Nar	ne : Date :			
Word Equations Worksheet				
	Write the equations for the following chemical reactions:			
1.	When aqueous beryllium chloride reacts with aqueous silver nitrate, aqueous beryllium nitrate and silver chloride powder are formed.			
2.	When aqueous sodium hydroxide reacts with sulfuric acid, aqueous sodium sulfate and water are formed.			
3.	When solid sodium metal reacts with a solution of iron (II) chloride, iron metal precipitates and aqueous sodium chloride is formed.			
4.	When aqueous calcium hydroxide reacts with sulfuric acid, a precipitate of calcium sulfate and water are formed.			
5.	Iron metal reacts with water to form insoluble $\mathrm{Fe_3O_4}$ and hydrogen gas.			
6.	Aqueous potassium iodide reacts with liquid bromine forming potassium bromide plus iodine.			
7.	Aqueous ammonium carbonate and aqueous magnesium sulfate react to yield aqueous ammonium sulfate and solid magnesium carbonate.			
8.	Nitrogen gas reacts with oxygen gas to form dinitrogen pentoxide gas.			

Name:	Date:	

Word Equations Worksheet

Answers

1. When aqueous beryllium chloride reacts with aqueous silver nitrate, aqueous beryllium nitrate and silver chloride powder are formed.

$$BeCl_2(aq.) + 2 AgNO_3(aq.) \rightarrow Be(NO_3)_2(aq.) + 2 AgCl_2 \downarrow$$

2. When aqueous sodium hydroxide reacts with sulfuric acid, aqueous sodium sulfate and water are formed.

2 NaOH (aq.) +
$$H_2SO_4$$
 (aq.) \rightarrow Na₂SO₄ (aq.) + 2 H_2O (1)

3. When solid sodium metal reacts with a solution of iron (II) chloride, iron metal precipitates and aqueous sodium chloride is formed.

2 Na (s) + FeCl₂ (aq.)
$$\rightarrow$$
 2 NaCl (aq.) + Fe \downarrow

4. When aqueous calcium hydroxide reacts with sulfuric acid, a precipitate of calcium sulfate and water are formed.

$$Ca(OH)$$
, $(aq.) + H_2SO_4$ $(aq.) \rightarrow CaSO_4 \downarrow + 2 H_2O$ (l)

5. Iron metal reacts with water to form insoluble Fe_3O_4 and hydrogen gas.

3 Fe (s) + 4
$$H_2O(1) \rightarrow Fe_3O_4 \downarrow + 4 H_2(g)$$

6. Aqueous potassium iodide reacts with liquid bromine forming potassium bromide plus iodine.

2 KI (aq.) +
$$Br_2(l) \rightarrow 2 KBr (aq.) + I_2(g)$$

7. Aqueous ammonium carbonate and aqueous magnesium sulfate react to yield aqueous ammonium sulfate and solid magnesium carbonate.

$$(NH_4)_2CO_3$$
 (aq.) + MgSO₄ (aq.) \rightarrow $(NH_4)_2SO_4$ (aq.) + MgCO₃ \downarrow

8. Nitrogen gas reacts with oxygen gas to form dinitrogen pentoxide gas.

$$2 N_2(g) + 5 O_2(g) \rightarrow 2 N_2O_5(g)$$