



VISHAL M 2024-CSE ▾

V2**Started on** Thursday, 7 August 2025, 12:57 PM**State** Finished**Completed on** Thursday, 7 August 2025, 1:05 PM**Time taken** 7 mins 59 secs**Marks** 1.00/1.00**Grade** 10.00 out of 10.00 (100%)

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  int c=0;
3  void function(int n){
4      int i=1;
5      c++;
6      int s=1;
7      c++;
8      while(s<=n){
9          c++;
10         i++;
11         c++;
12         s+=i;
13         c++;
14     }
15 }
16 int main(){
17     int n;
18     scanf("%d",&n);
19     c=0;
20     function(n);
21     printf("%d\n",c+1);
22     return 0;
23 }
```

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

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.

[Back to Course](#)



VISHAL M 2024-CSE ▾

V2

Started on	Wednesday, 13 August 2025, 10:18 AM
State	Finished
Completed on	Wednesday, 13 August 2025, 10:33 AM
Time taken	15 mins 36 secs
Marks	1.00/1.00
Grade	10.00 out of 10.00 (100%)

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 func(int n)
{
    if(n==1)
    {
        printf("*");
    }
    else
    {
        for(int i=1; i<=n; i++)
        {
            for(int j=1; j<=n; j++)
            {
                printf("*");
                printf("*");
                break;
            }
        }
    }
}
```

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

Answer: (penalty regime: 0 %)

```
1  #include<stdio.h>
2  int c=0;
3  void func(int n)
4  {
5      if(n==1)
6      {
7          printf("*");
8          c++;
9      }
10     else
11     {
12         c++;
13         for(int i=1; i<=n; i++)
14         {
15             for(int j=1; j<=n; j++)
16             {
17                 c++;
18                 c++;
19                 c++;
20                 c++;
21                 break;
22             }
23             c++;
24         }
25     }
26     c++;
27 }
28 int main(){
29     int n;
```

```
36 | scanf("%d",&n);
37 |
38 | func(n);
39 | printf("%d\n",c-1);
40 | return 0;
41 | }
```

	Input	Expected	Got	
✓	2	12	12	✓
✓	1000	5002	5002	✓
✓	143	717	717	✓

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.

[Back to Course](#)





VISHAL M 2024-CSE ▾

V2

Started on Wednesday, 13 August 2025, 10:34 AM

State Finished

Completed on Wednesday, 13 August 2025, 10:43 AM

Time taken 8 mins 36 secs

Marks 1.00/1.00

Grade 10.00 out of 10.00 (100%)

Question 1 | Correct | Mark 1.00 out of 1.00

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

```
Factor(num) {
{
    for (i = 1; i <= num; ++i)
    {
        if (num % i == 0)
        {
            printf("%d ", i);
        }
    }
}
```

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

Input:

A positive Integer n

Output:

Print the value of the counter variable

Answer:

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

	Input	Expected	Got	
✓	12	31	31	✓
✓	25	54	54	✓
✓	4	12	12	✓

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.

[Back to Course](#)



VISHAL M 2024-CSE ▾

V2**Started on** Wednesday, 13 August 2025, 10:46 AM**State** Finished**Completed on** Wednesday, 13 August 2025, 11:07 AM**Time taken** 21 mins 13 secs**Marks** 1.00/1.00**Grade** 10.00 out of 10.00 (100%)

Question 1 | Correct | Mark 1.00 out of 1.00

Convert the following algorithm into a program and find its time

complexity using counter method.

```
void function(int n)
{
    int c= 0;
    for(int i=n/2; i<n; i++)
        for(int j=1; j<n; j = 2 * j)
            for(int k=1; k<n; k = k * 2)
                c++;
}
```

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

Answer:

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

	Input	Expected	Got	
✓	4	30	30	✓
✓	10	212	212	✓

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.

[Back to Course](#)



VISHAL M 2024-CSE ▾

V2**Started on** Wednesday, 13 August 2025, 11:16 AM**State** Finished**Completed on** Wednesday, 13 August 2025, 11:19 AM**Time taken** 3 mins 15 secs**Marks** 1.00/1.00**Grade** 10.00 out of 10.00 (100%)

Question 1 | Correct Mark 1.00 out of 1.00

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

```
void reverse(int n)
{
    int rev = 0, remainder;
    while (n != 0)
    {
        remainder = n % 10;
        rev = rev * 10 + remainder;
        n/= 10;
    }
}
print(rev);
}
```

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

Answer:

```
1  #include<stdio.h>
2  int c=0;
3  void reverse(int n)
4  {
5      int rev = 0, remainder;
6      c++;
7      while (n != 0)
8      {
9          c++;
10         remainder = n % 10;
11         c++;
12         rev = rev * 10 + remainder;
13         c++;
14         n/= 10;
15         c++;
16     }
17 }
18 //print(rev);
19 c++;
20 }
21 int main(){
22     int n;
23     scanf("%d",&n);
24     c=0;
25     reverse(n);
26     printf("%d\n",c+1);
27     return 0;
28 }
```

	Input	Expected	Got	
✓	12	11	11	✓
✓	1234	19	19	✓

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.

[Back to Course](#)