

# 1 | Bio-Molecules Quiz Review

## 1.1 | Paul's Review Sheet

... is here

And Jack's raw answers: KBhBIO201BioMoleculesRAW

## 1.2 | Jack's Review Smanza

- **Macromolecules**

- KBhBIO101Carbs & KBhBIO101StructuresofCarbs
- KBhBIO101Lipids & KBhBIO101StructuresOfLipids

- **Proteins, Amino Acids, and Enzymes**

- KBhBIO101AminoAcids & KBhBIO101FunctionalGroups
- KBhBIO101Proteins
- KBhBIO101Enzymes

- **Cell Structure, Type, and Transport**

- KBhBIO101Cells. Duh.
- KBhBIO101CellMembraines
- KbhBIO101CellTransport
- KBhBIO101EukaryoticOrganells

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KBhBIO101OrganellsBasedOnMembranes

## 1.3 | Helpful review items

Bonding in organic compounds, a review.

common nonpolar bonds.

Carbon-carbon

Carbon-hydrogen

Carbon-sulfur

common dipole interactions

Carbon-nitrogen

$\delta^+ - \delta^-$

Nitrogen-oxygen

$\delta^+ - \delta^-$

Carbon-oxygen

$\delta^+ - \delta^-$

Hydrogen-oxygen

$\delta^+ - \delta^-$

common ionic interactions



they come from acid-base interactions.

However, sometimes they are permanent. Look at the amino acid chart for those.

why hydrogen bonding is excellent

hydrogen bonding allows stronger dipole-dipole bonds than dipole-dipole bonds.

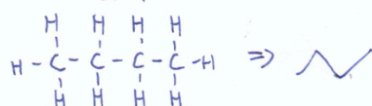
They are still good ol covalent bonds.

these bonds basically combines Hydrogen w/ the most electronegative atoms.



Reading a line-angle representation.

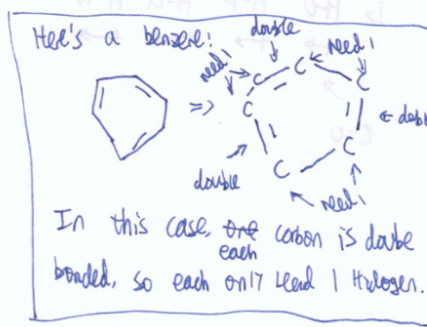
Butane:



In this type of representations, start with a line. End the line at every carbon.



Now, it is assumed that carbon is not going to just be happy with  $\text{C}-\text{C}-\text{C}-\text{C}$ .



so, we still the missing orbitals with hydrogen.

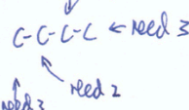


Figure 1: Screen Shot 2020-10-09 at 11:58:55 AM.png

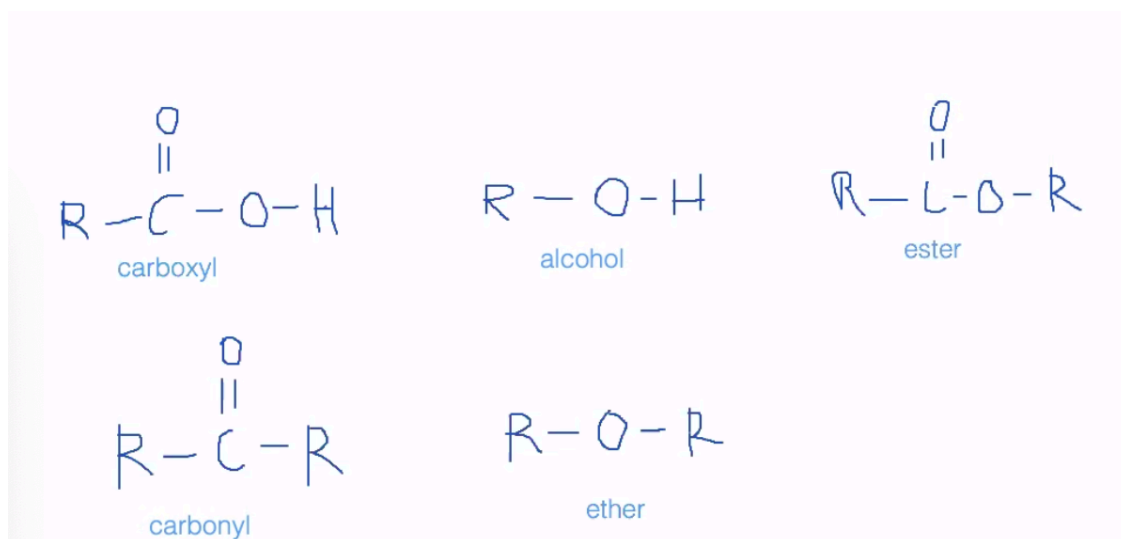


Figure 2: Screen Shot 2020-10-12 at 2.34.16 PM.png