

[Dashb...](#) / [My.cou...](#) / [CS23331-DAA-202...](#) / [Finding Time Complexity of Al...](#) / [Problem 1: Finding Complexity using Count...](#)

<b>Started on</b>	Monday, 19 August 2024, 10:12 AM
<b>State</b>	Finished
<b>Completed on</b>	Monday, 19 August 2024, 10:24 AM
<b>Time taken</b>	12 mins 21 secs
<b>Marks</b>	1.00/1.00
<b>Grade</b>	<b>10.00</b> out of 10.00 ( <b>100%</b> )

## Question 1

Correct

Mark 1.00 out of 1.00

Convert the following algorithm into a program and find its time complexity using the counter method.

```
void function (int n)
```

```
{
    int i= 1;
```

```
    int s =1;
```

```
    while(s <= n)
```

```
    {
        i++;
        s += i;
    }
```

```
}
```

**Note:** No need of counter increment for declarations and scanf() and count variable printf() statements.

**Input:**

A positive Integer n

**Output:**

Print the value of the counter variable

**For example:**

Input	Result
9	12

**Answer:** (penalty regime: 0 %)

```
1  #include<stdio.h>
2  void function (int n)
3  {
4      int c=0;
5      int i= 1;
6      c++;
7      int s =1;
8      c++;
9      while(s <= n)
10     {
11         c++;
12         i++;
13         c++;
14         s += i;
15         c++;
16     }
17     c++;
18     printf("%d",c);
19 }
20
21 int main()
22 {
23     int n;
24     scanf("%d",&n);
25     function(n);
26
27 }
```

	Input	Expected	Got	
✓	9	12	12	✓
✓	4	9	9	✓

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.

Jump to...

[Problem 2: Finding Complexity using Counter method ►](#)