Given several words, compute the number of appearances of each one. Print first the most common words, and use the lexicographical order to break ties.

Input

Input consists of several cases. Every case begins with a number $n$ between 1 and $10^4$, followed by $n$ words made up only of lowercase letters.

Output

Print the counters and the words in the right order. Print a line with 10 dashes at the end of every case.

Sample input

```
6
z
anna
abba
ivet
ivet
anna

3
hi
hi
hi
```

Sample output

```
2 anna
2 ivet
1 abba
1 z
----------
3 hi
----------
```