Chapter 5 Practice 3 - Maze(a little bit difficult)

The main purpose of this is to find the shortest way to walk out a maze and find the specific route.

The Maze

The maze will be represented as a $m \times n$ matrix containing only 0 and 1 like the following.

0,1,1,0,0,0
0,0,0,0,1,0
1,0,1,1,0,0
1,0,0,1,0,1
0,0,1,0,0,1
1,0,0,0,0,0

Where "0" represents the floor and "1" represents the wall.

The starting point is the left-top corner and the destination is the right-bottom corner.

Your function should look like this

```
function y = minroute(map)
...
end
```

Where map indicates the matrix. The return value is the minimum number of steps to walk complete the maze. Meanwhile, the function should also print the specific route. In the program I give, the function will work like this:

```
minroute(map)
down right down down down down right right right right
ans =
  10
```

tip: As the form of the function is not easy to perform a recursion directly, you can define another subfunction and use it in the original function.