

# Ionic Nomenclature Worksheet

## I. Write the formula for each of the compounds.

- |                           |                                |
|---------------------------|--------------------------------|
| 1) copper(II) sulfate     | 10) barium hydroxide           |
| 2) ammonium nitrate       | 11) calcium chlorate           |
| 3) lithium dichromate     | 12) aluminum sulfite           |
| 4) magnesium acetate      | 13) chromium(II) oxide         |
| 5) sodium arsenate        | 14) potassium periodate        |
| 6) chromium(II) hydroxide | 15) sodium hypochlorite        |
| 7) lead(II) sulfate       | 16) ammonium dichromate        |
| 8) tin(IV) phosphate      | 17) potassium hydrogen sulfide |
| 9) sodium bicarbonate     | 18) lithium perchlorate        |

## II. Give the name of the following compounds. In the case of transition metals, give both the Stock System and the Traditional System.

- |                                 |                                      |
|---------------------------------|--------------------------------------|
| 1) $\text{Fe}_2(\text{SO}_4)_3$ | 10) $\text{Ag}_2\text{SO}_4$         |
| 2) $\text{Na}_3\text{PO}_4$     | 11) $\text{Co}(\text{OH})_2$         |
| 3) $\text{Pb}(\text{NO}_3)_2$   | 12) $\text{AgClO}_3$                 |
| 4) $\text{FeCl}_3$              | 13) $\text{K}_2\text{SO}_3$          |
| 5) $\text{KIO}_3$               | 14) $\text{CrCO}_3$                  |
| 6) $\text{CaF}_2$               | 15) $\text{K}_2\text{C}_2\text{O}_4$ |
| 7) $\text{NaHSO}_4$             | 16) $\text{CaCr}_2\text{O}_7$        |
| 8) $\text{CuS}_2\text{O}_3$     | 17) $\text{ZnCO}_3$                  |
| 9) $\text{PbF}_2$               | 18) $\text{CuS}$                     |

# Solutions

## I. Write the formula for each of the compounds.

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|--|--|
| 1) $\text{CuSO}_4$                               | 10) $\text{Ba(OH)}_2$                      |
| 2) $\text{NH}_4\text{NO}_3$                      | 11) $\text{Ca(ClO}_3)_2$                   |
| 3) $\text{Li}_2\text{Cr}_2\text{O}_7$            | 12) $\text{Al}_2(\text{SO}_3)_3$           |
| 4) $\text{Mg}(\text{C}_2\text{H}_3\text{O}_2)_2$ | 13) $\text{CrO}$                           |
| 5) $\text{Na}_3\text{AsO}_4$                     | 14) $\text{KIO}_4$                         |
| 6) $\text{Cr(OH)}_2$                             | 15) $\text{NaClO}$                         |
| 7) $\text{PbSO}_4$                               | 16) $(\text{NH}_4)_2\text{Cr}_2\text{O}_7$ |
| 8) $\text{Sn}_3(\text{PO}_4)_4$                  | 17) $\text{KHS}$                           |
| 9) $\text{NaHCO}_3$                              | 18) $\text{LiClO}_4$                       |

## II. Give the name of the following compounds. In the case of transition metals, give both the Stock System and the Traditional System.

- |  |   |
|--|---|
| 1) iron(III) sulfate, ferric sulfate   | 10) silver sulfate                                |
| 2) sodium phosphate                    | 11) cobalt(II) hydroxide,<br>cobaltous hydroxide  |
| 3) lead(II) nitrate, plumbous nitrate  | 12) silver chlorate                               |
| 4) iron(III) chloride, ferric chloride | 13) potassium sulfite                             |
| 5) potassium iodate                    | 14) chromium(II) carbonate,<br>chromous carbonate |

- |  |   |
|--|---|
| <b>6) calcium fluoride</b>                               | <b>15) potassium oxalate</b>                  |
| <b>7) sodium hydrogen sulfate,<br/>sodium bisulfate</b>  | <b>16) calcium dichromate</b>                 |
| <b>8) copper(II) thiosulfate,<br/>cupric thiosulfate</b> | <b>17) zinc carbonate</b>                     |
| <b>9) lead(II) fluoride,<br/>plumbous fluoride</b>       | <b>18) copper(II) sulfide, cupric sulfide</b> |