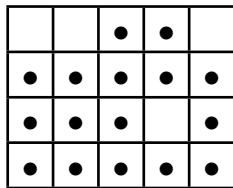


2011 WATER

The annual *most beautiful pond* award is highly prized throughout that small knot of villages known as *The Endians*. This year's theme is land-reclamation, and throughout the area the placing of stilts has churned otherwise placid waters.

Each pond has been divided up into an evenly spaced grid and stilts have been placed in some of these spaces. A square area of p by p ($p \geq 2$) complete grid spaces could potentially be reclaimed if *all* of the spaces making up that area contain a stilt. Ancestral voices from afar (or at least the local pubs) have prophesied that the pond with the largest number of reclaimable areas will almost certainly win the contest this year. Anxious villagers are busily counting the number of such areas in their ponds.



For example, in the diagram (where a • indicates a stilt) there are 6 reclaimable areas (5 2×2 areas and 1 3×3 area). Note that these areas can overlap and that, since they involve spaces from the grid, must have perimeters with edges that are parallel to the side of the grid.

SAMPLE INPUT

```
4 5
WSSW
SSSS
SSWS
SSSS
```

Write a program that determines the number of reclaimable areas in a grid. The first line of the input will consist of two integers r then c ($1 \leq r, c \leq 256$) indicating the number of rows and columns respectively in the grid. This will be followed by r lines each of which will contain c characters, each an **S** or **W** indicating that the corresponding space contains a stilt or just water respectively.

You should output a single integer, the number of reclaimable areas in the specified grid.

SAMPLE OUTPUT

```
6
```