Student Worksheet Predicting Chemical Reactions

For each of the following questions, classify the reaction type (formation, simple decomposition, combustion, single replacement, double replacement, or other), and predict the balanced chemical equation. Provide a word equation as well.

1.
$$Al(s) + O_2(g) \rightarrow$$

2.
$$Ag_2O(s) \rightarrow$$

3.
$$Br_2(1) + KI(aq) \rightarrow$$

4. A strip of zinc metal is placed into a copper(II) nitrate solution.

5.
$$BaCl_2(aq) + Na_2SO_4(aq) \rightarrow$$

6. Sulfuric acid is neutralized by aqueous sodium hydroxide.

7.
$$\rightarrow \text{CuS}(s) + \text{NaCH}_3\text{COO}(aq)$$

8.
$$CuS(s) + O_2(g) \rightarrow$$

9. Propane burns in air.

10.
$$Na_2CO_3(aq) + HCl(aq) \rightarrow NaCl(aq) + CO_2(g) + H_2O(l)$$