

Name: _____

Blk: _____ Date: _____

Chemistry 11 TYPES OF CHEMICAL REACTIONS

THERE ARE SIX MAJOR TYPES OF CHEMICAL REACTIONS OF IMPORTANCE TO CHEMISTRY 11:

Type 1. SYNTHESIS _____

GENERIC EQUATION: $A + B \rightarrow AB$

Examples:

Type 2. DECOMPOSTION _____

GENERIC EQUATION: $AB \rightarrow A + B$

Examples:

Type 3. SINGLE REPLACEMENT _____

**GENERIC EQUATIONS: $M + AB \rightarrow MB + A$
 $N + AB \rightarrow AN + B$**

NOT ALL ELEMENTS CAN "BUMP" THE OTHER OUT OF A CHEMICAL COMPOUND. TO DETERMINE WHETHER OR NOT A BUMPING WILL OCCUR YOU MUST REFERR TO THE FOLLOWING ACTIVITY SERIES:

Examples:

ACTIVITY SERIES	
METALS	NONMETALS
	decreasing activity
lithium	fluorine
potassium	chlorine
calcium	bromine
sodium	iodine
magnesium	
aluminum	
zinc	
chromium	
iron	
nickel	
tin	
lead	
hydrogen	
copper	
silver	
mercury	
platinum	
gold	

Type 4. DOUBLE REPLACEMENT _____
_____.

GENERIC EQUATION: $AB + XY \rightarrow AY + XB$

Examples:

TYPE 5. NEUTRALIZATION (Specialized DOUBLE REPLACEMENT) _____
_____.

GENERIC EQUATION: $HB + AOH \rightarrow AB + H_2O(l)$

Examples:

TYPE 5. COMBUSTION _____
_____.

HYDROCARBON: _____

GENERIC EQUATION: $C_xH_y + O_2 \rightarrow CO_2 + H_2O(g)$

Examples: