

Character Patterns (Act 8)

Print a regular grid pattern with diamond-like base elements. Use the \ (backslash) and the / (slash) characters to print the borders and the * (asterisk) to print the inner part of the diamonds. Use . (dots) to fill the rest of the space.

Input

You are given t - the number of test cases and for each of the test cases three positive integers: r - the number of rows, c - the number of columns in the grid and s - the size of each diamond.

Output

For each of the test cases output the requested pattern (please have a look at the example). Use one line break in between successive patterns.

Example

Input:

```
3
3 1 2
4 4 1
2 5 2
```

Output:

```
.^.\
/**\
**/
.V.
.^.\
/**\
**/
.V.
.^.\
/**\
**/
.V.

^^^
VVV
^^^
VVV
^^^
VVV
^^^
VVV

.^..^..^..^..^..
**\**\**\**\**\
**^**^**^**^**^
.V..V..V..V..V.
.^..^..^..^..^..
**\**\**\**\**\
**^**^**^**^**^
.V..V..V..V..V.
```

