Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Pd: \_\_\_ Ast#: \_\_\_\_\_

**Physical Science Honors**

Science Performance Rating Scale

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
| **Big Idea: MATTER** | | | **Assessed at Complexity Level:**  **2 – BASIC APPLICATION OF SKILLS & CONCEPTS** | | | |
| **Unit: Periodic Table** | | |
| **Benchmark: SC.9.12.P.8.5 – Relate properties of atoms and their position in the periodic table to the arrangement of their electrons.** | | | | | | |
| **MASTERY LEVEL** | | **Performance Indicators** | | **BEFORE INST.** | **DURING INST.** | **AFTER INST.** |
| **4** | **EXCEEDING**  **the Standard** | Apply patterns in the periodic table to make predictions about various elements | |  |  |  |
| Describe how atoms can gain or lose charge by adding or subtracting electrons | |  |  |  |
| **3** | **MASTERY** | **Explain patterns that are present in the organization of the periodic table, such as atomic number, atomic mass, valence electrons, density, physical properties of elements, and chemical properties of elements.** | |  |  |  |
| **Describe the arrangement of electrons within atoms of specific elements (electron configuration)** | |  |  |  |
| **Relate the position of elements in the periodic table to their electron configuration.** | |  |  |  |
| **2** | **PARTIAL MASTERY** | Recognize that elements in the same group of the periodic table share similar properties | |  |  |  |
| Recognize that elements in each period of the periodic table demonstrate a regular, repeated pattern of characteristics | |  |  |  |
| Identify definitions of key terms such as: ELEMENT, ATOMIC NUMBER, ATOMIC MASS (a.m.u.), PERIOD, GROUP, PERIODIC, VALENCE ELECTRON, METAL, METALLOID, NON-METAL, ELECTRON CONFIGURATION, OCTET RULE | |  |  |  |
| **1** | **BUILDING MASTERY** | With help, I can demonstrate partial mastery of some of the simpler tasks listed above, but I still make some mistakes. | |  |  |  |
| **0** | **NOVICE** | I currently have no knowledge or mastery of the skills and tasks listed above, but I will make an effort to learn them. | |  |  |  |