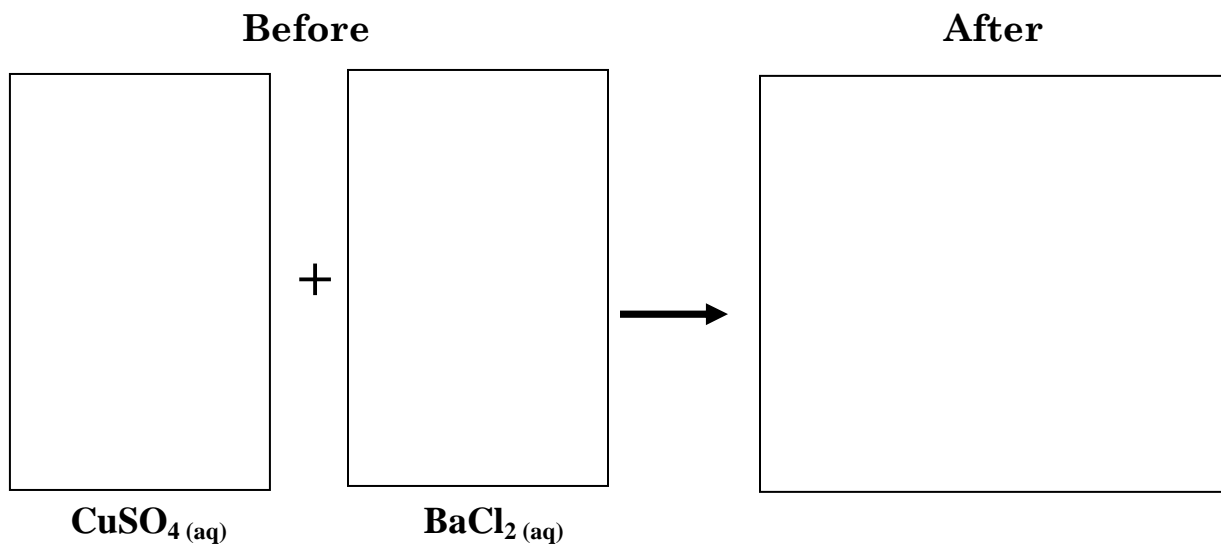


Precipitates Worksheet

1. When an aqueous solution of barium chloride and copper (II) sulfate are combined a white solid forms. In the spaces below do a before and after drawing at the particle level of the reaction



2. On your own words, why does a precipitate form when the solutions above combine?

3. Using the solubility rules developed in class and your knowledge of precipitation reactions predict if the following combinations will yield a precipitate. If it does, write the name and formula for the precipitate.

a. Nickel(II) chloride(aq) + sodium sulfide(aq) →

b. lithium iodide (aq) + silver acetate (aq) →

c. iron (II) nitrate (aq) + copper (II) chloride (aq) →

b. lithium iodide (aq) + silver acetate (aq) →

d. cobalt (II) chlorate (aq) + potassium hydroxide (aq) →

e. ammonium sulfide (aq) + cesium bromide (aq) →

4. For the following reactions, write the complete equation (CE), total ionic equation (TIE) and net ionic equation (NIE)

a. A solution of lead (II) acetate is combined with a solution of potassium carbonate

CE:

TIE:

NIE:

b. A solution of chromium (II) chloride is combined with a solution of sodium hydroxide

CE:

TIE:

NIE:

c. A solution of mercury (I) nitrate is combined with a solution of ammonium iodide

CE:

TIE:

NIE:

d. A solution of sodium phosphate is combined with a solution of calcium chlorate

CE:

TIE:

NIE: