CMPE 150 C - Fall 2019 - Project 1

IMPORTANT NOTE: You will not submit this project and it will not be graded. However, there will be a similar question to this one in the first midterm. You are encouraged to solve the project on your own. Please do not memorize the solution since the question in the exam will not be the exact same question here.

Write a program which reads an integer N and a character sym from the user and prints a 'tree' with height defined by N trunk parts by using /, \backslash and sym characters. For instance, if N is 5 and sym is L, then tree will have 5 trunk parts in which trunk is represented by sym and the leaves are represented with /, \backslash characters.

If you look at the first example, you can observe followings:

The given inputs are 5 and L, which means N is 5 and the sym is L.

Leaves consist of / and \ symbols

Tree has 5 trunk parts and the height of each part is related with its level. The trunk is represented with L.

The height and width of the bottom trunk also changes with N.

/L\	1
//L\\	2
///L\\\	
///L//\	
///L\\\\	2
////L\\\\	
///L\\\\	
////L\\\\	
/////L\\\\\	
//////L\\\\\\	4
////L\\\\	
/////L\\\\\	
//////L\\\\\\	
///////L\\\\\\\	_
////////L\\\\\\\	5
LLLLL	
LLLLL	
LLLLL	

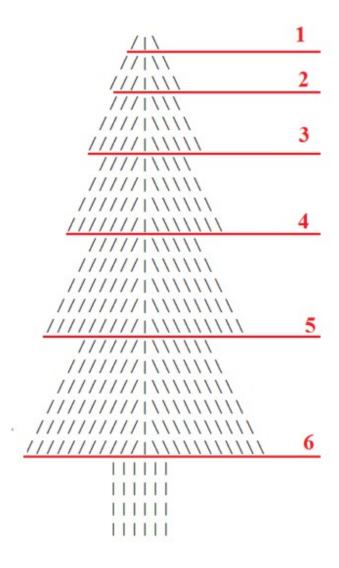
In the second example:

means N is 6 and the sym is |.

Leaves consist of / and \ symbols

Tree has 6 trunk parts and the height of each part is related with its level. The trunk is represented with |.

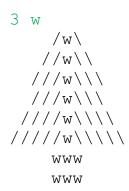
The height and width of the bottom trunk also changes with N.



Examples

8 f

```
/f\
          //f\\
         ///f\\\
         ///f\\\
        ///f\\\
       ////f\\\\
        ///f\\\
       ////f\\\\
       /////f\\\\
      /////f\\\\\
        ////f\\\\
       /////f\\\\
      /////f\\\\\
     //////f\\\\\
    //////f\\\\\\
       /////f\\\\
      /////f\\\\\
     //////f\\\\\
    //////f\\\\\\
   ///////f\\\\\\
   ///////f\\\\\\\
      /////f\\\\\
     //////f\\\\\
    //////f\\\\\\
    ///////f\\\\\\\
   ////////f\\\\\\\
  ////////f\\\\\\\\
 /////////f\\\\\\\\\\
     //////f\\\\\
    //////f\\\\\\
    ///////f\\\\\\
   ////////f\\\\\\\\
  ////////f\\\\\\\\
 ////////f\\\\\\\\\\
/////////f\\\\\\\\\\\
/////////f\\\\\\\\\\\\
        ffffffff
        ffffffff
        fffffff
        fffffff
        ffffffff
```





```
7 y
```

```
/y\
        //y\\
        ///y\\\
        ///y\\\
       ////y\\\
      ////y\\\\
       ////y\\\
      ////y\\\\
     /////y\\\\
    //////y\\\\\
      ////y\\\\
     /////y\\\\
    //////y\\\\\
   //////y\\\\\
   ///////y\\\\\\
     /////y\\\\
    //////y\\\\\
    //////y\\\\\
   ///////y\\\\\\
  ////////y\\\\\\\
 ////////y\\\\\\\
    //////y\\\\\
    ///////y\\\\\\
  ////////y\\\\\\\
 ////////y\\\\\\\\
//////////y\\\\\\\\
//////////y\\\\\\\\\\
        УУУУУУУ
        УУУУУУУ
        УУУУУУУ
        УУУУУУУ
```