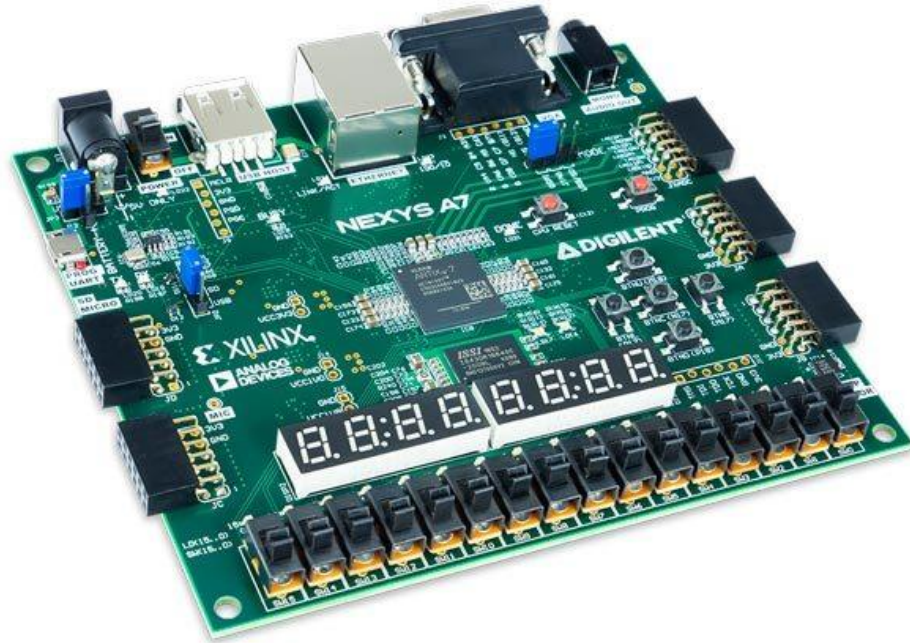




Snake VHDL Game

ECE 2700 Digital Logic Design – Professor
Llamocca

Contributors: Peyton Schmid and Eric Wyman

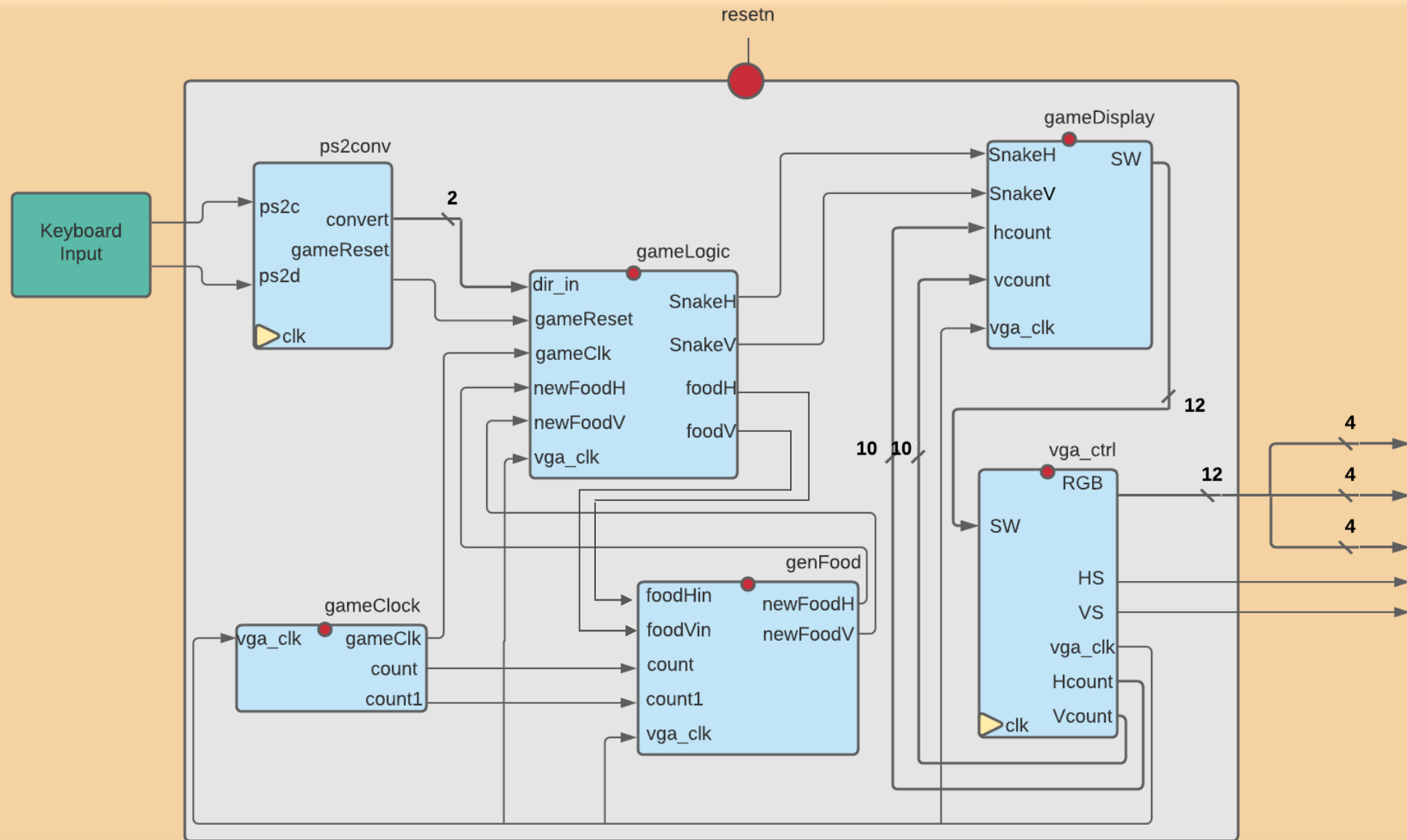


Components

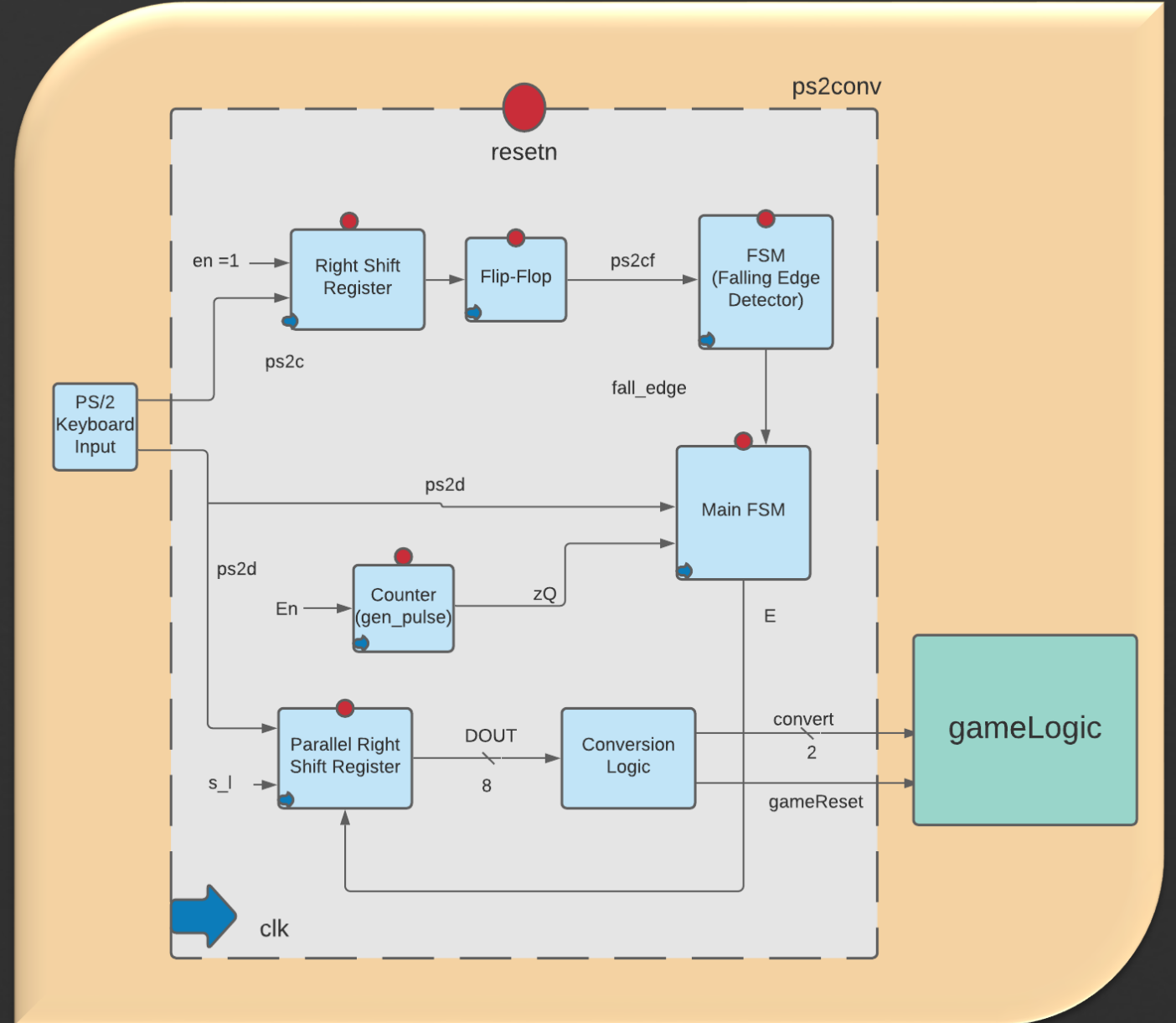
- ◇ Nexus A7-50T FPGA Board
- ◇ VGA Display
- ◇ USB Keyboard



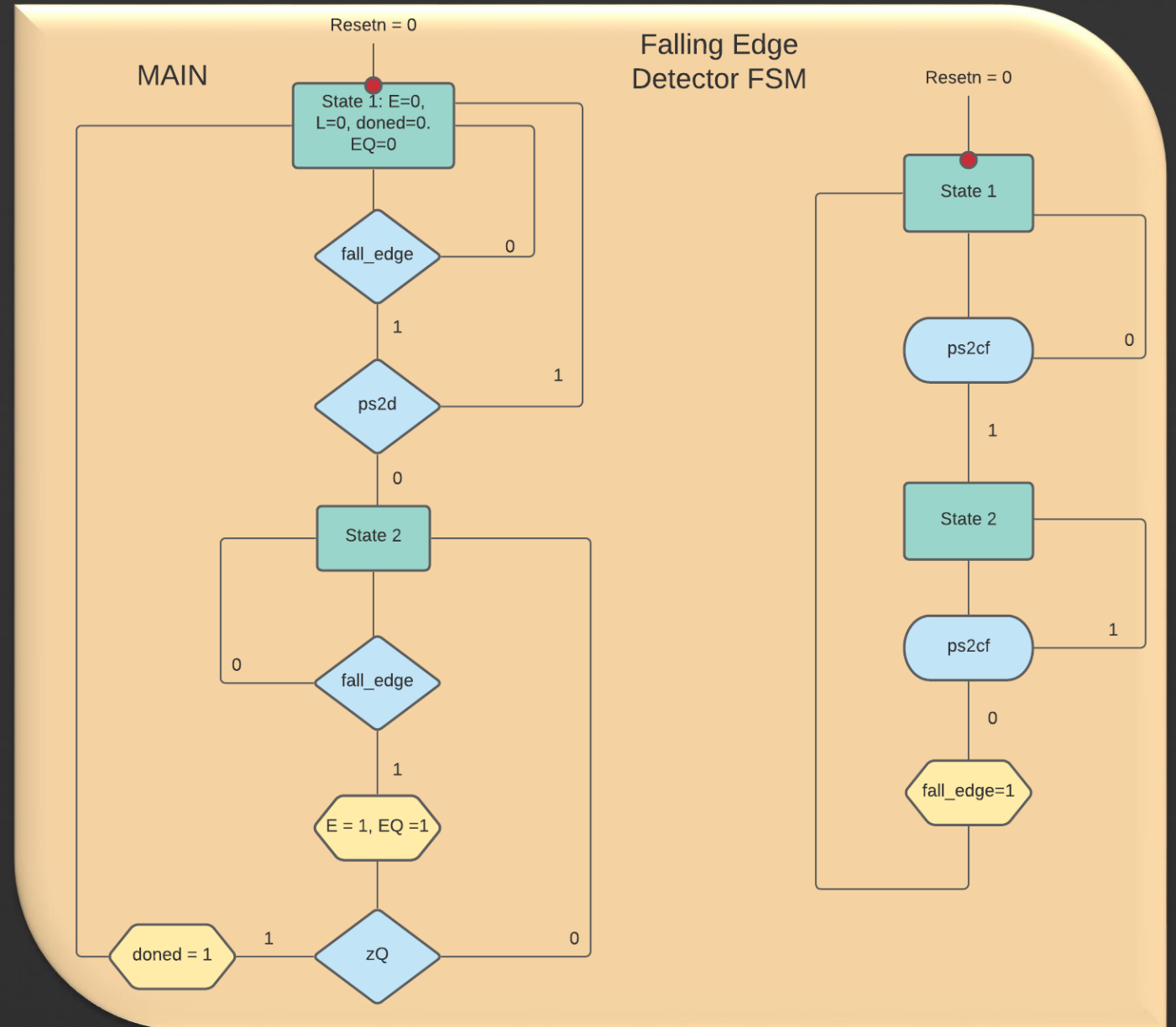
Top Level Diagram



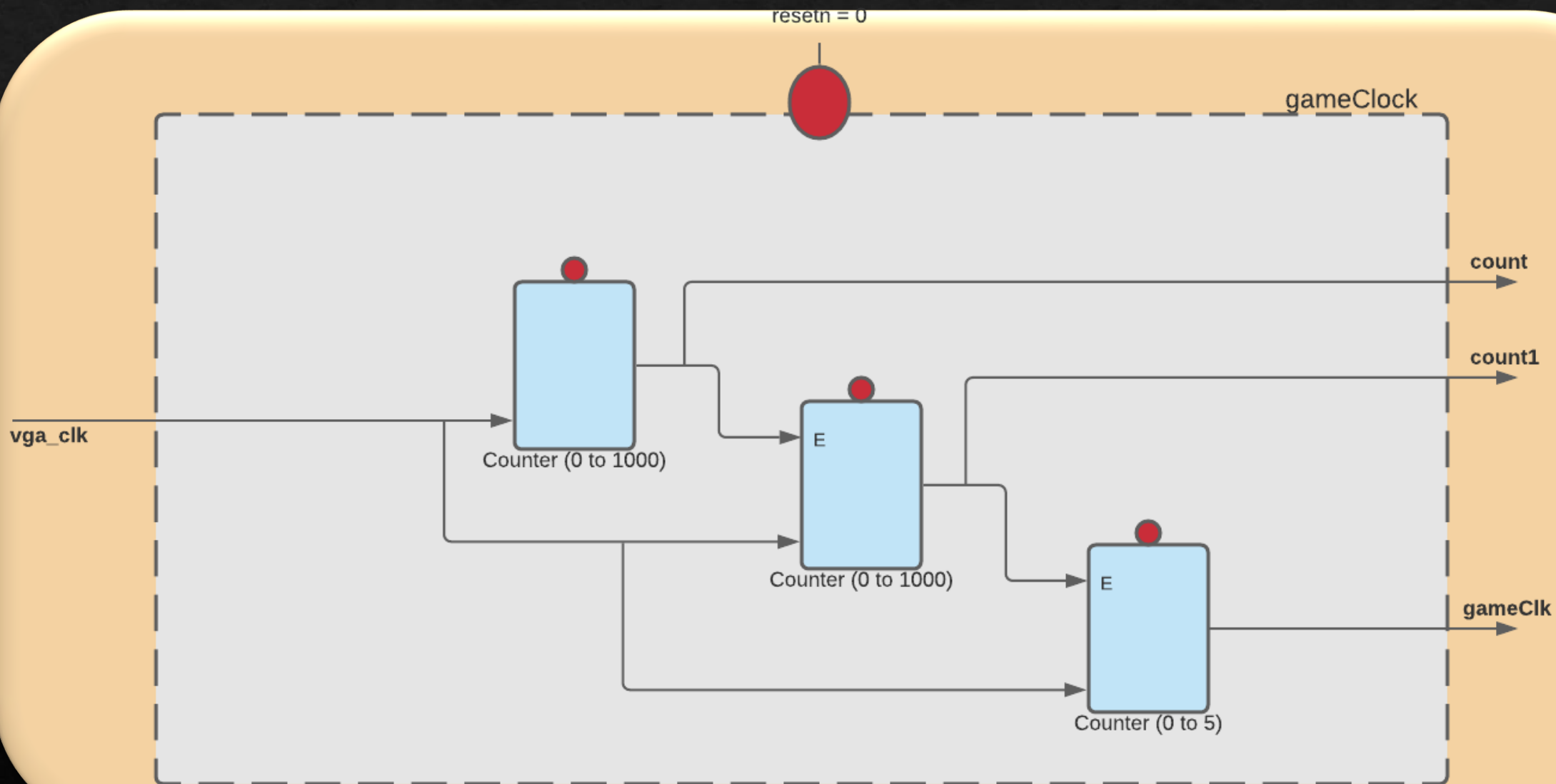
PS/2 Conversion to System Inputs



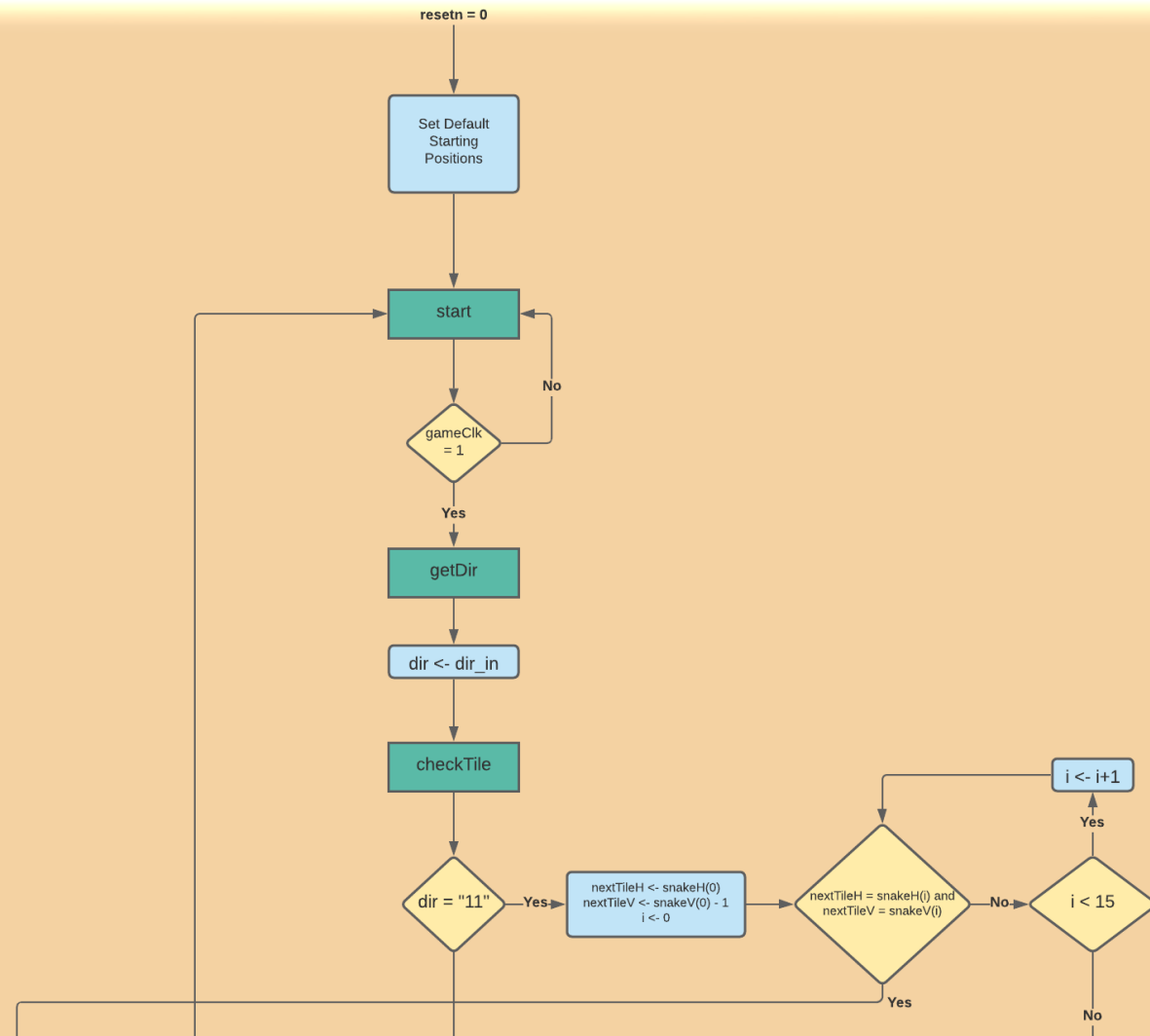
PS/2 Conversion to system inputs ASM Chart



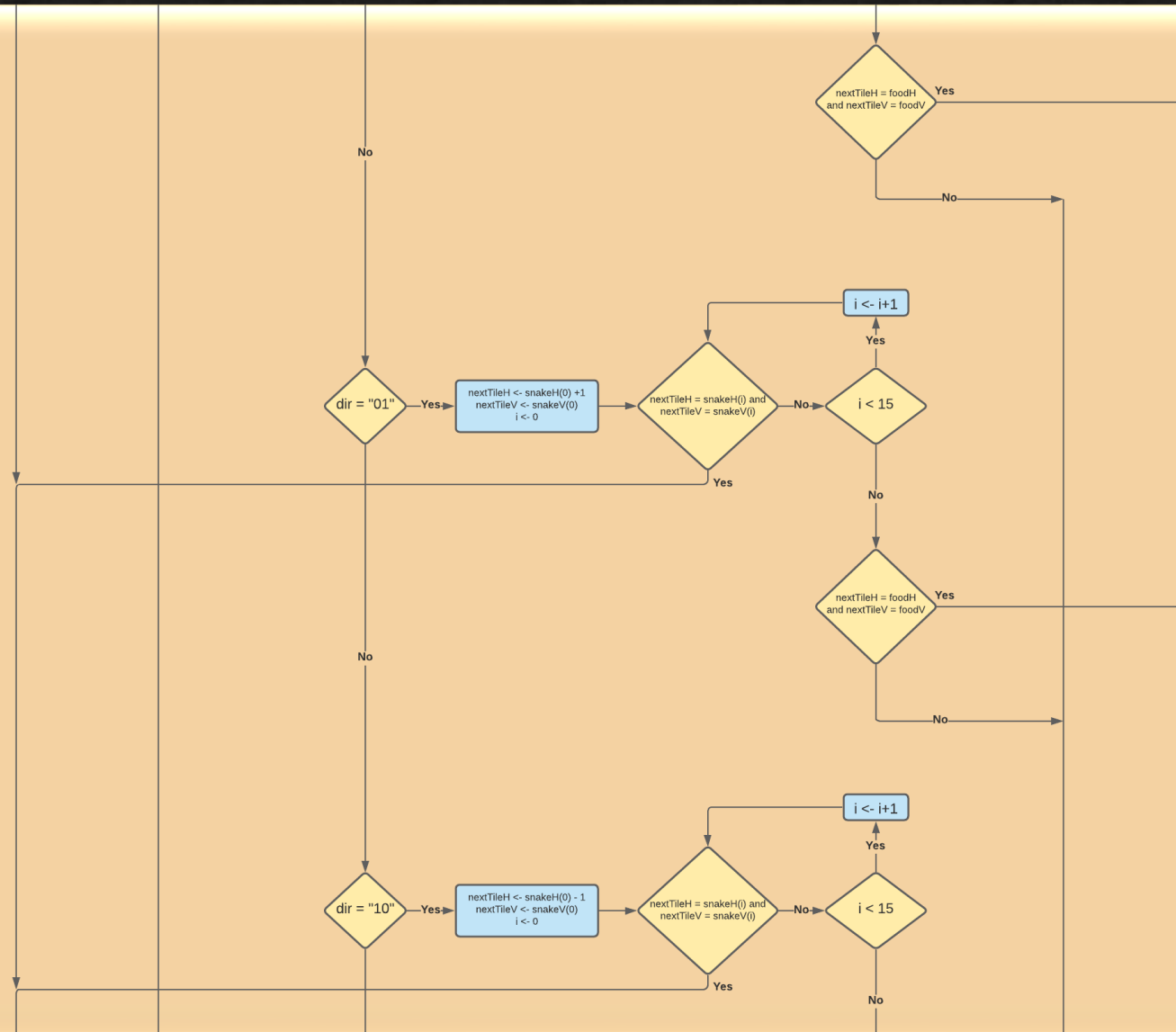
Game Clock



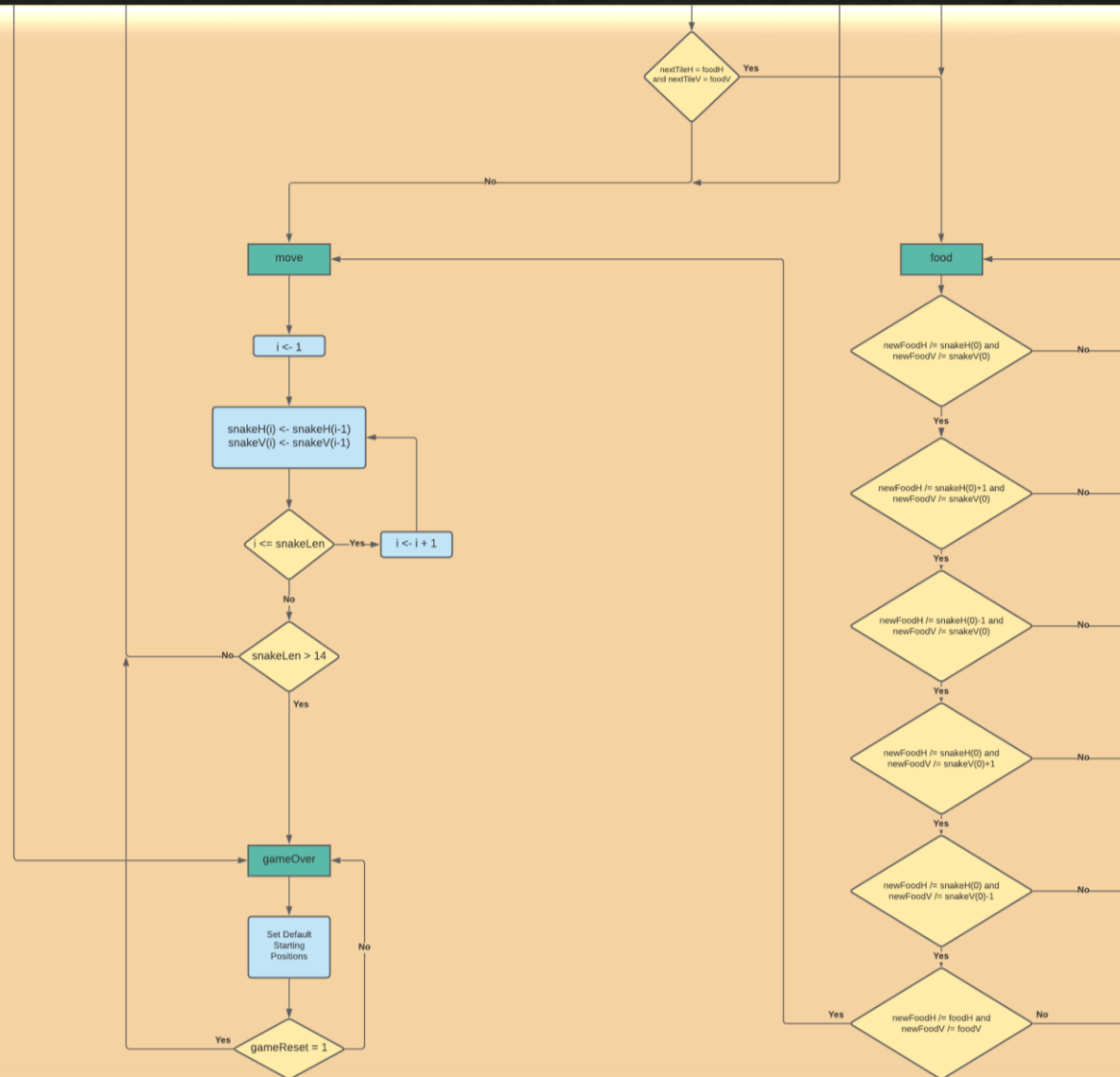
gameLogic ASM Chart (1)



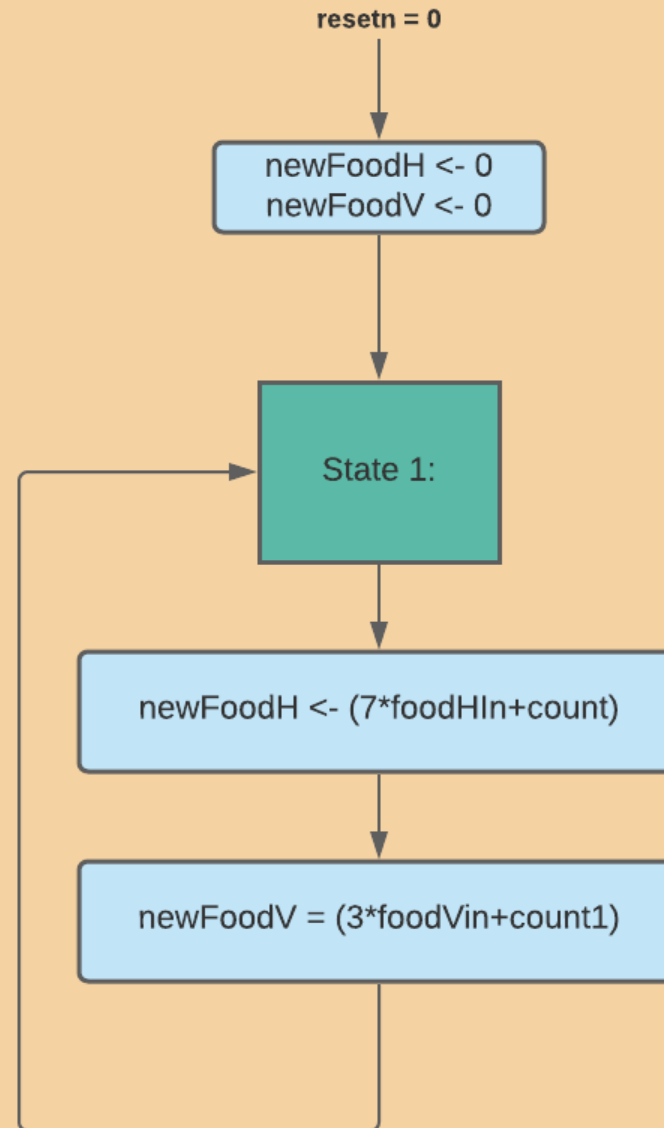
gameLogic ASM Chart (2)



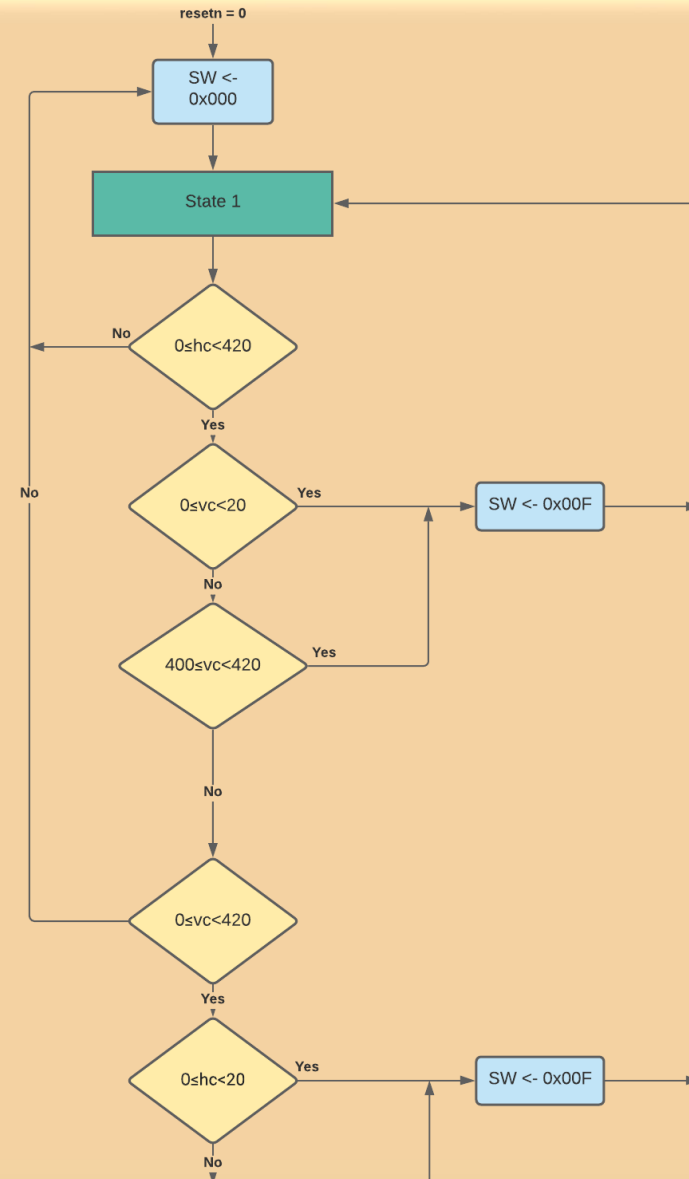
gameLogic ASM Chart (3)



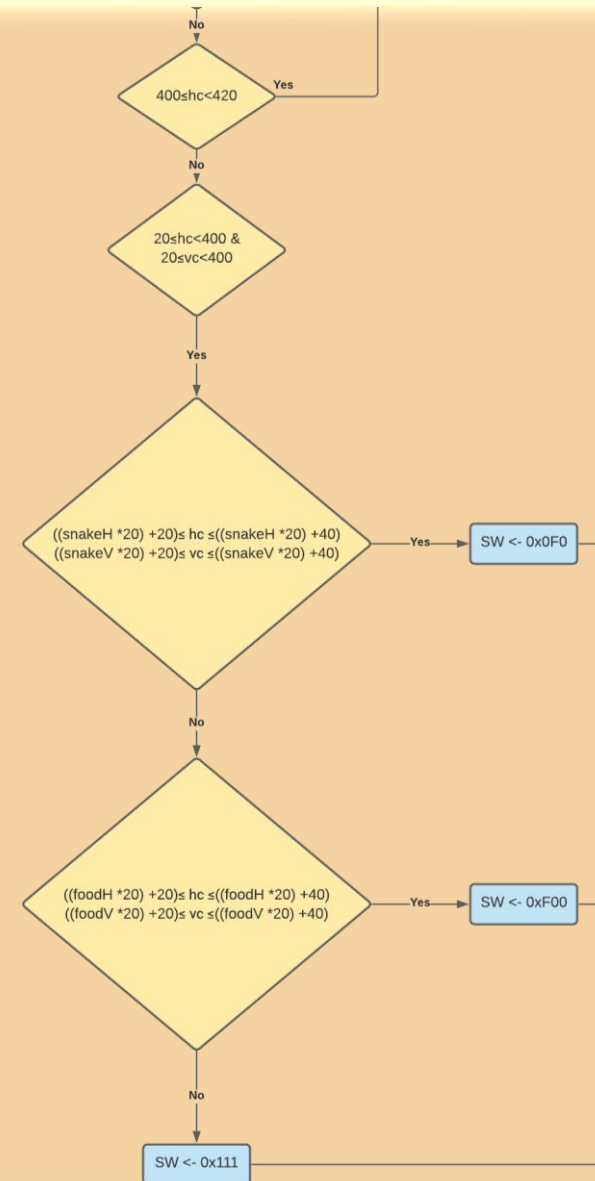
genFood ASM Chart



gameDisplay ASM Chart (1)



gameDisplay ASM Chart (2)





Demonstration

<https://youtu.be/05jZkSMZmzs>