**Purpose:** Create a brochure or website that answers the **essential questions** listed below. Be sure to review and follow the **criteria** for the website or brochure presentation.

**DUE: Monday 12/21/15**

**[Cite your source here.]**

* ***NOTE: Choose only the product (brochure or website) that you have the resources, skills and time to complete***

***Methods:*** Create a brochure by hand or electronically (Microsoft Word has a template for brochures). Create a website using [www.weebly.com](http://www.weebly.com) (free) or googlesites(free).

**Essential Questions:**

* **Describe each of the following 4 types of reactions** 
  + Synthesis
  + Decomposition
  + Single Replacement
  + Double Replacement
  + (bonus: Combustion)
* **State the Law of Conservation of Mass**
* **Describe the difference between a physical and chemical change. Give an example of each.**
* **Identify the 6 indicators that a chemical reaction has taken place**
* **Identify the two factors that affect the rate of a chemical reaction**
* **Define Activation Energy.**
* **Identify and explain how and why each of the following factors affect the rate of a chemical reaction.**
  + - **Temperature**
    - **Surface Area**
    - **Concentration and Pressure**
    - **Catalyst**

**Website and Brochure Criteria**

* **Title**
* **Pages** organized by theme with tabs or labels.
* Neat, appealing and well-designed.
* Use of **graphics** or illustrations to demonstrate the following:
* **The 4 types of reactions** 
  + Synthesis
  + Decomposition
  + Single Replacement
  + Double Replacement
  + (bonus: Combustion)
* **Illustrate and example of balanced chemical equation (Law of Conservation of Mass)**
* **Diagram or use a graph to illustrate at least 2 of the factors affect the rate of a chemical reaction. (i.e. Temperature, Surface Area, Concentration and Pressure, Catalyst)**