CS2292 Project Phase 1

February 14, 2021

- Develop a simulator on the lines of QtSPIM.
- Your simulator should support the following MIPS instructions: ADD/SUB, BNE, Jump, LD/ST, and an instruction of your choice.
- If you decide to simulate an architecture different from the MIPS, or MIPS with different register size, number of registers, or the instruction width, there should be a design justification.
- The simulator should support atleast 4 KB of memory.
- The simulator should read in an assembly file, execute the instructions, and in the end display the contents of the registers, and the memory.
- Features like single step execution, graphical interface or any other feature you can think of, is not compulsory, and is left to your choice.
- Code should be maintained using git, and uploaded on github. Keep the github repo private.
- Any programming language can be used to develop the simulator.
- Your simulator should be able to run bubble sort written in assembly.
- If you are unable to complete the project, do prepare a document detailing what you tried, what did not work etc. The document along with the incomplete code will be evaluated.
- Any kind of malpractice will fetch you a straight *F*. Malpractice also includes sharing your code with someone else, so don't try to be a hero/heroine or saviour!
- Individual members of a team will be evaluated based on their contribution.
- This is "your" project, "you" might add it in "your" CV.
- Have fun!