The Magical Word Search Challenge

Susi has now shifted from drawing shapes to word puzzles. She has created a 5×5 game board filled with letters.

Susi wants to challenge her friend Bob to find a Magical Word on the board. The word search must start at a specific position and proceed by moving to one of the four cardinal directions (up, down, left, or right) from one letter to the next.

A letter on the board can only be used once in a single word sequence.

Format Input

- A 5×5 grid (board) containing character letters (without space). Each row is input line by line.
- Two integers x and y indicate the starting coordinates of the search (row and column index, starting from 0).
- An integer N indicating the length of the Magical Word to be found.
- A string (word) of length N which is the Magical Word to be searched.

Format Output

Print **"Found!" with end line** if the Magical Word can be found in the grid according to the given rules. Or print **"Not Found!" with end line** if the word cannot be found.

Constraints

- $The\ grid\ size\ is\ always\ 5 \times 5$
- $The\ starting\ coordinates\ x\ and\ y\ are\ in\ the\ range\ 0 \leq x, y < 5.$
- $The\ word\ length\ N\ is\ in\ the\ range\ 1 \leq N \leq 25.$
- $The\ board\ and\ the\ Magical\ Word\ only\ contain\ uppercase\ alphabetic\ letters.$

Sample Input 1 (Standard Input)

```
HELEA
EVSVE
LLISS
VOMLM
MJONS
0 0
5
HELLO
```

Sample Output 1 (Standard Output)

```
Found!
```

Sample Input 2 (Standard Input)

```
HELEA
EVSVE
LLISS
VOMLM
MJONS
3 4
4
MORE
```

Sample Output 2 (Standard Ouput)

```
Not Found!
```