Assignment - 3

INSTRUCTION:

- Submit only **.py** file. Other file format (like pdf or image file) will not be   evaluated.
- Do not copy your code from other. **Plagiarism** is not allowed.
- **DO NOT PRINT ANY MESSAGE OTHER THAN THE SPECIFIED FORMATS**.
- Inputs should be taken from output console (the prompt).
- Do not print any message in the input() function.
- Strictly stick to the input output formats.
- Save you file the name as: Rollno + _ + AssignmentNo + _ +   ProblemNo.py (Roll number in uppercase)
- E.g. 17ESKIT076_1_2.py

Problem statement 1:

Create a function that takes a string and returns a string with its letters in alphabetical order.

Input Format:

Read a string S.

Output Format:

Return a String in aphabetical order.

Example 1:

INPUT: hello
OUTPUT: ehllo

Example 2:

INPUT: edabit
OUTPUT: abdeit

Example 3:

INPUT: javascript
OUTPUT: aaijprstv

Problem statement 2:

Create a function that return factorial of a number using **recursion.**

Input Format:

Read an integer value.

Output Format:

Your function must return factorial of a number.

Example 1:

INPUT: 5

OUTPUT: 120

Explanation: 120 = 1*2*3*4*5

Problem Statement 3:

Filter the List: You are given a list and your task is to create a filter function to filter the list. In other words remove all the non-numeric values from the list.

If filter cannot be performed print "No" without (inverted comma).

Input Format:

Read the Input as a list. (it can be any symbol, numeric and string values).

Output Format:

Return the Filter list.

 Example 1:

INPUT：30 Days Presents Pythonist 2 $$ 45

OUTPUT：30 2 45

Explanation: "Days", "Presents", "Pythonist", "$$" are non-numeric values so it must be removed from a list.

Example 2:

INPUT: 5 0 6

OUTPUT: 5 0 6

Example :

INPUT: Hello World

OUTPUT: No

Problem Statement 4:

Write a function that takes a string as an argument and returns the left most and right most digit in the string.

If no digit is present in a string print "No" without (inverted comma).

Input Format:

Read the Input as a string S

Output Format:

Return the left most and right most digit.

 Example 1:

INPUT：TrAdE2W1n95!

OUTPUT：2 5

Explanation: 2 is the left most digit and 5 is the right most digit.

Example 2:

INPUT: 50786

OUTPUT: 5 6

Example :

INPUT: HelloWorld

OUTPUT: No

Problem Statement 5:

Reverse-Swap Case: You are given a string and your task is to reverse the string including swap case. If no string can be converted print "No" without (inverted comma).

Input Format:

A single line containing a string S .

Output Format:

Print the modified string S .

 Example 1:

INPUT：30 Days Presents "Pythonist 2"
OUTPUT："pYTHONIST 2" pRESENTS dAYS 30

Example 2:

INPUT: 5 0 6

OUTPUT: No