

## Practical 01

1) #include<stdio.h>

```
int main()
{
    printf("Lasan Sanjula\n");
    printf("Thurstan College");
    return 0;
}
```

2) #include<stdio.h>

```
int main()
{
    printf("*\n"); printf("**\n"); printf("***\n");
    printf("****\n"); printf("*****");
    return 0;
}
```

3) #include<stdio.h>

```
int main()
{
    int x; float y; double z; char a;
    printf("Enter integer values:");
    scanf("%d",&x);
    printf("Enter decimal values:");
    scanf("%f",&y);
    printf("Enter decimal values:");
    scanf("%if",&z);
    printf("Enter a word\n");
    scanf("%s",&a); printf("integer:%d\n",x);
    printf("decimal:%f\n",y);
    printf("double:%if\n",z);
    printf("characters:%s",a);
    return 0;
}
```

```
4) #include<stdio.h>
int main()
{
    int num1,num2,total;
    scanf("%d",&num1);
    scanf("%d",&num2);
    total=num1+num2;
    printf("Total %d",total);
    return 0;
}
```

```
5) #include<stdio.h>
int main()
{
    int num1,num2,num3;
    printf("number 01:",num1);
    scanf("%d",&num1);
    printf("number 02:",num2);
    scanf("%d",&num2);
    num3=num1;
    num1=num2;
    num2=num3;
    printf("number 01:%d\n",num1);
    printf("number 02:%d\n",num3);
    return 0;
}
```

```
6) #include<stdio.h>
int main()
{
    char name[23];
    int x;
    int age,y;
    printf("Lasan:");
    scanf("%s",&name);
    printf("2003:");
    scanf("%d",&x);
    printf("Enter the current year:");
    scanf("%d",&y);
    age=y-x;
    printf("name:%s\n",name);
    printf("age:%d\n",age);
    return 0;
}
```

7) `#include<stdio.h>`  
`int main()`  
`{`  
`int num1,num2,num3;`  
`printf("number 01:",num1);`  
`scanf("%d",&num1);`  
`printf("number 02:",num2);`  
`scanf("%d",&num2);`  
`num3=num1;`  
`num1=num2;`  
`num2=num3;`  
`printf("number 01:%d\n",num1);`  
`printf("number 02:%d\n",num3);`  
`return 0;`  
`}`

8) The color: blue  
First number: 12345  
Second number: 0025  
Third number: 1234  
Float number: 3.14  
Hexadecimal: ff  
Octal: 377  
Unsigned value: 150  
Just print the percentage sign %

<b>Practical Number</b>	02
<b>Areas covered</b>	Data Input & output

Write a C program for each of the following question

### **Question 1**

Have the computer print

**HI, HOW OLD ARE YOU?**

on one line. The user then enters his or her age immediately after the question mark. The computer then skips two lines and prints on two consecutive lines.

**WELCOME (age)**

**LET'S BE FRIENDS!**

Write a complete C program to do the above.

```
#include <stdio.h>
int main()
{
    int age;
    printf("Hi, How Old Are You?");
    scanf("%d",&age);

    printf("\n");
    printf("\n");

    printf("Welcome%d\n", age);
    printf ("LET'S BE FREINDS!\n");

}
```

### Question 2

Write a program which uses the **format commands** with modifiers to print the following output:

```
#include<stdio.h>
int main()
{
printf("2 4 8\n");
printf("3 9 27\n");
printf("5 25 125\n");

}
```

### Question 3

Write a simple program to evaluate the average speed of a car traveled in meters per second ( $\text{ms}^{-1}$ ).  
Given that

Try using integer variables. What would be the problem? Why? How to fix the problem?

```
#include <stdio.h>
int main()
{
float speed,distance,time;

printf("Enter Your Distance: ",distance);
scanf("%f",&distance);

printf("Enter Your Time: ", time);
scanf("%f",&time);

speed=distance/time;

printf("Your Average Speed is %f",speed);

}
```

#### **Question 4**

Convert a temperature reading in degrees Fahrenheit to degrees Celsius, using the formula

$$C = ( 5 / 9 ) \times ( F - 32 )$$

Test the program with the following values: 68, 150, 212, 0, -22, -200 (degree Fahrenheit).

```
#include <stdio.h> int
main()
{
float fahrenheit,celsius;
printf("Enter fahrenheit: ");
scanf("%f",&fahrenheit);

celsius= (5.0/9.0) * (fahrenheit-32);

printf("celsius %.2f",celsius);
}
```