

# FUNCTIONAL GROUP CONCEPT.

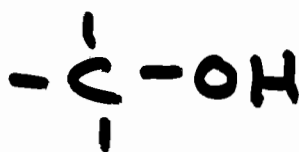
- HALIDES ARE EXCEPTIONS
- EVERY OTHER COMMON FUNCTIONAL GROUP IS IN SUFFIX, SINCE COMPOUND IS NAMED AS A KETONE, ETC.

or as an aldehyde, or as an ester, or as an alcohol, etc.

FUNCTIONAL GROUP

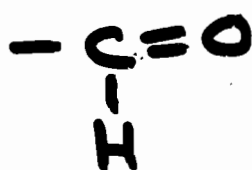
SUFFIX.

ALCOHOL



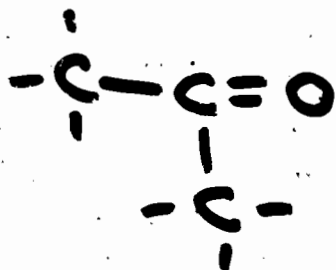
-OL

ALDEHYDE



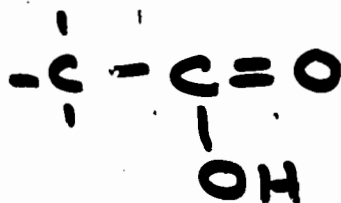
-AL

KETONE



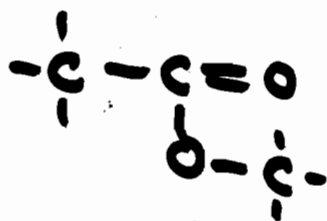
-ONE

CARBOXYLIC ACID



-OIC ACID.

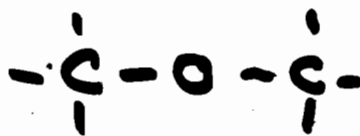
ESTER



ALKYL

-OATE

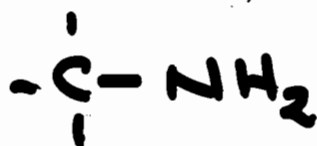
ETHER



ALKYL ALKYL

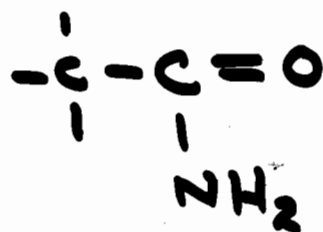
ETHER

AMINE



-AMINE

AMIDE



-AMIDE

NITRILE



-(E)NITRILE

ACYL  
HALIDE



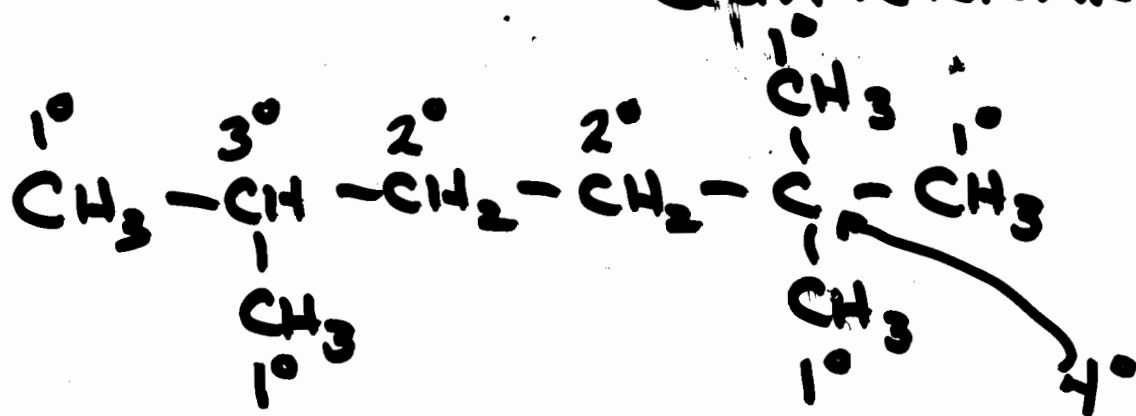
-OYL CHLORIDE

OR ACID  
HALIDE

yes, acid bromides and acid fluorides do exist, but are so much less common than acid chlorides that we'll just focus on acid chlorides

# SOME ADDITIONAL TERMS.

- PRIMARY, SECONDARY, TERTIARY, QUATERNARY



- PRIMARY ( $1^\circ$ ) - CARBON BOUND TO ONE OTHER CARBON
- SECONDARY ( $2^\circ$ ) - BOUND TO TWO OTHER CARBONS.
- TERTIARY ( $3^\circ$ ) - BOUND TO THREE OTHER CARBONS
- QUATERNARY ( $4^\circ$ ) - BOUND TO FOUR OTHER CARBONS.

# OTHER TERMS

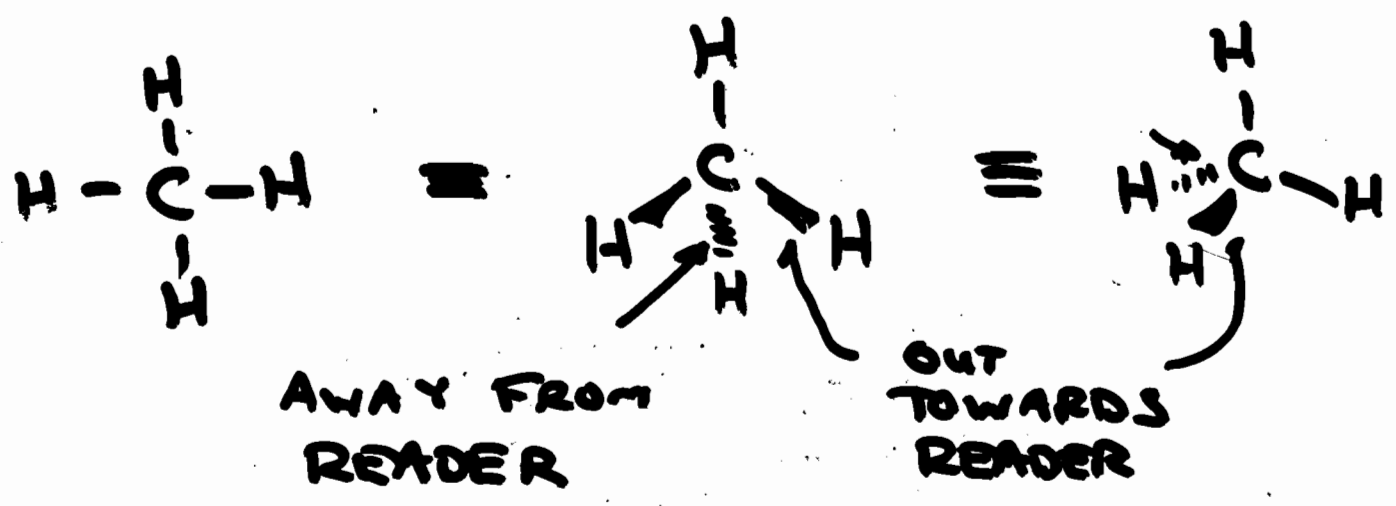
- METHYL - CH<sub>3</sub>

- METHYLENE - CH<sub>2</sub>-

- METHINE -  $\begin{array}{c} | \\ -C-H \\ | \end{array}$

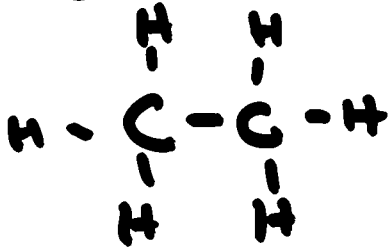
## CH 3 STEREOCHEMISTRY.

- DISCUSSION OF DIFFERENCES IN MOLECULE AS THEY EXIST IN SPACE - CAN BE 2-D OR 3-D.

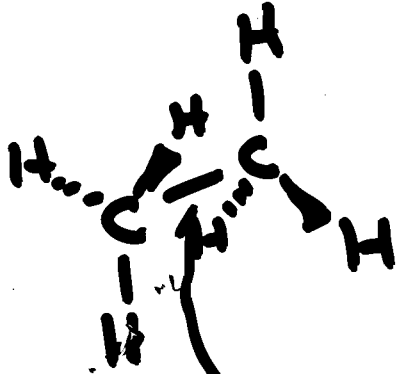


- ALL FOUR C-H'S IDENTICAL.

ONCE YOU GET TO ETHANE



NOT ALL OF THE RELATIONSHIPS ARE THE SAME.



THAT BOND CAN ROTATE

CHANGES THE RELATIONSHIPS OF THE C-H BONDS.