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## Mystery Islands

You have been hired as an explorer to map out a strange, uncharted region in a distant land. The region is represented by a grid of squares, each either filled with land (1) or water (0). However, there's a twist - the land has mysteriously broken up into several disconnected pieces, forming hidden islands.

Your task is to figure out how many distinct islands exist in this grid of land and water. But beware, the islands follow strict rules! An island is defined as a group of connected land squares (1s), where each square is connected by its four neighbors: North, South, East, or West. Diagonal connections are not allowed, so you can't walk along a diagonal path to travel between land pieces.

### Challenge:

Your map is large and complex, so you must carefully examine the entire grid and identify how many isolated landmasses (islands) are present.

The catch? The islands might be small, isolated by vast water, or they might snake through the grid in peculiar shapes. It's your job to track them down one by one.

### Input:

- You will be given a 2D grid of dimensions  $n \times m$ , where each cell contains either a 1 (land) or 0 (water). The first two integers will be the number of rows and then the number of columns respectively. It is followed by the contents of grid itself.
- The grid can be of any size, from as small as a single cell to a sprawling region of 100x100.

### Output:

After your exploration, you must return the number of distinct islands in the region. (Print the number).

### Sample:

No.	Sample Input	Sample Output
1	5 5 1 1 0 0 0 0 1 0 1 1 0 0 0 1 0 1 1 0 0 0 1 0 0 0 1	4

2	3 4 1 0 1 0 0 1 0 1 1 0 1 0	6
3	3 3 1 0 0 1 1 0 0 1 0	1

### Important Clues:

- Land squares connected diagonally do not count as part of the same island. You can only travel between adjacent squares horizontally or vertically.
- If you visit a piece of land (1), make sure you mark it off, so you don't count it twice!
- There is no constraint on time complexity or space complexity.

Can you figure out how many islands are hidden in the grids? Good luck adventurer!