

## An Equation/Stoichiometry Activity

Assume 100.0 grams of each reactant and determine how many moles of each product will form. (If there are two reactants you will need to determine which is limiting).

1. zinc is added to hydrochloric acid
2. magnesium reacts with aqueous aluminum chloride
3. aqueous calcium nitrate is added to aqueous sodium sulfate
4. nitric acid is added to aluminum hydroxide
5. nickel(III) chlorate is heated
6. aluminum carbonate is heated
7. nitric acid decomposes

8. gaseous chlorine is bubbled through a solution of sodium iodide

9. plumbic hydroxide decomposes

10. sodium oxide reacts with water

11. diphosphorous pentoxide reacts with water

12. nickel(III) oxide is added to carbon dioxide

13. plumbic oxide reacts with diphosphorus pentoxide

14. sodium phosphate reacts with aqueous magnesium nitrate

15. aluminum reacts with oxygen