

# Fundamentals Of Programming

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## ASSIGNMENT 1

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```
//q1
#include <iostream>
using namespace std;
int main(){
    int x,y,z;
    cout<<"Enter a number";
    cin>>x;
    for(int i=1; i<=x; i++){
        if(x%i==0){
            cout<<i<<" ";
        }
    }
    cout<<endl;
}
```

```
"C:\Users\Dell\Desktop\hi\LM"
Enter a number 28
1 2 4 7 14 28

Process returned 0 (0x0)   execution time : 2.542 s
Press any key to continue.
```

Q2)

**X=5 AND Y=10**

```
//q2
#include <iostream>
using namespace std;
int main(){
    int x,y;
    cout<<"Enter a number";
    cin>>x;
    if(x>10&& x<=20){
        cout<<"1"<<endl;
    }
    else{
        cout<<"0";
    }
}
```

```
"C:\Users\De\l\Desktop\hi\LM" × + ▾
Enter a number 14
1
Process returned 0 (0x0)    execution time : 2.441 s
Press any key to continue.
```

```
//g4
#include <iostream>
using namespace std;

int main() {
    int x, y = 2, z, p, prime;
    cout << "Enter a number: ";
    cin >> x;
    while (y <= x) {
        prime = 1;
        z = 2;

        while (z < y && prime == 1) {
            if (y % z == 0) {
                prime = 0;
            }
            z++;
        }
        if (prime == 1) {
            p = y;
        }
        y++;
    }
    cout << p;
    return 0;
}
```

```
"C:\Users\De\l\Desktop\hi\LM" × + ▾
Enter a number: 56
53
Process returned 0 (0x0)    execution time : 3.975 s
Press any key to continue.
```

```

//05
#include <iostream>
#include <string>
using namespace std;

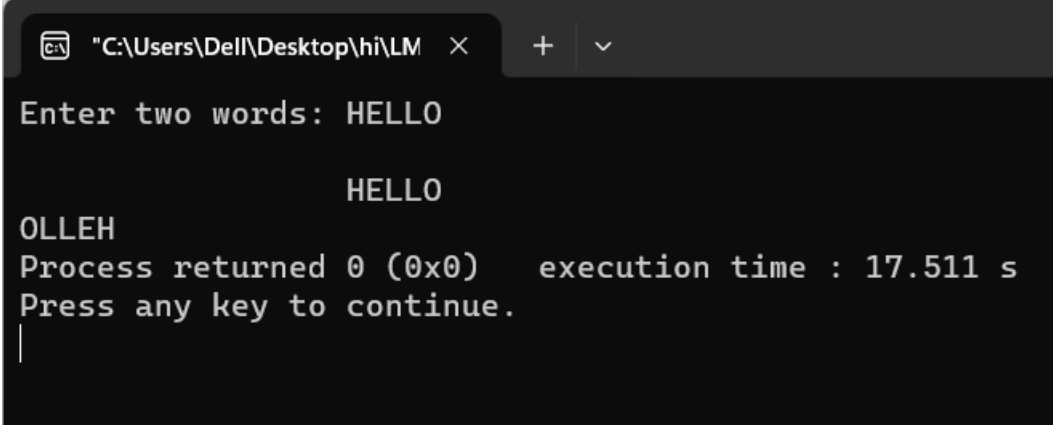
int main() {
    string a, b;
    char temp;

    cout << "Enter two words: ";
    cin >> a >> b;

    if (a == b) {
        for (int i = 0, j = a.length() - 1; i <= j; i++, j--) {
            temp = a[i];
            a[i] = a[j];
            a[j] = temp;
        }
        cout << a;
    } else {
        cout << "The words are not the same";
    }

    return 0;
}

```



```

C:\Users\Dell\Desktop\hi\LM >
Enter two words: HELLO

HELLO

OLLEH
Process returned 0 (0x0) execution time : 17.511 s
Press any key to continue.
|

```

```
//Q6
#include <iostream>
using namespace std;

int main() {
    int a, b, c, d;

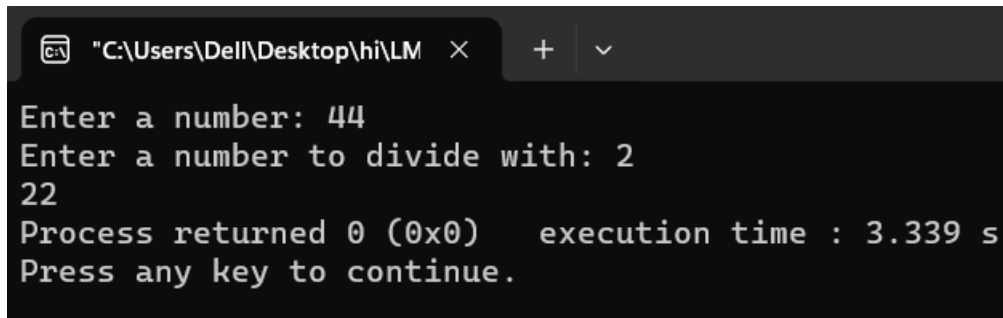
    cout << "Enter a number: ";
    cin >> a;

    cout << "Enter a number to divide with: ";
    cin >> b;

    for (c = 0; a != 0; c++) {
        a = a - b;
    }

    cout << c;

    return 0;
}
```



```

Enter a number: 44
Enter a number to divide with: 2
22
Process returned 0 (0x0)   execution time : 3.339 s
Press any key to continue.

```

```
//Q7
#include<iostream>
using namespace std;
int main(){
    char str[100];
    cout << "Enter a string = "; cin >> str;

    int l = 0;

    while (str[l] != '\0') { l++;
    -}

    for (int i = 0; i < l; i++) { for (int j = i + 1; j < l; ) { if (str[i] == str[j]) {
    for (int k = j; k < l - 1; k++) { str[k] = str[k + 1];
    -} str[l - 1] = '\0'; l--; } else
    -}
    -}
    -}

    cout << "Resultant string is " << str << endl;

    return 0;
    -}
}
```



"C:\Users\Dell\Desktop\hi\LM" ×



Enter a string = SCHOOL  
Resultant string is SCHOL

Process returned 0 (0x0) execution time : 2.929 s  
Press any key to continue.

```
//Q8
#include <iostream>
using namespace std;

int main() {
    int a[10] = {1, 2, 3, 4, 5};

    cout << "Enter 5 more elements to add to the array:" << endl;
    for (int i = 5; i < 10; i++) {
        cin >> a[i];
    }

    cout << "All elements in the array are:" << endl;
    for (int i = 0; i < 10; i++) {
        cout << a[i] << " ";
    }

    return 0;
}
```



"C:\Users\Dell\Desktop\hi\LM" ×



Enter 5 more elements to add to the array:

5  
4  
3  
2  
1

All elements in the array are:

1 2 3 4 5 5 4 3 2 1

Process returned 0 (0x0) execution time : 7.851 s  
Press any key to continue.

```
//09
#include <iostream>
using namespace std;
int main() {
    int nums[7] = {3, 6, 1, 2, 8, 4, 7};
    int targetSum;
    cout << "Enter an Integer: ";
    cin >> targetSum;
    for (int i = 0; i < 7; i++) {
        for (int j = 0; j < 7; j++) {
            for (int k = 0; k < 7; k++) {
                if (nums[i] == nums[j] || nums[i] == nums[k] || nums[j] == nums[k]) {
                    continue;
                }
                if (nums[i] + nums[j] + nums[k] == targetSum) {
                    cout << nums[i] << nums[j] << nums[k] << endl;
                }
            }
        }
    }
    return 0;
}
```

"C:\Users\Dell\Desktop\hi\LM >

```
Enter an Integer: 13
364
328
382
346
634
643
184
148
238
283
247
274
832
814
823
841
436
463
418
427
481
472
724
742
```

```

//010
#include <iostream>
using namespace std;
int main() {
    int x;
    int arr[5];
    for (int x=0;x<=5;x++)
    {
        cout<<"Insert Integer:";
        cin>>arr[x];
    }
    for (int a=0;a<=5;a++)
    {
        for (int y=1;y<=5;y++)
        {
            if (arr[y-1]>=arr[y])
            {
                x=arr[y];
                arr[y]=arr[y-1];
                arr[y-1]=x;
            }
        }
    }
    cout<<"In Ascending Order:"<<endl;
    for (int d=0;d<=5;d++)
    {
        cout<<arr[d]<<" ";
    }
    return 0;
}

```

"C:\Users\Dell\Desktop\hi\LM x + v  
 Insert Integer:1  
 Insert Integer:6  
 Insert Integer:43  
 Insert Integer:66  
 Insert Integer:775  
 Insert Integer:3  
 In Ascending Order:  
 1 3 6 43 66 775  
 Process returned 0 (0x0) execution time : 6.475 s  
 Press any key to continue.