Assignment 1: Modeling a platform that enables you to create your own textbook for learning system programming in C

Due Fri Jan 31st at 11:59pm

Individual work submitted on cuLearn as a pdf file

In this assignment you will exercise your newly acquired ArchiMate modeling skills. The system you will model is a platform that enables you to build your own digital textbook for learning system programming in C. The concept behind 'build your own textbook' is based on a learning methodology utilized in Waldorf education where students actually create their own personalized textbook of a subject throughout the course of studying it. They are termed main lesson books. 'Build your own textbook for learning system programming in C' would enable this process in the form of an online interactive textbook that students populate with their own content and exercises intended for the Waldorf-inspired education system and as a stand alone product. Essentially, it is a digital textbook creation software specifically designed for learning system programming in C.

For more information on Waldorf education, visit these links:

https://www.pinterest.ca/pin/688136018033725219/?lp=true

https://www.youtube.com/watch?v=tZmAX5adCl0&t=507s

https://www.waldorfeducation.org/waldorf-education

The textbook would contain the following:

1) A table of contents
   The table of contents can be customizable or come with a suggested template. This is the living evolving roadmap of your textbook as you build it.

2) Content section
   The content section consists of the following elements: a section for written and audio visual content, as well as a separate graphics space for an input device that enables the user to hand draw images with a pen like stylus.

3) Exercise, experimentation and projects section
   The exercise section allows for editing, compiling, executing, debugging and profiling C programs.

4) Communication section

This allows external users, such as peers or teachers, to access the content and share information.

5) Notation
   The ability to take notes in a sidebar and a legend or symbol system for navigating the textbook.

6) Self-assessment
   Functionality for assessing your level of understanding and skill by analyzing the results of attempted problems and projects.

You may choose to start with Prof Lanthier COMP2401 - Course Notes at
http://people.scs.carleton.ca/~lanthier/teaching/COMP2401/notes.html

You may also choose to look back at the tutorials, assignments and test you did in the course.

You may, however, also choose to use a different source for system programming in C.