## PROGRAM (1): WRITE A C PROGRAM TOWRITE A C ENTER TWO NUMBERS AND PERFORM ALL ARITHMETIC OPERATIONS

```
#include <stdio.h>
int main()
{
  int a,b;
  int sum, sub, mul, div;
  printf("enter the value of a,b:");
  scanf("%d %d",&a,&b);
  sum=a+b;
  sub=a-b;
  mul=a*b;
  div=a/b;
  printf("the sum of a and b is:%d\n", sum);
  printf("the substraction of a and b is:%d\n", sub);
  printf("the multiplication of a and b is:%d\n", mul);
  printf("the division of a and b is:%d\n", div);
   return 0;
}
```

#### **OUTPUT**:

```
Output

/tmp/oVvQiR2Dit.o

enter the value of a,b:18

6

the sum of a and b is:24

the substraction of a and b is:12

the multiplication of a and b is:108

the division of a and b is:3
```

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

```
Output

/tmp/oVvQiR2Dit.o

enter temperature in celsius:25

25.000000 celsius= 77.000000 fahrenheit
```

PROGRAM (3): WRITE A C PROGRAM TO ENTER THE RADIUS OF A CIRCLE AND FIND IT'S DIAMETER, CIRCUMFERENCE AND AREA

```
#include <stdio.h>
int main()
{
  float radius,diameter,circumference,area;
  printf("\nenter the value of radius:");
  scanf("%f",&radius);
  diameter=2*radius;
  circumference=2*(22/7)*radius;
  area=(22/7)*radius*radius;
```

```
printf("\ndiameter:%f",diameter);
printf("\ncircumference:%f",circumference);
printf("\narea:%f",area);
return 0;
}
```

```
Output

/tmp/OYbozS4OyN.o
enter the value of radius:7

diameter:14.000000
circumference:42.000000
area:147.000000
```

PROGRAM (4): WRITE A C PROGRAM TO INPUT MARKS OF FIVE SUBJECTS PHYSICS, CHEMISTRY, BIOLOGY, MATHEMATICS AND COMPUTER. CALCULATE PERCENTAGE AND GRADE ACCORDING TO FOLLOWING:

Percentage >=90% : Grade A

Percentage >=80% : Grade B

Percentage >=70% : Grade C

Percentage>= 60% : Grade D

Percentage >=40% : Grade E

Percentage< 40%: Grade F

```
#include <stdio.h>
int main()
  int physics, chemistry, biology, mathematics, computer;
  float total, percentage;
  printf("enter the marks of all five subjects:");
scanf("%d%d%d%d%d",&physics,&chemistry,&biology,&mathematics,&comp
uter);
  total=physics+chemistry+biology+mathematics+computer;
  percentage=total/5;
  printf("percentage=%f\n",percentage);
  if(percentage>=90)
  {
   printf("grade A");
  else if(percentage>=80)
     printf("grade B");
  }
     else if(percentage>=70)
     {
       printf("grade C");
     else if(percentage>=60)
       printf("grade D");
     }
       else if(percentage>=40)
          printf("grade E");
       }
       else
          printf("grade F");
  return 0;
```

```
Output

/tmp/OYbozS4OyN.o
enter the marks of all five subjects:98
99
94
95
96
percentage=96.400002
grade A
```

# PROGRAM (5): WRITE A C PROGRAM TO CHECK WHETHER AN ALPHABET IS VOWEL OR CONSONANT USING SWITCH CASE

```
#include <stdio.h>
int main()
{
  char ch;
  printf("enter an alphabet:");
  scanf("%s",&ch);
  switch(ch)
  {
     case'a':
     printf("a is vowel");
     break;
     case'e':
     printf("e is vowel");
     break;
     case'i':
     printf("i is vowel");
     break;
     case'o':
```

```
printf("o is vowel");
break;
case'u':
printf("u is vowel");
break;
default:
printf("it is consonant");
}
return 0;
```

```
Output

/tmp/OYbozS4OyN.o

enter an alphabet:t

it is consonant
```

```
Output

/tmp/OYbozS4OyN.o

enter an alphabet:i
i is vowel
```