

COMP262-01

CPU SIM Project: a PEP8 Virtual Machine SIMULATION–PART7 CODING of the SIMULATION PROCESS/PROGRAM

Continue with and complete the coding of the Simulation program.

For this part (7), we will need the results of part6, a partial completion of the instruction processing methods.

We will now proceed to implement the remaining instruction processing methods ('invoked' from the EI):

BR	Branch unconditional
BRLE	Branch if less than or equal to
BRLT	Branch if less than
BREQ	Branch if equal to
BRNE	Branch if not equal to
BRGE	Branch if greater than or equal to
BRGT	Branch if greater than
BRV	Branch if V
BRC	Branch if C

At this point, the simulation will produce the complete update of the CPU State (Status bits, Registers, Memory), for the complete program.

The final verification step is to have BOTH the PEP8 app and the SIMULATION program, executing a step at a time, side by side windows open, verifying that the CPU STATE Elements are identical in both.

Deliverables

The source for the program, with DETAILED comments indicating WHAT parts of the program are not working and what is left to be coded.