CSGE602040 – Data Structure and Algorithm
Semester Gasal - 2019/2020
WS 3 - Friday
Deadline: Friday, 11-10-2019, 18.00 WIB

Attendance List

Description

After the TUFEL test Namron ★ take, he decided to enter the best school in his area. He met several friends and mingle with them. He also meets a handful of nice teachers and their assistants. As the first class is starting, the teacher starts to take the attendance list. The teacher realized that the attendance list is not alphabetically ordered. Given he has OCD, he really needs Namron ★'s help on sorting the attendance list.

He remembers that there is one particular sorting algorithm that can help him in this case. There will be N students in the class. So first he will find the name of the student with the lowest **lexicographic** value and put it in the top of the list. Next he will find the lowest again and put the name next to the first student. Namron ★ will do this repeatedly for every N student in the class.

Hint

To help Namron ★, we could use **Selection sort ,** input can also be a combination of number and word

Input

The first line consists of integer N that will determine the amount of the students in the class. The next N lines is the names of the students in the class.

Output

The output consists of N lines of students sorted alphabetically.

Limit

$1 \leq N \leq 10000$

Input Example 1

```
4
beta alpha juliet gamma
```

Output Example 1

```
alpha
beta
gamma
juliet
```

Explanation

First compare beta with alpha. Since alpha has the lowest lexicographic value, it will be printed as the first line. Beta comes next, so beta will be printed second after alpha and it goes until juliet printed.

Input Example 2

```
5
v2de
eo1o
kru6
8nvg
yea5
```

Output Example 2

```
8nvg
eo1o
kru6
v2de
yea5
```

Explanation

The output is in **lexicographic** order, we can see that 8vng is printed first because the first string is a number