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Compilers I - Project 1 : Iteration 1 9/21/2018

Software Design Document

The Word Counter

The program will initially be designed with command line interface to take in name of a document from a user which must be placed in the same directory as the program.

The main() function will take the name of the text document as an argument, which in turn is presented by the user to the system.

The program intends to use some libraries such as the hash maps, scanner from java library to read words. The functions will be modified to use several symbols and spaces as delimiters for the words.

java.util.HashMap

import java.util.Scanner;

For every word that is found the program will build a hash map with Words and number of appearances in the text.

Initially there will be two x.java files.

One will be the main program that takes in the name of the .text/.epub files to be read, as an argument. It will also check if file exists.

Once file-name is found it will be passed onto the second .java file, which in turn will strip words using {space, comma, full stop,.... all punctuations except apostrophe}.

Once words are extracted we will create a hash map of the words with number of appearances in the text. This hash map would be written to .text file listing words and number of appearances.

