

Leet Code

Day-46 Q-03 Maximal Rectangle

Given a `rows x cols` binary `matrix` filled with 0's and 1's, find the largest rectangle containing only 1's and return *its area*.

Example 1:

1	0	1	0	0
1	0	1	1	1
1	1	1	1	1
1	0	0	1	0

```
Input: matrix =  
[[ "1", "0", "1", "0", "0"], [ "1", "0", "1", "1", "1"], [ "1", "1", "1", "1", "1"], [ "1", "0", "0",  
 "1", "0"]]
```

Output: 6

Explanation: The maximal rectangle is shown in the above picture.

Example 2:

```
Input: matrix = []
```

Output: 0

Example 3:

Input: matrix = [["0"]]

Output: 0

Example 4:

Input: matrix = [["1"]]

Output: 1

Example 5:

Input: matrix = [["0","0"]]

Output: 0

Constraints:

- rows == matrix.length
- cols == matrix.length
- 0 <= row, cols <= 200
- matrix[i][j] is '0' or '1'.