's 0
Number of 2000's
The total bill is paid and Please collect your items at the counter
Can you spend your esteemed time by giving a rating
Press 1 for yes and 2 for no
       THANKS FOR VISITING OUR STORE
           SEE YOU AGAIN.
.. Program finished with exit code 0
Press ENTER to exit console.
```

6 References:

- 1. https://www.codewithc.com/mini-project-in-c-medical-store-management-system/
- 2. https://www.codewithc.com/mini-project-in-c-telecom-billing-system/

**** END ****