



☆ Volleyball Match

Sally is a big sports fan, especially volleyball. She has a habit of writing down the final scores of each game after it has ended in her notebook.



Algorithmic Trader Coding Test

⌚ 02 : 55
to test end



score by 1.

- The initial score is 0 for both teams.



The game ends when

- One of the teams gets 25 points and another team has < 24 points (strictly less than 24).
- If the score ties at 24:24, the teams continue to play until the absolute difference between the scores is 2.

1

2

3

Given the final score of a game in the format $A:B$ i.e., the first team has scored A points and the second has scored B points, can you find the number of different sequences of getting points by teams that leads to this final score?

4

Complete the function ***volleyball*** in your editor. It has 2 parameters:

1. An integer A .
2. An integer B .

It must return the number of different possible sequences of getting those points. As the answer could be very large, return the value of $result \% (10^9 + 7)$.

Input Format

The locked stub code in your editor reads the following input from stdin and passes it to your function:

The first line contains a single integer A .

The next line contains a single integer B .

Constraints

- $0 \leq A, B \leq 10^9$

Output Format

The locked code in the editor prints the return value of the function.

Your function must return the number of different possible sequences of getting those points. As the answer could be very large, return the value of $result \% (10^9 + 7)$.

Sample Input 1

```
3
25
```

Sample Output 1

```
2925
```

Explanation 1

There are 2925 different sequences to reach the score (3,25).

Sample Input 2

```
24
17
```

Sample Output 2

```
0
```

Explanation 2

There can be no game of volleyball that ends with a score of 24 : 17.

YOUR ANSWER

We recommend you take a quick tour of our editor before you proceed. The timer will pause up to 90 seconds for the tour.

[Start tour](#)

Original code C

```
1 ▶ #include ↔  
8  
9 ▼ /*  
10  * Complete the function below.  
11  */  
12 ▼ int volleyball(int A, int B) {  
13  
14  
15 }  
16  
17 ▶ int main() {↔}  
32
```

Line: 10 Col: 1

☐ Test against custom input[Run Code](#)[Submit code & Continue](#)

(You can submit any number of times)

[Download sample test cases](#)
Notepad to edit them on windows.

The input/output files have Unix line endings. Do not use