Assignment #1 - In Class Worksheet
Covering Lectures 3, 4, 5 (Wed 10/3, Fri 10/5, Mon 10/8)

Main Functional Groups

1a. Write the name each of the functional groups under each diagram above.

1b. Which are polar? Which are non-polar?

1c. Which can act as a base? Which can act as an acid?

2. An ester linkage is created by a ______________ reaction in ______________.
   A) fusion, carbohydrates
   B) hydrolysis, nucleic acids
   C) dehydration, lipids
   D) van der waals, proteins

3. Water is a solvent that is polar. Organic solvents are non-polar. If you were to pour phospholipids into an organic solvent, what structure would they create? Draw it in the space below.

4. Steroids pass easily through the cell membrane because they are ____________________________
   A) super strong
   B) hydrophobic
   C) polar
   D) small

5. Why are animal fats generally solid at room temperature while plant fats are generally liquid at room temperature?

6. On the back, list 3 other items/concepts that this assignment did not cover and one ‘fact’ about each.