1) Display multiple variables.

Sample Variables :

a+ c, x + c,dx + x, a + x, s + b, ax + b, s + c, ax + c, ax + ux

Declaration :

```
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;

#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+b = %d",a+b);
printf("\na+c = %d ==> letter will be converted in to ASCII and sum with integer.",a+c);
printf("\nx+c = %f",x+c);
printf("\ndx+x = %lf",dx+x);
printf("\na+x = %f",a+x);
printf("\ns+b = %i",s+b);
printf("\nax+b = %li",ax+b);
printf("\ns+c = %i",s+c);
printf("\nax+c = %li",ax+c);
printf("\nax+ux = %li",ax+ux);
return 0;
}
```

2) Convert specified days into years, weeks and days.

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

```
 int d,y,w,d1;
 printf("Enter the Days:");
 scanf("%d",&d);
 y=d/365;
 w=(d-(y*365))/7;
d1=(d-((y*365)+(w*7)));
printf("y:%d , w: %d , d: %d ",y,w,d1);
return 0;
 }
```

3) Accepts two item's weight (floating points' values) and number of purchase (floating points' values) and calculate the average value of the items.

```
#include<stdio.h>
 int main()
 {
 float w1, w2, c1, c2, avg;
 printf("Enter the Weight's Item's (Resp.): ");
 scanf("%f %f",&w1,&w2);
printf("Enterd the number of purchased Item's (Resp.) ");
 scanf("%f %f", &c1 ,&c2);
 avg = ((w1*c1)+(w2*c2))/(c1+c2);
printf("\nAverage Value = %f\n", avg);
return 0;
}
```

4) Create enumerated data type for 7 days and display their values in integer constants.

```
#include<stdio.h>
 int main()
{
 enum week{sun=1, mon, tue, wed, thr, fri, sat};
printf("sun=%d",sun);
printf("mon=%d",mon);
printf("tue=%d",tue);
printf("wed=%d",wed);
printf("thr=%d",thr);
printf("fri=%d",fri);
printf('sat=%d",sat);
```

```
return 0;
}
```

5) Converts Centigrade to Fahrenheit.

```
#include<stdio.h>
int main()
{
float Fahrenheit, celcius;
printf("enter celcius:  ");
scanf("%f",&celcius);
fahrenheit=((celcius*9)/5)+32;
printf("\ntemperature in Fahrenheit is :  %f",Fahrenheit);
return 0;
}
```

6) Takes minutes as input, and display the total number of hours and minutes.

```
#include<stdio.h>
 int main()
 {
 int m,h,m1;
 printf("Enter the Minutes : ");
 scanf("%d",&m);
 h=m/60;
 m1=(m-h*60);
printf("h: %d, m: %d ",h,m1);
return 0;
}
```

7) Prints the perimeter of a rectangle to take its height and width as input.

```
#include<stdio.h>
 int main()
 {
 int h, w,p;
 printf("Enter the height and width of the rectangle (Resp.): ");
 scanf("%d %d",&h,&w);
 p=2*(h+w);
 printf("the perimeter of rectangle is %d Units.",p);
```

```
    return 0;
}
```

8) By using +, /, %=, >=, ! operators.

```
#include<stdio.h>
int main()
{
int a=22, b=10, c;
c=a+b;
printf("a+b =%d \n",c);
c=a/b;
printf("a/b=%d \n" ,c);
a%=b;
printf("a= %d \n",a);
a=22;
printf("%d != %d is %d \n", a, c, a != c);
printf("%d >= %d is %d \n", a, c, a >=c);
return 0;
}
```

9) By using &, |, >>, ?:, || operators.

```
#include<stdio.h>
int main()
{
int a=12,b=25,c=212,result;
printf("a&b = %d \n", a&b);
printf("a|b = %d \n", a|b);
int n=2;
printf("right shift by %d :%d \n", n, c>>2);
result=(a == b) || (c > b);
printf("(a == b) || (c >b) is %d \n",result);
result= ((a==7)?(3):(2));
printf('the value of 'result' variable is : %d",result);
return 0;
}
```

10) Find the Size of int, float, double and char.

```
#include<stdio.h>
 int main()
 {
int a;
float b;
double c;
char d;
 printf("Size of Int is %lu Bytes\n",sizeof(a));
 printf("size of Float is %lu Bytes\n",sizeof(b));
 printf("size of Double is %lu Bytes\n",sizeof(c));
printf("size of Char is %lu Bytes\n",sizeof(d));
return 0;
}
```