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Project 1

Before writing any code for this project, I was planning on using about 3 total classes to design it. I wanted to be able to only call a few methods in the main method and have all, if not most of the implementation in the other supporting classes. Unfortunately, as I got into writing the physical code, I got too carried away in the main method and before I knew it, I had read and processed the file and added the respective words/letters/values to each Hash Map. I decided from there to just print the Hash Maps and then when finished with the program, go back and use the body of code to implement another class or two. When I tried to do this, I got very confused because I was not quite sure how I should separate the classes anymore. I originally had a class for LetterMap and another for WordMap, each with their respective add and print methods. After spending quite a bit of time on this, I thought I had a working program with 3 total classes, but I continuously had runtime and logical errors. It got to the point where I decided it would be best to go back to my original design so that I would have a properly functioning program. If I could go back, I would have put more time into the design of the program before starting it. I had a lot of ideas going into starting the project, but I especially wanted to make the program as efficiently as possible. This could have been solved through the implementation of other classes within the project. However, I really ended up confusing myself by taking the program one direction, and then suddenly trying to redirect it another way. Even though I programmed the whole project in the main method, I tried to implement it as efficiently as I could, in terms of lines of code and use of memory. I am still satisfied that my program works well and is able to read in all kinds of text files, and I am way more comfortable using Hash Maps, which were the goals of this project. Also, for my research question I wanted to see the frequency of the first letter of each word in the text. When I did this, I got the same results as the WordMap, just the first letter of each of those words. Since 3 or 4 letters overlapped and they were basically the same result as WordMap, I decided to use the StopList as well in order to count the frequencies of the first letter of each word, and it is interesting to see the results – *a lot* of words start with ‘s’!