

Andy wants to play a game with his little brother, Bob. The game starts with an array of distinct integers and the rules are as follows:

- Bob always plays first.
- In a single move, a player chooses the maximum element in the array. He removes it and all elements to its right. For example, if the starting array $arr = [2, 3, 5, 4, 1]$, then it becomes $arr' = [2, 3]$ after removing $[5, 4, 1]$.
- The two players alternate turns.
- The last player who can make a move wins.

Andy and Bob play g games. Given the initial array for each game, find and print the name of the winner on a new line. If Andy wins, print ANDY; if Bob wins, print BOB.

To continue the example above, in the next move Andy will remove **3**. Bob will then remove **2** and win because there are no more integers to remove.

Function Description

Complete the gamingArray function in the editor below.

gamingArray has the following parameter(s):

- int arr[n]: an array of integers

Returns

- string: either ANDY or BOB

Input Format

The first line contains a single integer g , the number of games.

Each of the next g pairs of lines is as follows:

- The first line contains a single integer, n , the number of elements in arr .
- The second line contains n distinct space-separated integers $arr[i]$ where $0 \leq i < n$.

Constraints

- Array arr contains n distinct integers.

For **35%** of the maximum score:

- $1 \leq g \leq 10$
- $1 \leq n \leq 1000$
- $1 \leq arr[i] \leq 10^5$
- The sum of n over all games does not exceed **1000**.

For **100%** of the maximum score:

- $1 \leq g \leq 100$
- $1 \leq n \leq 10^5$
- $1 \leq a_i \leq 10^9$
- The sum of n over all games does not exceed **10⁵**.

```
#!/bin/python3

import math
import os
import random
import re
import sys

#
# Complete the 'gamingArray' function below.
#
# The function is expected to return a STRING.
# The function accepts INTEGER_ARRAY arr as parameter.
#

def helper(array):
    maximum = float('-inf')
    result = 0
    for ele in array:
        if ele > maximum:
            maximum = ele
            result += 1

    return result

def gamingArray(arr):
    return 'ANDY' if helper(arr) % 2 == 0 else 'BOB'
```

Line: 44 Col: 5

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Test against custom input

Run Code

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Congratulations

You solved this challenge. Would you like to challenge your friends?



Test case 15



Test case 16



Test case 17



Test case 18



Test case 19



Test case 20



Compiler Message

Success

Input (stdin)

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```
1 2
2 5
3 5 2 6 3 4
4 2
5 3 1
```