

Python for data science SP1 2023/2024

Assignment 0

There is only one problem in this assignment.

Prepare the following (no need to submit):

- A Jupyter notebook (.ipynb) with your solution. The notebook must show examples that you used to run the codes, and the outputs that you get after running the codes.
- An html file (a result of “Save and Export Notebook As” html of your Jupyter notebook) after you run all the codes.

Do not forget to add your name and your group partner’s name at the very top of your notebook.

Note:

- Think about different inputs which might help you to assure that your implementation is correct.
- If you add any details or make any assumptions, please clearly describe these in your submission.

Problem 1

Write a program that:

- takes two inputs (i.e., length and width of a rectangle).
- calculates the perimeter, the length of the diagonal, and the area of the rectangle.
- outputs the perimeter, diagonal length, and the area of the rectangle.

An example is shown below.

```
Enter the length of the rectangle : 4
Enter the width of the rectangle : 5
Calculating the properties of the rectange!
Perimeter: 18.0
Diagonal length: 6.4031
Area: 20.0
```