

Ethan Hutton Work Log

Milestone 1

Wednesday, September 27th

- Met with Wesley and Ethan in class to read over milestone 1. Discussed which processor we want to build and which instructions to use. Tried to get everything to fit into a 4-bit opcode to allow space for other things like registers and immediates. Discussed trying to have instructions act like other processors such as accumulator and/or mem-to-mem [30 minutes]

Sunday, October 1st

- Discussed with the whole team and discussed changing processors. After some debate and discussion we ended up settling on memory to memory since it looks to be the most efficient. Designed our own green sheet and got the majority of the milestone done. [~ 3 hours]
 - I described the different instruction types, talked about our addressing mode and calling conventions. Instruction types are long but necessary for memory to memory. We're using direct addressing since it's simplest and most efficient to just pull directly from memory for memory to memory. The only calling convention we have is to push the return address on the stack before jumping. This is so we can pop it off the stack and return to where we need to after.
- Our current priority is to just add in the few missing points and meet up on Wednesday before break to assign some tasks if we want to work over break

Monday, October 2nd

- Finished up what I was assigned to do and formatted what we had into a nicer document [~20 minutes].

Tuesday, October 3rd

- Met with team to discuss next milestone and pushed journal and design doc [20 minutes]

Tasks assigned for the next milestone:

1. Take an instruction type and create pseudocode to break it up into steps
2. Take the pseudocode for the instruction type and create a component out of it. [est 2 hrs]