Open Book/Notes quiz

**1)** **(20 points)** Digital I/O

10 short answer questions – 2 points each

a) How many pins are in each digital I/O port? \_\_\_\_\_\_\_\_\_8\_\_\_\_\_\_\_\_\_\_\_\_\_\_

b) How many total ports are there in the MSP430? \_\_\_\_\_\_\_\_\_6\_\_\_\_\_\_\_\_\_\_\_\_\_\_

c) The digital I/O ports of the MSP430 are called? \_P \_1\_\_through \_\_\_\_P 6\_\_\_\_\_\_\_\_

d) Does each version of the MSP430 have and external pin for all the digital ports?

**QUESTION DISCARD due to and vs an** **YES** or **NO** (circle)

e) The pins of each port can be individually configured for the input or output direction.

**T** or **F** (circle)

f) Which port(s) have interrupt capability? \_\_\_\_\_P1 and P2\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

g) All ports have their own PxIN and PxOUT register. **T** or **F** (circle)

h) All the pins of Port 6 must be configured the same, i.e., all must be input or all must be output.

**T** or **F** (circle)

i) The Port 1 P1IES register, (Interrupt edge select) configures the port to enable interrupts.

**T** or **F** (circle)

j) All ports have a PxIFG register. **T** or **F** (circle)