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4
0 1 1 1
1 1 1 1
0 1 1 1

3
4
0 1 1 1
1 1 2 1
0 1 1 1

```
public static int squareMatrices(int[][] arr,int row,int col){  
    for(int i=1;i<row;i++){  
        for(int j=1;j<col;j++){  
            if(arr[i][j]==0){  
                continue;  
            }  
            int temp = Math.min(arr[i-1][j],arr[i][j-1]);  
            temp = Math.min(temp,arr[i-1][j-1]);  
            arr[i][j] = temp+1;  
        }  
    }  
    int sum=0;  
    for(int i=0;i<row;i++){  
        for(int j=0;j<col;j++){  
            sum+=arr[i][j];  
        }  
    }  
    return sum;  
}
```

4

0 1 0 0

0 0 1 0

1 0 0 0

0 0 1 0

```
1 import java.io.*;
2 import java.util.*;
3
4 public class Solution {
5
6     public static void main(String[] args) {
7         /* Enter your code here. Read input from STDIN. Print output to STDOUT. Your class should be named Solution. */
8         Scanner sc = new Scanner(System.in);
9         int n = sc.nextInt();
10        int[][] arr = new int[n][n];
11        for(int i=0;i<n;i++){
12            for(int j=0;j<n;j++){
13                arr[i][j]=sc.nextInt();
14            }
15        }
16        String ans = nQueens(arr,n);
17        System.out.println(ans);
18    }
19    public static String nQueens(int[][] arr , int n){
20        for(int row=0;row<n;row++){
21            for(int col=0;col<n;col++){
22                if(arr[row][col]==1){
23                    boolean check = checkRow(arr,row,col,n) && checkDiagonals(arr,row,col,n);
24                    if(!check){
25                        return "Danger";
26                    }
27                }
28            }
29        }
30        return "N Queens";
31    }
32    /// this function is for checkRow and Column
```

```
/// this function is for checkRow and Column
public static boolean checkRow(int[][] arr,int row,int col,int n){
    int count =0;
    for(int j=0;j<n;j++){
        if(arr[row][col]==1){
            if(arr[row][j] == 1){
                count++;
            }
            if(count>1){
                return false;
            }
        }
    }
    //for col
    count=0;
    for(int i=0;i<n;i++){
        if(arr[i][col]==1){
            count++;
        }
        if(count>1){
            return false;
        }
    }
    return true;
}
```

```

/// This function is for check diagonally
public static boolean checkDiagonals(int[][] arr,int row,int col,int n){
    int count=0;
    // Diagonal 1 first half
    for(int i=row-1,j=col-1;i>=0 && j>=0;i--,j--){
        if(arr[i][j]==1){
            return false;
        }
    }
    // Diagonal 1 second half
    for(int i=row+1,j=col+1;i<n&& j<n;i++,j++){
        if(arr[i][j]==1){
            return false;
        }
    }

    // Diagonal 2 first half
    for(int i=row-1,j=col+1; i>=0 && j<n; i--,j++){
        if(arr[i][j]==1){
            return false;
        }
    }
    // Diagonal 2 second half
    for(int i=row+1,j=col-1; i<0 && j>=0; i++,j--){
        if(arr[i][j]==1){
            return false;
        }
    }
    return true;
}
}

```