1)

```
#include <stdio.h>
 int main()
 {
    printf("Name   : Alexandra Abramov\n");
    printf("DOB    : July 14, 1975\n");
    printf("Mobile : 99-9999999999\n");
    return(0);
 }
```

```
#include <stdio.h>
int main(void) {
char name[] = "Alexandra Abramov";
char dob[] = "July 14, 1975";
char mob[] = "99-9999999999";
printf("Name \t : %s\n", name);
printf("DOB \t : %s\n", dob);
printf("Mobile \t: %s\n", mob);
return 0;
}
```

```
#include <stdio.h>
```

```
int main()
{
char name[30];
char birthdate[10];
char phone[12];
printf("Please enter your first name:\n");
scanf("%s", name);
printf("Please enter your birthdate
(dd/mmy/yyy):\n");
scanf("%s", birthdate);
printf("Please enter your phone number (xxx-
xxx-xxxx):\n\n");
scanf("%s", phone);
printf("Your name is: %s.\n", name);
printf("Your birthdate is: %s.\n", birthdate);
printf("Your phone number is: %s.\n", phone);
return 0;
}
```

2)

```
#include <stdio.h>
 int main()
 {
     printf("#######\n");
     printf("#\n");
     printf("#\n");
     printf("######\n");
     printf("#\n");
     printf("#\n");
     printf("#\n");

     return(0);
}
```

```
#include <stdio.h>
int main()
{
int hashes[] = {6, 1, 1, 5, 1, 1, 1};
for(int i = 0; i < 7; ++i){
for(int j = 0; j < hashes[i]; ++j){
printf("#");
}
```

```
puts("");
}
return 0;
}

#include<stdio.h>
#include<stdlib.h>
int main()
{
int j=5;
int k=3;
for(int i=0;i<2;i++)
{
for(j;j>0;j--)
{
printf("#");
}
for(k;k>0;k--)
{
printf("#\n");
}
j=4;
k=4;
```

```
}
return 0;
}
```

3)

```
#include <stdio.h>
 int main()
 {
   printf("    #######\n");
   printf("  ##      ##\n");
   printf(" #\n");
   printf(" #\n");
   printf(" #\n");
   printf(" #\n");
   printf(" #\n");
   printf("  ##      ##\n");
   printf("    #######\n");

      return(0);
}
```

```
#include <stdio.h>
#include <stdlib.h>
```

```
int main()
{
int hashes[] = {-3, 6, -1, 2, 0, -6, 2, 1, 1, 1, 1, 1,
-1, 2, 0, -6, 2, -3, 6};
for(int i = 0; i < sizeof(hashes)/sizeof(int); ++i){
for(int j = 0; j < abs(hashes[i]); ++j){
if (hashes[i] < 0) {
printf(" ");
} else {
printf("#");
}
}
if (hashes[i + 1] != 0 && hashes[i] > 0) {
puts("");
}
}
puts("");
return 0;
}

#include <stdio.h>
int main(void) {
int i,j,counter=0;
```

```
for(i=0;i<=7;i++){
if(i==0){
printf(" ");
for(j=0;j<5;j++){
printf("#");
}
printf(" ");
printf("\n");
}
if(i==1){
printf(" ##");
for(j=0;j<5;j++){
printf(" ");
}
printf("## ");
}
printf("\n");
if(i>1){
if(i<6){
printf("#\n");
}
if(i==6){
printf(" ##");
```

```
for(j=0;j<5;j++){
printf(" ");
}
printf("## ");
}
printf("\n");
if(i==7){
printf(" ");
for(j=0;j<5;j++){
printf("#");
}
printf(" ");
printf("\n");
}
}
}
return 0;
}

#include <stdio.h>
#include <stdlib.h>
int main()
{
```

```
int i;
for(i=0;i<=9;i++)
{
if(i==0 || i==9) printf(" ######\n");
if(i==1 || i==8) printf(" ## ##\n");
else printf("#\n");
}
return 0;
}
```

4)

```
#include <stdio.h>
 int main()
 {
    char char1 = 'X';
    char char2 = 'M';
    char char3 = 'L';

      printf("%The reverse of %c%c%c is
%c%c%c\n",
            char1, char2, char3,
            char3, char2, char1);
```

```
    return(0);
}

#include <stdio.h>
#include <stdlib.h>
int main(int argc, char** argv) {
int i;
int j;
char letters[3]="";
printf("Enter three letters!");
scanf("%s",letters);
for(i=2;i>=0;i--){
printf("%c", letters[i]);
}
return (EXIT_SUCCESS);
}
#include <stdio.h>
#include <stdlib.h>
int main()
{
int i;
char strng[5]="XML";
```

```
for (i=2;i>=0;i--)
{
printf("string is %c\n",strng[i]);
}
return 0;
}

#include <stdio.h>
int main()
{
char letters[] = "XML";
for (int i = sizeof(letters) - 1; i >= 0; --i) {
printf("%c", letters[i]);
}
return 0;
}
```

5)

```
#include <stdio.h>
/* height and width of a rectangle in inches */
int width;
int height;
```

```
int area;
int perimeter;

int main() {
      height = 7;
      width = 5;

    perimeter = 2*(height + width);
      printf("Perimeter of the rectangle = %d
inches\n", perimeter);

      area = height * width;
      printf("Area of the rectangle = %d square
inches\n", area);

return(0);
}

#include<stdio.h>
#include<stdlib.h>
int main()
{
```

```
int l,w;
printf("Enter length: ");
scanf("%i",&l);
printf("Enter width: ");
scanf("%i",&w);
printf("Parameter of the rectangle is %i
inches\nArea of the rectangle is %i
inches\n",(2*(l+w)),(l*w));
return 0;
}
```

6)

```
#include <stdio.h>
int main() {
   int radius;
   float area, perimeter;
   radius = 6;

   perimeter = 2*3.14*radius;
   printf("Perimeter of the Circle = %f inches\n",
perimeter);
```

```
    area = 3.14*radius*radius;
    printf("Area of the Circle = %f square
inches\n", area);

return(0);
}
```

7)

```
#include <stdio.h>
int main()
{
   int a = 125, b = 12345;
   long ax = 1234567890;
   short s = 4043;
   float x = 2.13459;
   double dx = 1.1415927;
   char c = 'W';
   unsigned long ux = 2541567890;

   printf("a + c =  %d\n", a + c);
   printf("x + c = %f\n", x + c);
   printf("dx + x = %f\n", dx + x);
```

```
    printf("((int) dx) + ax =  %ld\n", ((int) dx) +
ax);
    printf("a + x = %f\n", a + x);
    printf("s + b =  %d\n", s + b);
    printf("ax + b = %ld\n", ax + b);
    printf("s + c =  %hd\n", s + c);
    printf("ax + c = %ld\n", ax + c);
    printf("ax + ux = %lu\n", ax + ux);

    return 0;
}
```

8)

```
#include <stdio.h>
int main()
{
    int days, years, weeks;

    days = 1329;

    // Converts days to years, weeks and days
    years = days/365;
    weeks = (days % 365)/7;
```

```
    days = days- ((years*365) + (weeks*7));

    printf("Years: %d\n", years);
    printf("Weeks: %d\n", weeks);
    printf("Days: %d \n", days);

    return 0;
}
```

9)

```
#include <stdio.h>
int main()
  {
    int x, y, sum;
    printf("\nInput the first integer: ");
    scanf("%d", &x);
    printf("\nInput the second integer: ");
    scanf("%d", &y);
    sum = x + y;
    printf("\nSum of the above two integers =
%d\n", sum);
    return 0;
}
```

10)

```
#include <stdio.h>
int main()
  {
    int x, y, result;
   printf("\nInput the first integer: ");
   scanf("%d", &x);
   printf("\nInput the second integer: ");
   scanf("%d", &y);
   result = x * y;
    printf("Product of the above two integers =
%d\n", result);
}
```

11)

```
#include <stdio.h>
int main()
  {
    double wi1, ci1, wi2, ci2, result;
   printf("Weight - Item1: ");
    scanf("%lf", &wi1);
    printf("No. of item1: ");
```

```
    scanf("%lf", &ci1);
    printf("Weight - Item2: ");
    scanf("%lf", &wi2);
    printf("No. of item2: ");
    scanf("%lf", &ci2);
    result = ((wi1 * ci1) + (wi2 * ci2)) / (ci1 +
ci2);
    printf("Average Value = %f\n", result);
    return 0;
}
```

12)

```
#include <stdio.h>
#include <stdlib.h>

int main()
{
   int x, y, z, result, max;
   printf("\nInput the first integer: ");
   scanf("%d", &x);
   printf("\nInput the second integer: ");
   scanf("%d", &y);
   printf("\nInput the third integer: ");
```

```
    scanf("%d", &z);
    result=(x+y+abs(x-y))/2;
    max=(result+z+abs(result-z))/2;
    printf("\nMaximum value of three integers:
%d", max);
      printf("\n");
    return 0;
}
```

```
#include <stdio.h>
int main() {
int x = 0,
y = 0,
z = 0,
output = 0;
puts("Enter three integers: ");
if (scanf("%i %i %i", &x, &y, &z) == 3) {
output = x;
if (y > output) output = y;
if (z > output) output = z;
printf("The greatest integer is %i\n", output);
} else {
puts("I could not read that");
```

```
}
return 0;
}
```

13)

```
#include <stdio.h>
#include <stdlib.h>

int main()
{
    int x, y, z, result, max;
    printf("\nInput the first integer: ");
    scanf("%d", &x);
    printf("\nInput the second integer: ");
    scanf("%d", &y);
    printf("\nInput the third integer: ");
    scanf("%d", &z);
    result=(x+y+abs(x-y))/2;
    max=(result+z+abs(result-z))/2;
    printf("\nMaximum value of three integers:
%d", max);
     printf("\n");
```

```
    return 0;
}
```

```
#include <stdio.h>
int main(void) {
int i, j, k;
printf("Enter input value (-- -- --): ");
scanf("%d %d %d", &i, &j, &k);
if(i > j && i > k) {
printf("%d is greater than %d and %d\n", i, j, k);
} else if(j > i && j > k) {
printf("%d is greater than %d and %d\n", j, i, k);
} else if(k > j && k > i) {
printf("%d is greater than %d and %d\n", k, j, i);
} else {
printf("ERROR: Failed to read data!\n");
}
return 0;
}
```

14)

```
#include <stdio.h>
```

```
int main()
{
    int x;
    float y;
    printf("Input total distance in km: ");
    scanf("%d",&x);
    printf("Input total fuel spent in liters: ");
    scanf("%f", &y);
    printf("Average consumption (km/lt) %.3f
",x/y);
    printf("\n");
    return 0;
}
```

15)

```
#include <stdio.h>
#include <math.h>

int main() {
    float x1, y1, x2, y2, gdistance;
    printf("Input x1: ");
    scanf("%f", &x1);
    printf("Input y1: ");
```

```
    scanf("%f", &y1);
        printf("Input x2: ");
    scanf("%f", &x2);
    printf("Input y2: ");
    scanf("%f", &y2);
    gdistance = ((x2-x1)*(x2-x1))+((y2-
y1)*(y2-y1));
    printf("Distance between the said points:
%.4f", sqrt(gdistance));
    printf("\n");
    return 0;
}
```

16)

```
#include <stdio.h>
int main() {
    int amt, total;
    printf("Input the amount: ");
    scanf("%d",&amt);
    total = (int)amt/100;
    printf("There are: ");
    printf("\n%d Note(s) of 100.00\n", total);
    amt = amt-(total*100);
```

```
    total = (int)amt/50;
    printf("%d Note(s) of 50.00\n", total);
    amt = amt-(total*50);
    total = (int)amt/20;
    printf("%d Note(s) of 20.00\n", total);
    amt = amt-(total*20);
    total = (int)amt/10;
    printf("%d Note(s) of 10.00\n", total);
    amt = amt-(total*10);
    total = (int)amt/5;
    printf("%d Note(s) of 5.00\n", total);
    amt = amt-(total*5);
    total = (int)amt/2;
    printf("%d Note(s) of 2.00\n", total);
    amt = amt-(total*2);
    total = (int)amt/1;
    printf("%d Note(s) of 1.00\n", total);
    return 0;
}
```

17)

```
#include <stdio.h>
int main() {
```

```
    int sec, h, m, s;
    printf("Input seconds: ");
    scanf("%d", &sec);
    h = (sec/3600);
    m = (sec -(3600*h))/60;
    s = (sec -(3600*h)-(m*60));
    printf("H:M:S - %d:%d:%d\n",h,m,s);
    return 0;
}
```

18)

```
#include <stdio.h>
int main() {
    int ndays, y, m, d;
    printf("Input no. of days: ");
    scanf("%d", &ndays);
    y = (int) ndays/365;
    ndays = ndays-(365*y);
    m = (int)ndays/30;
    d = (int)ndays-(m*30);
    printf(" %d Year(s) \n %d Month(s) \n %d
Day(s)", y, m, d);
    return 0;
```

```
}
```

19)

```
#include <stdio.h>
int main() {
    int p, q, r, s;

   printf("\nInput the first integer: ");
   scanf("%d", &p);
   printf("\nInput the second integer: ");
   scanf("%d", &q);
   printf("\nInput the third integer: ");
   scanf("%d", &r);
   printf("\nInput the fourth integer: ");
   scanf("%d", &s);

    if((q > r) && (s > p) && ((r+s) > (p+q)) &&
(r > 0) && (s > 0) && (p%2 == 0))
     {
         printf("\nCorrect values\n");
    }
    else {
         printf("\nWrong values\n");
```

```
    }
    return 0;
}
```

20)

```
#include <stdio.h>
#include <math.h>
int main() {
    double a, b, c, pr1;
    printf("\nInput the first number(a): ");
   scanf("%lf", &a);
   printf("\nInput the second number(b): ");
   scanf("%lf", &b);
   printf("\nInput the third number(c): ");
   scanf("%lf", &c);

    pr1 = (b*b) - (4*(a)*(c));

   if(pr1 > 0 && a != 0) {
        double x, y;
        pr1 = sqrt(pr1);
        x = (-b + pr1)/(2*a);
        y = (-b - pr1)/(2*a);
```

```
            printf("Root1 = %.5lf\n", x);
            printf("Root2 = %.5lf\n", y);
        }
        else
         {
            printf("\nImpossible to find the
roots.\n");
        }

        return 0;
}
```

21)

```
#include <stdio.h>

int main() {
        int x;
        printf("\nInput an intger: ");
        scanf("%d", &x);
        if(x >=0 && x <= 20)
        {
            printf("Range [0, 20]\n");
        }
```

```
    else if(x >=21 && x <= 40)
    {
        printf("Range (25,50]\n");
    }
    else if(x >=41 && x <= 60)
    {
        printf("Range (50,75]\n");
    }
    else if(x >61 && x <= 80) {

        printf("Range (61,80]\n");
    }
    else
    {
    printf("Outside the range\n");
    }
    return 0;
}
```

22)

```
#include <stdio.h>
int main() {
    int j, numbers[5],total=0;
```

```
    printf("\nInput the first number: ");
   scanf("%d", &numbers[0]);
   printf("\nInput the second number: ");
   scanf("%d", &numbers[1]);
   printf("\nInput the third number: ");
   scanf("%d", &numbers[2]);
    printf("\nInput the fourth number: ");
   scanf("%d", &numbers[3]);
   printf("\nInput the fifth number: ");
   scanf("%d", &numbers[4]);
    for(j = 0; j < 5; j++) {
        if((numbers[j]%2) != 0)
        {
          total += numbers[j];
        }
   }
    printf("\nSum of all odd values: %d", total);
    printf("\n");
    return 0;
}
```

23)
```
#include <stdio.h>
int main() {
```

```
    float  x, y, z, P, A;
   printf("\nInput the first number: ");
   scanf("%f", &x);
   printf("\nInput the second number: ");
   scanf("%f", &y);
   printf("\nInput the third number: ");
   scanf("%f", &z);

   if(x < (y+z) && y < (x+z) && z < (y+x))
    {
      P = x+y+z;
      printf("\nPerimeter  = %.1f\n", P);

   }
   else
   {
     printf("Not possible to create a triangle..!");
      }
}
```

24)

```
#include <stdio.h>
```

```
int main() {
   int  x, y;
    printf("\nInput the first
number: ");
    scanf("%d", &x);
    printf("\nInput the second
number: ");
    scanf("%d", &y);

    if(x > y)
   {
      int temp;
      temp = x;
      x = y;
      y = temp;
   }

   if((y % x)== 0)
   {
      printf("\nMultiplied!\n");
   }
   else
```

```
    {
        printf("\nNot Multiplied!\n");
    }

    return 0;
}
```

25)

```
#include <stdio.h>

int main() {
    int mno;
    printf("\nInput a number between
1 to 12 to get the month name: ");
    scanf("%d", &mno);
    switch(mno) {
        case 1 : printf("January\n");
break;
        case 2 : printf("February\n");
break;
        case 3 : printf("March\n");
break;
```

```
      case 4 : printf("April\n");
break;
      case 5 : printf("May\n");
break;
      case 6 : printf("June\n");
break;
      case 7 : printf("July\n");
break;
      case 8 : printf("August\n");
break;
      case 9 :
printf("September\n"); break;
      case 10 : printf("October\n");
break;
      case 11 :
printf("November\n"); break;
      case 12 :
printf("December\n"); break;
      default : printf("Input a
number between 1 to 12.");
   }
   return 0;
```

```
}
```

26)

```
#include <stdio.h>

int main() {
   int i;
   printf("Even numbers between 1
to 50 (inclusive):\n");
   for (i = 1; i <= 50; i++)
   {
      if(i%2 == 0)
      {
        printf("%d ", i);
      }
   }
   return 0;
}
```

```
#include <stdio.h>
int main()
{
int i;
```

```
for (i = 2; i <= 50; i += 2){
printf("%d ",i);
}
return 0;
}
```

27)

```
#include <stdio.h>
int main() {
   float numbers[5];
   int j, pctr=0, nctr=0;
   printf("\nInput the first
number: ");
    scanf("%f", &numbers[0]);
    printf("\nInput the second
number: ");
    scanf("%f", &numbers[1]);
    printf("\nInput the third
number: ");
    scanf("%f", &numbers[2]);
   printf("\nInput the fourth
number: ");
    scanf("%f", &numbers[3]);
```

```
    printf("\nInput the fifth
number: ");
    scanf("%f", &numbers[4]);
   for(j = 0; j < 5; j++) {
      if(numbers[j] > 0)
      {

         pctr++;
      }
      else if(numbers[j] < 0)
      {
         nctr++;
      }
   }
   printf("\nNumber of positive
numbers: %d", pctr);
   printf("\nNumber of negative
numbers: %d", nctr);
   printf("\n");
   return 0;
}
```

28)

```
#include <stdio.h>
int main() {
   float numbers[5],total=0, avg;
   int j, pctr=0;
   printf("\nInput the first
number: ");
    scanf("%f", &numbers[0]);
    printf("\nInput the second
number: ");
    scanf("%f", &numbers[1]);
    printf("\nInput the third
number: ");
    scanf("%f", &numbers[2]);
   printf("\nInput the fourth
number: ");
    scanf("%f", &numbers[3]);
    printf("\nInput the fifth
number: ");
    scanf("%f", &numbers[4]);
   for(j = 0; j < 5; j++) {
      if(numbers[j] > 0)
```

```
      {
         pctr++;
         total += numbers[j];
      }
    }
    avg = total/pctr;
   printf("\nNumber of positive
numbers: %d", pctr);
   printf("\nAverage value of the
said positive numbers: %.2f", avg);
   printf("\n");
   return 0;
}
```

29)

```
#include <stdio.h>
int main() {
   int j, numbers[5],total=0;
   printf("\nInput the first
number: ");
    scanf("%d", &numbers[0]);
```

```
    printf("\nInput the second
number: ");
    scanf("%d", &numbers[1]);
    printf("\nInput the third
number: ");
    scanf("%d", &numbers[2]);
   printf("\nInput the fourth
number: ");
    scanf("%d", &numbers[3]);
    printf("\nInput the fifth
number: ");
    scanf("%d", &numbers[4]);
   for(j = 0; j < 5; j++) {
      if((numbers[j]%2) != 0)
      {
         total += numbers[j];
      }
    }
      printf("\nSum of all odd
values: %d", total);
   return 0;
}
```

30)

```
#include <stdio.h>

int main() {
   int x, i;
   printf("Input an integer: ");
   scanf("%d", &x);
   printf("List of square of each
one of the even values from 1 to a
%d :\n",x);
   for(i = 2; i <= x; i++) {
      if((i%2) == 0) {
         printf("%d^2 = %d\n", i,
i*i);
      }
   }

   return 0;
}
```

31)

```
#include <stdio.h>
int main() {
    int x;
   printf("Input an integer: ");
   scanf("%d", &x);

      if(x == 0){
         printf("Positive\n");
      }
      else if(x < 0 && (x%2) != 0)
      {
         printf("Negative Odd\n");
      }
      else if(x < 0 && (x%2) == 0)
      {
         printf("Negative Even\n");
      }
      else if(x > 0 && (x%2) != 0)
      {
         printf("Positive Odd\n");
```

```
        }
        else if(x > 0 && (x%2) == 0)
        {
            printf("Positive Even\n");
        }

    return 0;
}
```

32)

```
#include <stdio.h>
int main() {
    int x, i;
    printf("Input an integer: ");
    scanf("%d", &x);

    for(i = 1; i <= 500; i++)
    {
        if((i%x) == 3) {
            printf("%d\n", i);
        }
    }
```

```
    return 0;
}
```

33)

```
#include <stdio.h>
#define MAX 5

int main()
{
   int number[MAX], i, j, max=0,
num_pos=0;
   printf("Input 5 integers: \n");
   for(i = 0; i < MAX; i++) {
      scanf(" %d", &number[i]);
   }

   for(j = 0; j < MAX; j++)
   {
      if(number[j] > max) {
         max = number[j];
         num_pos = j;
      }
```

```
    }
    printf("Highest value:
%d\nPosition: %d\n", max,
num_pos+1);
    return 0;
}
```

34)

```
#include <stdio.h>
int main()
  {
    int x, y, i, total = 0;
                printf("\nInput a
pair of numbers (for example
10,2):");
    printf("\nInput first number of
the pair: ");
    scanf("%d", &x);
                printf("\nInput second
number of the pair: ");
    scanf("%d", &y);
    if (x<y)
```

```
    {
        return 0;
    }
    printf("\nList of odd numbers:
");
    for(i = y; i<=x; i++)
    {
      if ((i%2) != 0)
      {
       printf("%d\n", i);
       total += i;

       }
     }
    printf("Sum=%d\n", total);

    return 0;
}
```

35)

```
#include <stdio.h>
```

```
int main()
  {
   int x, y, i, total = 0;
    printf("\nInput a pair of
numbers (for example 10,2 :
2,10):");
   printf("\nInput first number of
the pair: ");
   scanf("%d", &x);
    printf("\nInput second number
of the pair: ");
   scanf("%d", &y);

   if (x>y)
     {
      printf("The pair is in
descending order!");
     }
     else
     {
      printf("The pair is in
ascending order!");
```

```
      }
      printf("\n");
}
```

36)

```
#include <stdio.h>
int main() {
   int pass, x=10;

   while (x!=0)
   {
   printf("\nInput the password:
");
   scanf("%d",&pass);

   if (pass==1234)
   {
      printf("Correct password");
      x=0;
    }
    else
    {
```

```
        printf("Wrong password, try
another");
    }
    printf("\n");
    }
    return 0;
}
```

```
#include <stdio.h>

int main(void) {
/* Local Variable Declaration */
int password, tries = 1;

do {
printf("Enter password: ");
scanf("%d", &password);

switch(password) {
case 1234:
/* Correct Password */
printf("Correct Password!\n");
return 0;
break;
```

```
default:
/* Print Error Message */
printf("Incorrect Password!\nTry again! (try
no. %d)\n", tries);
break;
}
tries++;
} while(tries != 4);
return 0;
}
```

37)

```
#include <stdio.h>
int main()
{
   int x, y;
    printf("Input the
Coordinate(x,y): ");
   printf("\nx: ");
    scanf("%d", &x);
    printf("y: ");
    scanf("%d", &y);
```

```
        if(x > 0 && y > 0)
        {
           printf("Quadrant-
I(+,+)\n");
        }
        else if(x> 0 && y < 0)
        {
              printf("Quadrant-II(+,-
)\n");
        }
        else if(x < 0 && y < 0)
        {
              printf("Quadrant-III(-,-
)\n");
        }
        else if(x < 0 && y > 0)
        {
           printf("Quadrant-IV(-
,+)\n");
        }
    return 0;
```

```
}
```

38)

```
#include <stdio.h>
int main() {
   int x, y;
   float div_result;
    printf("Input two numbers: ");
   printf("\nx: ");
    scanf("%d", &x);
    printf("y: ");
    scanf("%d", &y);

   if(y != 0)
     {
        div_result =
(float)x/(float)y;
     printf("%.1f\n", div_result);
    }
   else
    {
```

```
        printf("Division not
possible.\n");
     }
  return 0;
}
```

39)

```
#include <stdio.h>
int main() {

   int x, y, temp, i, sum=0;
    printf("\nInput the first
integer: ");
    scanf("%d", &x);
    printf("\nInput the second
integer: ");
    scanf("%d", &y);
   if(x > y) {
      temp = y;
      y = x;
      x = temp;
   }
```

```
    for(i = x; i <= y; i++) {
       if((i % 17) != 0) {
          sum += i;
       }
    }

    printf("\nSum: %d\n", sum);

    return 0;
}
```

40)

```
#include <stdio.h>
int main() {

    int x, y, temp, i, sum=0;
     printf("\nInput the first
integer: ");
     scanf("%d", &x);
     printf("\nInput the second
integer: ");
```

```
    scanf("%d", &y);
    if(x > y)
   {
      temp = y;
      y = x;
      x = temp;
   }

   for(i = x+1; i < y; i++)
   {
      if((i%7) == 2 || (i%7) == 3) {
         printf("%d\n", i);
      }
   }

   return 0;
}
```

41)

```
#include <stdio.h>
int main() {
   int a, i, j = 1, x = 0;
```

```
   printf("Input number of lines:
");
   scanf("%d", &a);
   for(i = 1; i <= a; i++) {
      while(x < 3) {
         printf("%d ", j++);
         x++;
      }
      x = 0;
      printf("\n");
   }

   return 0;
}
```

42)

```
#include <stdio.h>
int main() {
   int a, i, j = 1, x = 0;
   printf("Input number of lines:
");
   scanf("%d", &a);
```

```
    for(i = 1; i <= a; i++) {
      printf("%d %d %d\n", i, i*i,
i*i*i);
    }

   return 0;
}
```

43)

```
#include <stdio.h>
int main() {
   int x, y, i, j, l;
   printf("Input number of lines:
");
   scanf("%d", &x);
   printf("Number of characters in
a line: ");
    scanf("%d", &y);
   for(i = 1, l=1; i <= x; i++)
     {
```

```
        for(j = 1; j <= y; j++)
        {
          printf("%d ",l);
          l++;
           }
           printf("\n");
        }

   return 0;
}
```

44)

```
#include <stdio.h>
int main()
{
   int marks[99], m, i, a=0,
total=0;
   float f;
   printf("Input Mathematics marks
(0 to terminate): ");
   for(i = 0; ; i++)
   {
```

```
        scanf("%d", &marks[i]);
        if(marks[i] <= 0) {
        break;
        }
        a++;
        total += marks[i];
    }
    f = (float)total/(float)a;
    printf("Average marks in
Mathematics: %.2f\n", f);
    return 0;
}
```

45)

```
#include <stdio.h>
int main() {
    float S = 0;
    int i;
    for(i=1; i<=50; i++)
    {
        S += (float)1/i;
     }
```

```
    printf("Value of S: %.2f\n",
S);

   return 0;
}
```

46)

```
#include <stdio.h>
int main() {
   double s=0, j=1, d, i;

   for(i=1; i<=7; i+=2){

      d = (i/j);
      s += d;
      j = j*2;
   }
    printf("Value of series:
%.2lf\n", s);
    return 0;
}
```

47)

```c
#include <stdio.h>
int main() {
   int x, i;
   printf("\nInput an integer: ");
   scanf("%d", &x);
   printf("All the divisor of %d
are: ", x);
   for(i = 1; i <= x; i++) {
      if((x%i) == 0){
         printf("\n%d", i);
         printf("\n");
      }
   }

   return 0;
}
```

48)

```c
#include <stdio.h>
int main() {
   int n[5], i, x;
```

```
   printf("Input the 5 members of
the array:\n");
   for(i = 0; i < 5; i++)
   {
      scanf("%d", &x);
      if(x>0)
      {
        n[i] = x;
      }
      else
       {
         n[i] = 100;
      }
   }
   printf("Array values are: \n");
   for(i = 0; i < 5; i++) {
      printf("n[%d] = %d\n", i,
n[i]);
   }
   return 0;
}
```

49)

```
#include <stdio.h>
int main() {
   int n[5], i, x;
   printf("Input the first number
of the array:\n");

   scanf("%d", &x);
   for(i = 0; i < 5; i++)
   {
      n[i] = x;
      x = 3*x;
   }

   for(i = 0; i < 5; i++)
   {
      printf("n[%d] = %d\n", i,
n[i]);
   }
   return 0;
}
```

50)

```
#include <stdio.h>
#include <string.h>
#define AL 5
#define MAX 5

int main() {
   float N[AL];
   int i;
   printf("Input the 5 members of
the array:\n");
   for(i = 0; i < AL; i++) {
      scanf("%f", &N[i]);
   }
   for(i = 0; i < AL; i++) {
      if(N[i] < MAX) {
         printf("A[%d] = %.1f\n", i,
N[i]);
      }
   }
   return 0;
}
```

51)

```
#include <stdio.h>
#define AL 5

int main() {
   int array_n[AL], i, temp;

   printf("Input the 5 members of
the array:\n");
   for(i = 0; i <  AL; i++) {
      scanf("%d", &array_n[i]);
   }

   for(i = 0; i < AL; i++) {
      if(i < (AL/2)) {
         temp = array_n[i];
         array_n[i] = array_n[AL-
(i+1)];
         array_n[AL-(i+1)] = temp;
      }
   }
```

```
   for(i = 0; i < AL; i++) {
      printf("array_n[%d] = %d\n",
i, array_n[i]);
   }
   return 0;
}
```

52)

```
#include <stdio.h>
int main() {
   int e, i, sval, position;

   printf("\nInput the length of
the array: ");
   scanf("%d", &e);

   int v[e];
    printf("\nInput the array
elements:\n ");
   for(i = 0; i < e; i++) {
         scanf("%d", &v[i]);
```

```
   }
   sval = v[0];
   position = 0;
   for(i = 0; i < e; i++) {
      if(sval > v[i]) {
         sval = v[i];
         position = i;
      }
   }

   printf("Smallest Value: %d\n",
sval);
   printf("Position of the element:
%d\n", position);
   return 0;
}
```