

509. Fibonacci Number

Description

The **Fibonacci numbers**, commonly denoted $F(n)$ form a sequence, called the **Fibonacci sequence**, such that each number is the sum of the two preceding ones, starting from 0 and 1 . That is,

$$F(0) = 0, F(1) = 1$$
$$F(n) = F(n - 1) + F(n - 2), \text{ for } n > 1.$$

Given n , calculate $F(n)$.

Example 1:

Input: $n = 2$
Output: 1
Explanation: $F(2) = F(1) + F(0) = 1 + 0 = 1$.

Example 2:

Input: $n = 3$
Output: 2
Explanation: $F(3) = F(2) + F(1) = 1 + 1 = 2$.

Example 3:

Input: $n = 4$
Output: 3
Explanation: $F(4) = F(3) + F(2) = 2 + 1 = 3$.

Constraints:

- $0 \leq n \leq 30$

