

Started on Monday, 11 August 2025, 3:56 PM

State Finished

Completed on Monday, 11 August 2025, 3:59 PM

Time taken 3 mins 2 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:

[Reset answer](#)

```
1 #include<stdio.h>
2 void reverse(int n)
3 {
4     int c=0;
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    c++;
18    //printf(rev);
19    c++;
20    printf("%d",c);
21 }
22 int main()
23 {
24     int n;
25     scanf("%d",&n);
26     reverse(n);
27 }
```

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

Passed all tests! ✓

Correct

Marks for this submission: 1.00/1.00.