Problem F 'Game of Balls'

Problem description

Mickie and Nickie are playing a new game. Each of them has two sets of balls, numbered from 1 to 100. They pick up two balls from each set, $B_{i,n}$ and $B_{i,m}$, and all the balls between those two, $B_{i,n+1},...,B_{i,m-1}$ and introduce them in a bag. Then they pick up one ball from each bag, who has a higher sum wins the game. If they draw the same sum, the game ends in a tie.

Your task is to determine who has higher probability to win knowing which balls they have in each bag.

Problem input/output

The input consist of two lines with 4 numbers corresponding to the two ball draw for each set, $B_{1,n}$, $B_{1,m}$, $B_{2,n}$, $B_{2,m} \leq 100$. The first line corresponds to Mickie and the second line to Nickie.

You need to output the name of the player, 'Mickie' or 'Nickie' that has higher probability to win, or the string 'Tie' if both players has the same probability to win.

The execution limit for the problem is 2 seconds.

Sample input/output

Input	Output
10 50 20 30	Nickie
80 100 10 20	—
30 60 70 100 40 50 80 90	Tie
30 61 70 100	Mickie
40 50 80 90	—