

## Week 7

Write and run your programs with IDLE editor. Submit finished programs to CodeGrade. Note that some tasks have several steps (A, B, C, ...) in CodeGrade.

**IMPORTANT:** End each input-command string with a newline symbol `\n`. For example:

```
variable = input("Some text:\n")
```

**Task 1:** Write a function `write_names(file_name)` which should repeatedly ask for first names of people and stores them to the file, one name in a line. The function should stop when the user inputs the word 'stop'.

You need to use `open()` and `close()` functions as instructed in the lecture.

The content of the created file is checked by CodeGrade, so the test result may look different than before.

**Example run 1:**

```
Enter the name of the file to be saved:
ex1.txt
Enter a name or 'stop':
John
Enter a name or 'stop':
Yinuo
Enter a name or 'stop':
Pekka
Enter a name or 'stop':
Dieter
Enter a name or 'stop':
stop
```

**Task 2:** Write a function `print_names(file_name)` which reads the content of the file `file_name` given as a parameter and prints the names in alphabetic order. You may assume that all names start with capital letters and other letters are small. Note that the `strip()` function removes leading and trailing white spaces (spaces, tabs, newlines) from a string.

In Moodle, you can find the file “ex2\_names.txt” which produces the following result:

**Example run 1:**

```
Give the name of the input file:
ex2_names.txt
Alice
Anna
Bob
Charles
David
Eve
```

**Task 3:** Write a function `file_copy(fileA, fileB)` that copies the content of one text file to another. In Moodle, you can find the file “ex3.txt” which produces the following result:

**Example run 1:**

```
Please give the name of the source file:
ex3.txt
Please give the name of the destination file:
out.txt
File copied successfully!
```

**Task 4:** Write a program that reads a text file and counts:

- Number of lines in the file.
- Number of words in the file.

In Moodle, you can find the file “ex4.txt”.

**Example run 1:**

```
Give the text file to analyze:
ex4.txt
Number of lines: 3
Number of words: 22
```

**Task 5:** Write a program that reads a CSV (Comma-Separated Values) file and prints only the second column.

In Moodle, you can find the file “ex5.csv”.

**Example run 1:**

```
Give the name of the CSV file:
ex5.csv
30
25
35
```