

Homework #13
(Chemical reactions)
CHEM 11 (S 2016, LAC)
(Due Thursday, June 2)

Balance the equations below by adding any missing reactants or products and by placing any necessary coefficients in front of any reactant or product. Then identify the type of reaction from the list given in class. If any of the single replacement reactions will not go because of the activities of the reactant, place an X after the reaction type..

I am sure that if you search long enough and smart enough, you can find each of these equations on the Internet. However, that will not help you learn this material, so please resist that temptation.

<u>Balanced Equation</u>	<u>Reaction Type</u>
$\text{Ca(OH)}_2 + \text{H}_3\text{PO}_4 \rightarrow \text{Ca}_3(\text{PO}_4)_2 + \text{H}_2\text{O}$	_____
$\text{C}_5\text{H}_9\text{O} + \text{O}_2 \rightarrow \text{CO}_2 +$	_____
$\text{NH}_3 + \text{H}_2\text{SO}_4 \rightarrow (\text{NH}_4)_2 \text{SO}_4$	_____
$\text{SnCO}_3 \rightarrow$	Decomposition
$\text{Al} + \text{NiBr}_2 \rightarrow$	Single Replacement
$\text{Fe} + \text{MgO} \rightarrow \text{Mg} + \text{Fe}_2\text{O}_3$	_____
$\text{FeS} + \text{HCl} \rightarrow$ (iron(II) chloride is one product)	_____