

TASK: 01

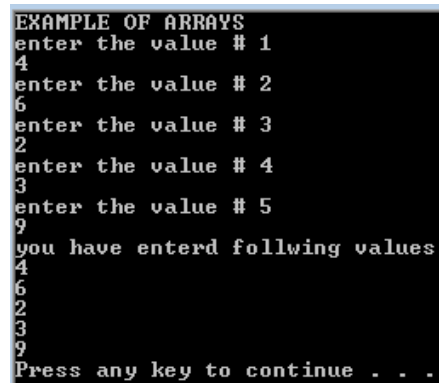
Run the sample programs, note the output and get familiar with the syntax.

Sample 1:

CODE:

```
#include "stdafx.h"
#include<iostream>
using namespace std;
int _tmain(int argc, _TCHAR* argv[])
{
    cout<<"EXAMPLE OF ARRAYS"<<endl;
    int a[5];
    for(int i=0;i<5;i++)
    {
        cout<<"enter the value # "<<i+1<<"\t"<<endl;
        cin>>a[i];
    }
    cout<<"you have entered follwing values"<<endl;
    for(int j=0;j<5;j++)
    {cout<<a[j]<<endl;}
    system("pause");
    return 0;
}
```

OUTPUT:



```
EXAMPLE OF ARRAYS
enter the value # 1
4
enter the value # 2
6
enter the value # 3
2
enter the value # 4
3
enter the value # 5
9
you have entered follwing values
4
6
2
3
9
Press any key to continue . . .
```

Sample 2:

CODE:

```
#include<iostream>

using namespace std;

int main()
{
    int avg, sum = 0 , i ;
```

```

int marks[10] ;

cout<<"enter marks = \n";

for ( i = 0 ; i <= 9 ; i++ )
{
cin>>marks[i];
}

for ( i = 0 ; i <= 9 ; i++ )
sum = sum + marks[i] ;

avg = sum / 10 ;

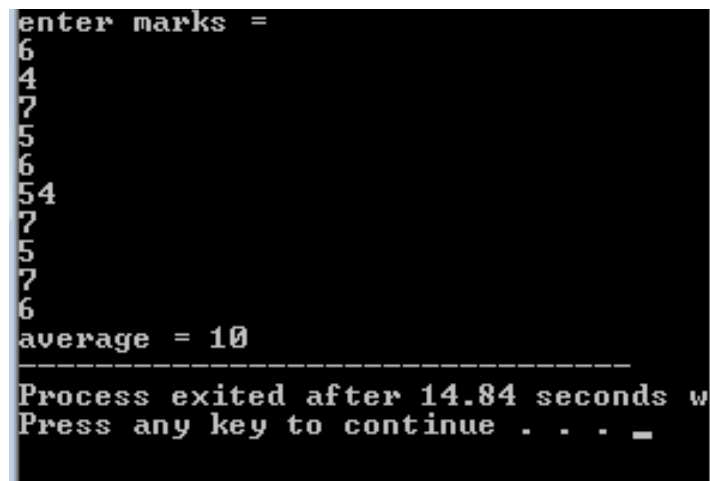
cout<<"average = "<<avg ;


return 0;

}

```

OUTPUT:



```

enter marks =
6
4
7
5
6
6
54
7
5
7
6
average = 10
-----
Process exited after 14.84 seconds w
Press any key to continue . . . _

```

TASK: 02

Create a program which take 15 input from user. Ask the user to enter a key. your program should search for the key if it is present in array? If yes then also print the number of times the key is present?

CODE:

```

#include <iostream>

using namespace std;

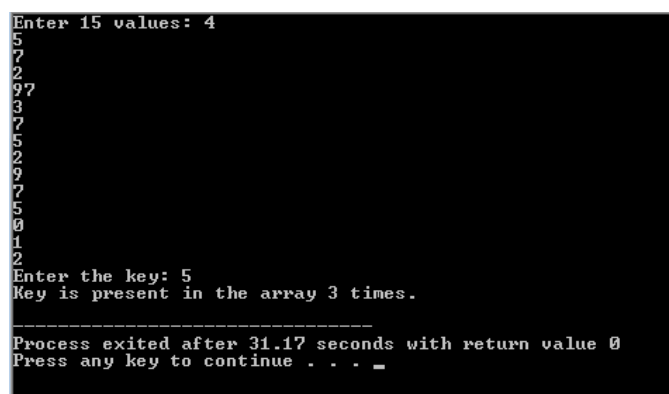
```

```

int main() {
    int arr[15];
    int key, count = 0;
    cout << "Enter 15 values: ";
    for (int i = 0; i < 15; i++)
        cin >> arr[i];
    cout << "Enter the key: ";
    cin >> key;
    for (int i = 0; i < 15; i++)
        if (arr[i] == key)
            count++;
    if (count == 0)
        cout << "Key is not present in the array." << endl;
    else
        cout << "Key is present in the array " << count << " times." << endl;
    return 0;
}

```

OUTPUT:



```

Enter 15 values: 4
5
7
2
2
9
3
7
7
5
2
9
7
5
0
1
2
Enter the key: 5
Key is present in the array 3 times.

-----
Process exited after 31.17 seconds with return value 0
Press any key to continue . . . _

```

TASK: 03

Create a C++ program to take 13 inputs from user in an array. Your program should count the number of zeros, no of positive integers, no of negative integers entered by user.

CODE:

```
#include<iostream>
```

```

using namespace std;

int main()
{
    int arr[13],z=0,p=0,n=0;

    cout<<"Enter 13 values= \n";

    for(int i=0;i<13;i++)

        cin>>arr[i];

    for(int j=0;j<13;j++){

        if(arr[j]==0)

            z++;

        else if (arr[j]<0)

            n++;

        else if(arr[j]>0)

            p++; }

    cout<<"Number of Positive Numbers= "<<p<<endl;

    cout<<"Number of negative Numbers= "<<n<<endl;

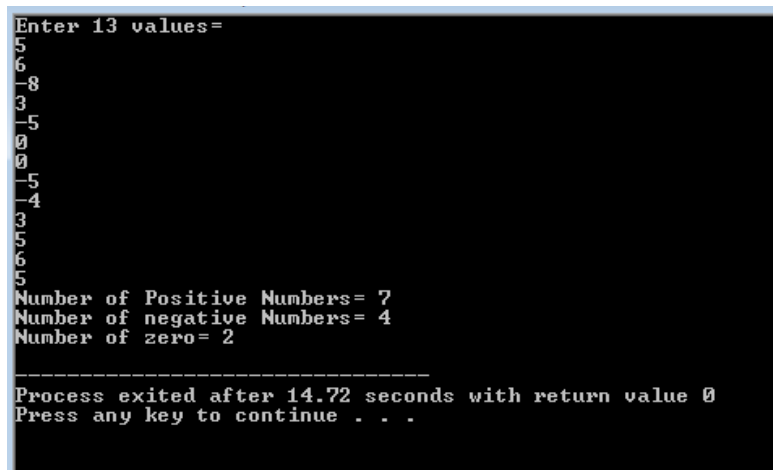
    cout<<"Number of zero= "<<z<<endl;

    return 0;

}

```

OUTPUT:



```

Enter 13 values=
5
6
-8
3
-5
0
0
-5
-4
3
5
6
5
Number of Positive Numbers= 7
Number of negative Numbers= 4
Number of zero= 2

-----
Process exited after 14.72 seconds with return value 0
Press any key to continue . . .

```

TASK 4

Create a program to find the largest number from array of 5 elements entered by user.

CODE:

```
#include<iostream>

using namespace std;

int main()
{
    int arr[5],max;
    cout<<"Enter five values= \n";
    for(int i=0;i<5;i++)
        cin>>arr[i];
    max=arr[0];
    for(int j=1;j<5;j++){
        if(arr[j]>max)
            max=arr[j];
    }
    cout<<max<<" is largest. \n";
    return 0;
}
```

OUTPUT:

```
Enter five values=
7
8
9
5
6
9 is largest.

-----
Process exited after 3.001 seconds with return value 0
Press any key to continue . . .
```

TASK 5

Write a program to take 20 values from user in an array. your code should divide the array in two equal parts.

Hint: create two separate arrays copy the contents of first half of original array in array1 , copy the remaining half in array2 print both the arrays on the screen.

CODE:

```
#include<iostream>

using namespace std;

int main()
{
    int arr[20];

    cout<<"Enter 20 values= \n";

    for(int i=0;i<20;i++)

        cin>>arr[i];

    cout<<"First array = "<<endl;

    for(int j=0;j<10;j++)


        cout<<arr[j]<<endl;

    cout<<"Second array = "<<endl;

    for(int k=10;k<20;k++)

        cout<<arr[k]<<endl;

    return 0;
}
```

OUTPUT:

```
Enter 20 values=
1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
First array =
1
2
3
4
5
6
7
8
9
10
Second array =
11
12
13
14
15
16
17
18
19
20
```