

NAMING CHEMICAL COMPOUNDS

The “-ide” Rule:

(for Binary Compounds)

When two elements combine into a compound the compound is named as follows:

- the first word of the compound name is the name of the first element (the most metallic element)
- the second word of the compound name is the name of the second element with the end of its name changed to the suffix “-ide”.

Chloride, fluoride, iodide, oxide, sulfide

examples: Magnesium Oxide (MgO), Sodium Sulfide (Na₂S), Aluminium Oxide (Al₂O₃)

The “-ate” Rule: (for polyatomic ions containing oxygen)

When two elements combine with oxygen to form a compound the compound is named as follows:

- the first word of the compound name is the name of the first element (the most metallic element of the group)
- the second word is the name of the second element with the end of its name changed to the suffix “-ate”

sulfate, carbonate, nitrate

examples: Magnesium Carbonate (Mg(CO₃)₂), Calcium Sulfate (CaSO₄)

Try These:

NaCl _____

AgCl _____

CaO _____

MgCl₂ _____

Li₂SO₄ _____

HF _____

CaCO₃ _____

Al₂(SO₄)₃ _____

Special Names:

hydroxide, hydrogen carbonate (bicarbonate)

NaOH _____

Ca(OH)₂ _____

NaHCO₃ _____