

CONCEPT: NAMING MOLECULAR COMPOUNDS

- **Molecular (Covalent) Compounds:** compounds contain only _____ bonded together.
 - **Numerical prefixes** are always required because these compounds can combine in different proportions.

Numerical Prefixes									
Mono	<u>1</u>	Di	<u>2</u>	Tri	<u>3</u>	Tetra	<u>4</u>	Penta	<u>5</u>
Hexa	<u>6</u>	Hepta	<u>7</u>	Octa	<u>8</u>	Nona	<u>9</u>	Deca	<u>10</u>

Rules for Naming Molecular Compounds

STEP 1: The first nonmetal is named normally and uses all **numerical prefixes** except _____.

STEP 2: The second nonmetal keeps its base name, uses any **numerical prefix**, and has its ending changed to _____.

- When naming, if the letter "a" of the **numerical prefix** is next to a letter "o" we can just drop the letter "a".
 - For example, tetraoxide would become _____.

EXAMPLE: Write the formula for each of the following compounds.

a. Disulfur monochloride

b. Tetraphosphorus pentaselenide

c. Dibromine heptoxide

PRACTICE: Give the systematic name for the following compound: SeF_6

PRACTICE: Give the systematic name for the following compound: IO_5

PRACTICE: Give the systematic name for the following compound: N_2S_4