Lexicographic paths

Krishnakant is standing at $(0,0)$ in the Cartesian plane. He wants to go to the point (x,y) in the same plane using only horizontal and vertical moves of 1 unit. There are many ways of doing this, and he is writing down all such ways. Each way comprises of few H moves and few V moves. i.e. moves in horizontal and vertical direction respectively. For example, if Krishnakant wants to go to point $(2,2)$ from point $(0,0)$, $HVHV$ is one of the possible ways.

Given the value of K, he wants to know lexicographically K^{th} smallest way of going to (x,y) from $(0,0)$.

Input Format
The first line contains an integer T , i.e., number of test cases.
Next T lines will contain integers x,y and K.

Output Format
For each test case, print lexicographically K^{th} smallest path.

Constraints
$1 \leq T \leq 100000$
$1 \leq x \leq 10$
$1 \leq y \leq 10$
$0 \leq K < \text{number of paths}$

Sample Input

```
2
2 2 2
2 2 3
```

Sample Output

```
HVVH
VHHV
```

Explanation

All the paths of going to $(2,2)$ from $(0,0)$ in lexicographically increasing order:

$0.HHVV$
$1.HVHV$
$2.HVVH$
$3.VHHV$
$4.VHVH$
$5.VVHH$