

CARBON is the most common atom that forms molecular bonds.

The reason for this is that Carbon has a Combining Capacity of 4.

Bohr diagram:

Draw the molecule:

a) CH₄: Carbon Tetrahydride (methane)

b) CO₂: Carbon dioxide

Combining Capacity = # bonds (2 electrons)

Group	17 (Halogens)	-	Comb. Cap. = 1
"	16	"	" = 2
"	15	"	" = 3
"	14	"	" = 4

Some with common names (you have to memorize these!!!)

CH₄ - Methane - Carbon tetrahydride
H₂O - Water - dihydrogen monoxide
NH₃ - Ammonia - Nitrogen trihydride
H₂O₂ - hydrogen peroxide - dihydrogen dioxide
O₃ - ozone - trioxide
O₂ - oxygen gas - dioxide

Apr 3-1:25 PM