

## Naming Covalent Compounds Solutions

Write the formulas for the following covalent compounds:

- 1) antimony tribromide **SbBr<sub>3</sub>**
- 2) hexaboron silicide **B<sub>6</sub>Si**
- 3) chlorine dioxide **ClO<sub>2</sub>**
- 4) hydrogen iodide **HI**
- 5) iodine pentafluoride **IF<sub>5</sub>**
- 6) dinitrogen trioxide **N<sub>2</sub>O<sub>3</sub>**
- 7) ammonia **NH<sub>3</sub>**
- 8) phosphorus triiodide **PI<sub>3</sub>**

Write the names for the following covalent compounds:

- 9) P<sub>4</sub>S<sub>5</sub> **tetraphosphorus pentasulfide**
- 10) O<sub>2</sub> **oxygen**
- 11) SeF<sub>6</sub> **selenium hexafluoride**
- 12) Si<sub>2</sub>Br<sub>6</sub> **disilicon hexafluoride**
- 13) SCl<sub>4</sub> **sulfur tetrachloride**
- 14) CH<sub>4</sub> **methane**
- 15) B<sub>2</sub>Si **diboron silicide**
- 16) NF<sub>3</sub> **nitrogen trifluoride**

## Compound Names and Formulas – Solution Key

### Formula to name problems:

- 1) NaF is sodium fluoride
- 2)  $K_2CO_3$  is potassium carbonate
- 3)  $MgCl_2$  is magnesium chloride
- 4)  $Be(OH)_2$  is beryllium hydroxide
- 5) SrS is strontium sulfide
- 6)  $Cu_2S$  is copper (I) sulfide
- 7)  $ZnI_2$  is zinc iodide
- 8)  $Ca_3(PO_4)_2$  is calcium phosphate
- 9)  $NH_4I$  is ammonium iodide
- 10)  $Mn(NO_3)_3$  is manganese (III) nitrate
- 11)  $FePO_4$  is iron (III) phosphate
- 12)  $CoCO_3$  is cobalt (II) carbonate

### Name to formula problems:

- 13) potassium fluoride is KF
- 14) ammonium sulfate is  $(NH_4)_2SO_4$
- 15) magnesium iodide is  $MgI_2$
- 16) copper (II) sulfite is  $CuSO_3$
- 17) aluminum phosphate is  $AlPO_4$
- 18) lead (II) nitrite is  $Pb(NO_2)_2$
- 19) cobalt (II) selenide is CoSe
- 20) silver cyanide is AgCN
- 21) copper (II) bicarbonate is  $Cu(HCO_3)_2$
- 22) iron (II) oxide is FeO
- 23) lithium cyanide is LiCN
- 24) lead (IV) sulfite is  $Pb(SO_3)_2$