

1. Write a typescript program which contains one function named as Maximum. That function accepts three parameters and it should returns largest value from three input parameters

Input : 23 89 6

Output : Maximum number is 89

```
C: > Users > admin > Desktop > typescript > TS assignment1_1.ts > Maximum
1  function Maximum(No1 : number, No2 : number, No3 : number) : void
2  {
3      if(No1>No2)
4      {
5          if(No1>No3)
6          {
7              {
8                  console.log("Maximum number is"+No1)
9              }
10         }
11         else
12         {
13             console.log("Maximum number is"+No3)
14         }
15     }
16     else
17     {
18         if(No2>No3)
19         {
20             console.log("Maximum number is "+No2)
21         }
22         else
23         {
24             console.log("Maximum number is "+No3)
25         }
26     }
27 }
28
29 var A : number = 23
30 var B : number = 89
31 var C : number = 6
32 Maximum (A,B,C)
```

```
C:\WINDOWS\system32\cmd.exe
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C:\Users\admin>cd desktop/typescript

C:\Users\admin\Desktop\typescript>tsc assignment1_1.ts

C:\Users\admin\Desktop\typescript>node assignment1_1.js
Maximum number is 89

C:\Users\admin\Desktop\typescript>
```

2. Write a typescript program which contains one function named as Area. That function should calculate area of circle. Accept value of radius from user and return area. Default value of PI should be 3.14 if it is not provided by the caller

Input: 5

Output: Area of circle is 78.5

```
C: > Users > admin > Desktop > typescript > TS area.ts > ...
1  function Area( R : number, A : number): void
2  {
3      A = 3.14 * R * R
4      console.log("Area of circle is "+A)
5  }
6  var R : number = 5
7  var A : number = 0
8  Area(R,A)
```

```
C:\WINDOWS\system32\cmd.exe
```

```
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```

```
C:\Users\admin>cd desktop/typescript
```

```
C:\Users\admin\Desktop\typescript>tsc area.ts
```

```
C:\Users\admin\Desktop\typescript>node area.js
Area of circle is 78.5
```

```
C:\Users\admin\Desktop\typescript>
```

3. write a typescript program which contains one function named as DisplayFactors. That function should accept one number and display factors of that number.

Input : 20

Output : 1 2 4 5 10

```
C: > Users > admin > Desktop > typescript > TS displayfactors.ts > Display
1  function Display(No1 : number ) :void
2  {
3      var i : number
4      var Cnt : number = 0
5      for(i=1; i<No1; i++)
6      {
7          if(No1 % i == 0)
8          {
9              Cnt++
10             console.log(i)
11         }
12     }
13 }
14 var No1 : number = 20
15 Display(No1)
```

C:\WINDOWS\system32\cmd.exe

```
C:\Users\admin\Desktop\typescript>tsc displayfactors.ts
C:\Users\admin\Desktop\typescript>node displayfactors.js
1
2
4
5
10
C:\Users\admin\Desktop\typescript>
```


4 . Write a typescript program which contains one function named as chkPrime. That function should accept one number and it should return true if the given number is prime and otherwise return false

Input : 11

Output : It is Prime number

```
C: > Users > admin > Desktop > typescript > TS prime.ts > Prime
1  function Prime(No1 : number) : void
2
3      var flag : number = 0
4      for(var i = 2; i<=No1/2;i++)
5      {
6          if(No1%i == 0)
7          {
8              console.log("It is not prime number")
9              flag=1
10             break
11         }
12     }
13     if(flag == 0)
14     {
15         console.log("It is prime number")
16     }
17 }
18 var A : number = 11
19 Prime(A)
20
21
```

```
C:\WINDOWS\system32\cmd.exe
C:\Users\admin\Desktop\typescript>tsc prime.ts
C:\Users\admin\Desktop\typescript>node prime.js
It is prime number
C:\Users\admin\Desktop\typescript>
```

5 Write a typescript program which contains one function named as Fibonacci. That function should accept one number from user and print Fibonacci series till that number

Input: 21

Output: 1 1 2 3 5 8 13 21

```
C: > Users > admin > Desktop > typescript > TS fibonacci.ts > Fibonacci > No1
1  function Fibonacci(N : number) : void
2  {
3      var No1 : number = 1
4      var No2 : number = 1
5      var No3 : number = 0
6      while(No3 <= N)
7      {
8          console.log(No3)
9          No1 = No2
10         No2 = No3
11         No3 = No1 + No2
12     }
13 }
14
15 var N : number = 21
16 Fibonacci(N)
```

```
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C:\Users\admin>cd desktop/typescript

C:\Users\admin\Desktop\typescript>tsc fibonacci.ts

C:\Users\admin\Desktop\typescript>node fibonacci.js
0
1
1
2
3
5
8
13
21

C:\Users\admin\Desktop\typescript>
```