1 From Last Time...

Last time, we unfortunately had (due to my mistake) missing information about some of the stream functions. This time, in order to rectify this situation, you have received full documentation of (almost) all stream functions present in C. In this lecture, I will cover the rest of stream functions using the documentation directly.

2 More Information about Streams

There are three important constant streams that you can make use of in a C program. The interesting part is that you have already used one of those without knowing that you did. These are defined in `stdio.h`, and are as follows:

```
FILE *stdin;
FILE *stdout;
FILE *stderr;
```

Of these, `stdin` is the stream used for input, which is normally the keyboard. It is, for example, what the `scanf()` function uses for input.

Similarly, `stdout` is the standard output, normally the console. The final stream, `stderr` is meant to print errors from the program, so that regular output and errors can be separated.

The point is that you can use these three standard streams anywhere you would use a stream if needed. These streams need not be opened or closed.

3 Exercise 1

Write a program that reads a file, and counts the number of space characters in it. (This is the third exercise from last time.)

4 Exercise 2

Write a program that writes (in binary format) the `chars` from 0 to 255 into a file.

5 Exercise 3

Write a program that reads a binary file, and writes a new file that contains all the bytes in the original file, but in reverse order.

6 Exercise 4

Write a program that prints out the values of the bytes in a file. Use this program together with the previous two to test your code for correctness.