Python Test: 13.00 - 15.00

Rules

- You must pass all exercises to pass the test,
- Aids: Paper, pen, your laptop, VS Code, the website `docs.python.org/3/library/`.
- No documentation of the code is needed.

Exercise 0 (Preparation)

Create a new folder in Visual Studio Code entitled `python_test` and store all Python test related files in that project. **Close all other files!**

Exercise 1

Create a program `consecutive.py` containing a function `get_consecutive(s)` that returns the the first (from left) character in string s that is followed by an identical character. It should return `None` if no such character exists. That is, the input strings `aBBa`, `Jonass`, `oooops`, and `abcd` should return `B, s, o,` and `None` respectively. Also, add program code that demonstrates how the function can be used.

Exercise 2

Create a program `lower.py` containing a function `only_lower(lst)` that takes a list of letters (`[a-z,A-Z]`) and returns a new list with all the lower case letters (`[a-z]`) in the list `lst`. The input list `lst` should not be changed. For example, input `['a', 'B', 'J', 'x', 'w']` should return `['a', 'x', 'w']`. Also, add program code that demonstrates how the function can be used.

Exercise 3

Create a program `filled_triangle.py` reading a positive integer $n > 2$ from the keyboard, and then prints the corresponding filled right-angled triangle using symbols `x` and `o`. See example below to see what we mean by a filled right-angled triangle .

```
Enter an integer larger than two: 7
x
xx
xox
xoox
xooox
xoooox
xxxxxxx
```