Description

This software simply simulates a course registration environment in a university. There are two kinds of actors in this system: student and advisor. A student may register to a list of courses with certain regulations. Advisor's duty is to approve or disapprove the course list of the student he/she is advising to.

There is no GUI, so communication with the user of program is done through input/output files and command prompt. This software works in a randomized fashion, so every time it is executed different results are outputted to the user.

Requirements

Functional Requirements

- When a student wants to add a course to his/her schedule, it will be sent to advisor by registration system.
- When an instructor receives a list of courses to approval, he/she can approve or disapprove it.
- The software will output the randomized results in related json files and command prompt.
- The software will take the list of courses, types of courses, prerequisites, quota, and semester (fall/spring) from a json file.

Non-functional Requirements

- When a student wants to add a course to schedule, registration system will ensure there are no collisions in Student's schedule.
- While adding a course to a student, system must ensure that all prerequisites of that course is satisfied.
- While adding a course to a student, system will check that sum of credits does not exceed a certain limit.

Glossary

- Input: Any action user can do to software or computer
- Output: Software's reaction to the user action
- GUI: Stands for Graphical User Interface. It is a way to communicate with user employing icons, dropdown menus, windows and more.
- Command Prompt: It is a text-based program to the provide communication between user and the computer.
- Json: Stands for Open Standard File Format, it is a standard to exchange data between different computer software.
- Functional Requirement: Describes what a software does with different inputs.
- Non-functional Requirement: Describes how a software achieves a feature in a more technical view.