Write Up Assignment 0

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Testing:

I had several text files that I used for testing, as well as random messages that I put into standard input to make sure that the dash function worked. I passed the function a directory, and non-existent files to make sure that the right errors were passed as well.

Question 1: How does the code for handling a file differs from that for handling standard input? What concept is this an example of?

Coding for handling files and for standard input is almost identical. The main difference is that each file has a unique file descriptor that must be opened before reading and writing can begin. For standard input the file descriptor is also there but it is always constant given the value of 0. In class we learned about the importance of consistency of memory and naming. This is relevant to the question because of how similar file handling and standard input handling are from each other. To keep things simple and to avoid the need to create unnecessary additional functions, C++ uses read() and write() the same for both and changes what the file descriptors are. For standard input, they give it a special address of 0 so that it can be easily accessible by the programmer and easy to remember as the is also important for naming conventions.