

Nomenclature of Binary Covalent Compounds

I. Non-Metal with a Non-Metal

- Name the more “metal-like” element first. (See below for correct ordering.)
- Use an *-ide* ending for the second element.
- Use a Greek prefix (see below) to indicate the number of atoms for each element; unless it is the first element and only one common case occurs.

Ex: CO₂
Carbon Dioxide

(-ide) Endings for the Non-Metals

<u>Group 4A</u>	<u>Group 5A</u>	<u>Group 6A</u>	<u>Group 7A</u>
Carbide	Nitride	Oxide	Fluoride
	Phosphide	Sulfide	Chloride
	Arsenide	Selenide	Bromide
		Telluride	Iodide

Ordering for Non-Metal with Non-Metal Compounds

Element:	B	Si	C	Sb	As	P	N	H	Te	Se	S	I	Br	Cl	O	F
Group:	3A	4A		5A					6A			7A				

Greek Prefixes

<u>Number</u>	<u>Prefix</u>
one	<i>mono-</i>
two	<i>di-</i>
three	<i>tri-</i>
four	<i>tetra-</i>
five	<i>penta-</i>
six	<i>hexa-</i>
seven	<i>hepta-</i>
eight	<i>octa-</i>
nine	<i>nona-</i>
ten	<i>deca-</i>