

CST8234 - C Programming

LAB 5

Due Date Sunday Nov 17th, 2019 at 11:30pm

LAB OBJECTIVE

By completing this lab, you will learn to:

- Open files for reading and writing.
- Reading from a file.
- Writing to a file.

LAB INSTRUCTIONS:

STATEMENT OF THE PROBLEM:

In this lab we will look at very basic file IO operations. After completing this lab, you should have a good idea on how to open files, either for reading or writing, reading the content of a file, and writing content to another file.

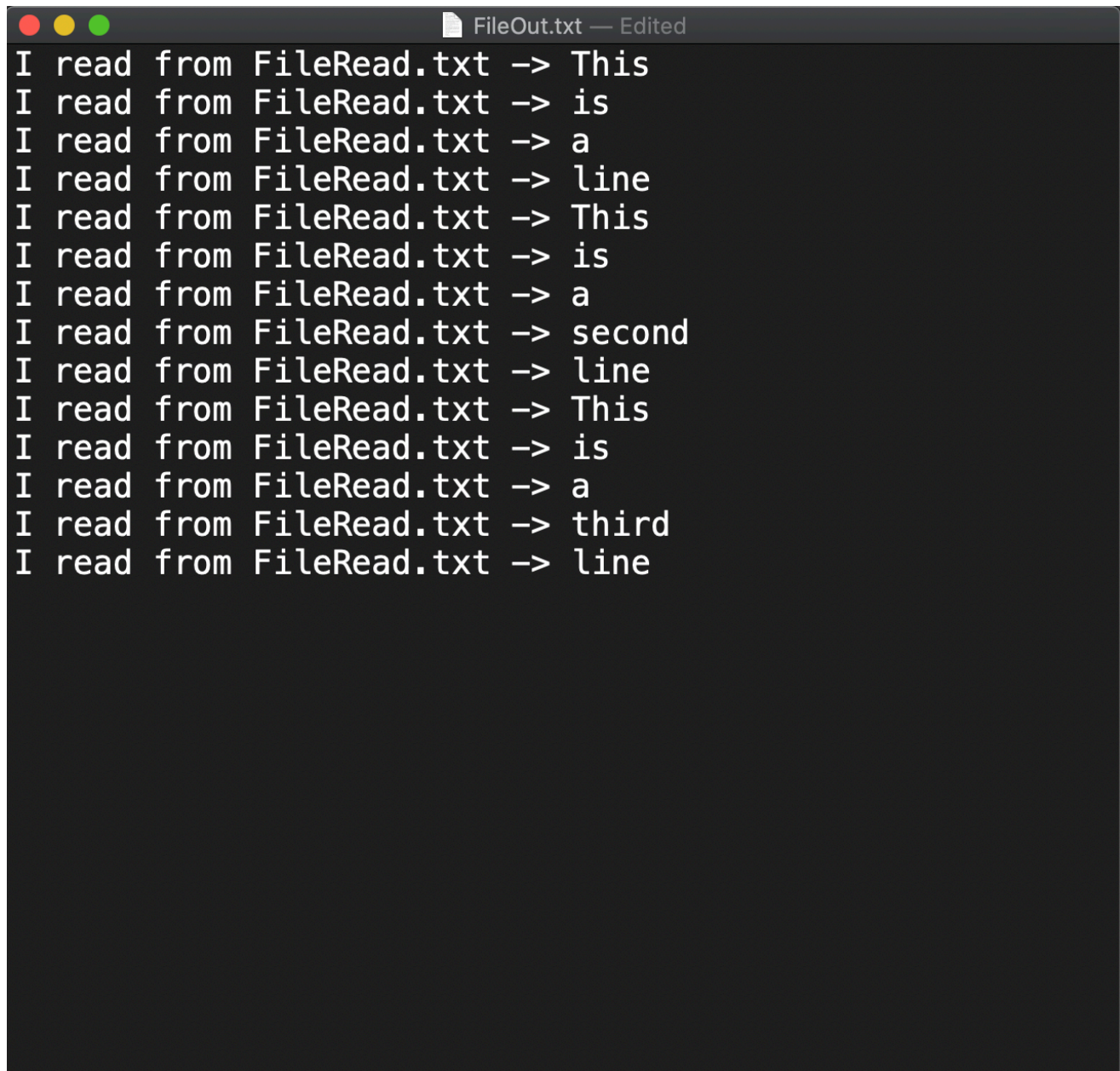
REQUIREMENTS:

You are given a simple text file, your goal is to read each string in that file and write it to another file.

The following is a complete list of the program requirements:

1. Save the given text file, called *FileRead.txt*, in the same folder where your code is going to be. This is important for the program to work.
2. In your C code, open *FileRead.txt* for reading only.
3. In your C code, open a second file, called *FileOut.txt*, for writing only.
4. *FileOut.txt* shouldn't exist in the folder. It will be created by the program if the code is correct.
5. Check if the file open operation succeeded for both files, otherwise print an error message and exit the program immediately.
6. If the files are open, read the content of *FileRead.txt* string by string and write it to *FileOut.txt* after the sentence:
 "I read from FileRead.txt ->".
7. You will end up with more lines in the output file than there is in the input one, since you are required to read only 1 string at the time.
8. When you submit your code, you also have to submit the input file called *FileRead.txt*. Yet, **DON'T** submit the output file, to will be created when the program runs.

The following is a sample of the output of the file.

A screenshot of a text editor window with a dark background. The title bar at the top shows three colored window control buttons (red, yellow, green) on the left and the text 'FileOut.txt — Edited' on the right. The main area of the window contains 14 lines of text, each starting with 'I read from FileRead.txt ->'. The text on each line is: 'This', 'is', 'a', 'line', 'This', 'is', 'a', 'second', 'line', 'This', 'is', 'a', 'third', and 'line'.

```
I read from FileRead.txt -> This
I read from FileRead.txt -> is
I read from FileRead.txt -> a
I read from FileRead.txt -> line
I read from FileRead.txt -> This
I read from FileRead.txt -> is
I read from FileRead.txt -> a
I read from FileRead.txt -> second
I read from FileRead.txt -> line
I read from FileRead.txt -> This
I read from FileRead.txt -> is
I read from FileRead.txt -> a
I read from FileRead.txt -> third
I read from FileRead.txt -> line
```

SUBMISSION INSTRUCTIONS

- No late submissions are accepted.
- You **MUST** work in a group of maximum 2 students to complete this lab. Individual work is **NOT** accepted.
- You must submit the source code for the program you wrote.
- Add all your files under a folder call “lastName-firstName-Lab5”, then Zip the folder and submit the zipped folder only.
- Make sure to submit all files required to compile and run the program on the instructor machine without any errors.
- DON'T submit any extra file. For example, the binary file (AKA object or output) files like .exe or .o.
- Add a Readme.txt file that contain each student name and student number.
- Brightspace is configured to keep the last submission only. Please make sure your last submission in the one you want to get marked.
- All submission must be done on the main Brightspace shell, 19F_CST8234_010_ALL or 19F_CST8234_020_ALL, not the lab section one.