# ECE 271 - Homework #5b
For your pleasure only - not collected

1.  Write a program module that will branch to memory location $120 if the **unsigned** number in memory location $2000 is less than 50 (decimal).

2.  Rewrite the above code assuming the number in memory is a **signed** number.

3.  Give an example of a value in memory which would cause one of the above versions of code to branch, but not the other.

4.  Write a program module that will branch to memory location $120 if the unsigned number pointed to by the X register is less than the unsigned number which is 5 bytes after the location pointed to by the X register.

5.  Write a program module that will branch to memory location $120 if the signed number at memory location $2000 is negative. For full credit, do not use any of the registers.

6.  Write a program module that will subtract the number 50 (decimal) from the **unsigned** number in the A register and then branch to memory location $120 if the result is incorrect.

7.  Write a program module that will subtract the number 50 (decimal) from the **signed** number in the A register and then branch to memory location $120 if the result is incorrect.

8.  Write a program module to exchange the numbers in the A and B accumulators.

9.  Explain how the COM instruction is different from the NEG instruction. Give an example of how each might be used.

10. Rewrite the "table copy" example of Figure 2-48 (same in both editions) as actual assembly code (e.g., the first instruction is LDX $30 rather than LDX DIR). Give the assemble directive that will make the code begin at the correct address.

11. Modify the "table copy" example of Figure 2-48, so it becomes a "block clear" program; i.e., instead of copying the table to somewhere else, set all of its values to $00.