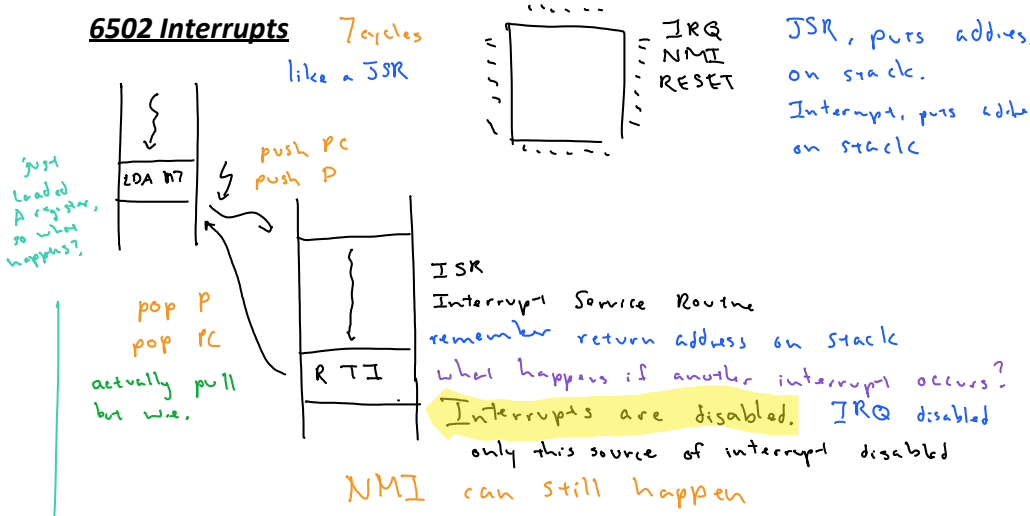
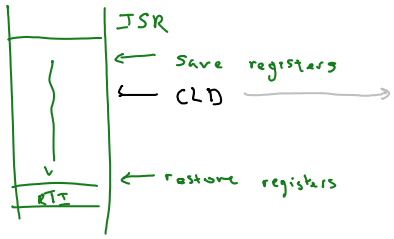
14 6502 Interrupts, Busses

Wednesday, October 7, 2015 10:01 AM

6502 Interrupts





Designing 6502, made one fatal mistake, the D flag, it changes the way addition and subtraction work

D flag - BCD, binary coded decimal

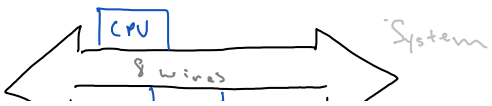
If there are multiple sources of interrupts, its up to the software to CHECK

1 cycle - fixed time for the CPU to do 1 step

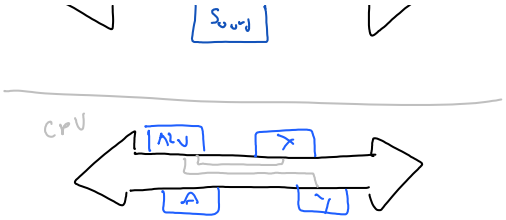
Why are there interrupts?

- System
  - Time thing
- Coding level
  - Don't want to worry about all the things that might need servicing
    - A video game coder doesn't want to worry about printer, disk drivers
    - A excel spreadsheet doesn't want to worry about sound card

BUSSES



Z, a third state,
We already have 0s and 1s, Z determines if its connected to the



bus

Tri-state Logic

0

1

Z - not connected, high impendence

Always have at least 2 busses

- Address bus
- Data bus
- Optional
    - Control bus

Memory Maps:

- Address decoder logic
- Bit pattern

Another select - chip select, might be more