

Name: \_\_\_\_\_

Group: \_\_\_\_\_ Block #: \_\_\_\_\_

Date: \_\_\_\_\_



**Exceed to Succeed**

## Worksheet: Periodic Trends

### 1. ATOMIC RADIUS

For each of the following sets of atoms, rank the atoms from smallest to largest atomic radius.

- Li, C, F
- Li, Na, K
- Ge, P, O
- C, N, Al
- Al, Cl, Ga

### 2. IONIC RADIUS

For each of the following sets of ions, rank them from smallest to largest ionic radius.

- $\text{Mg}^{2+}$ ,  $\text{Si}^{4-}$ ,  $\text{S}^{2-}$
- $\text{Mg}^{2+}$ ,  $\text{Ca}^{2+}$ ,  $\text{Ba}^{2+}$
- $\text{F}^-$ ,  $\text{Cl}^-$ ,  $\text{Br}^-$
- $\text{Ba}^{2+}$ ,  $\text{Cu}^{2+}$ ,  $\text{Zn}^{2+}$
- $\text{Si}^{4+}$ ,  $\text{P}^{3-}$ ,  $\text{O}^{2-}$

### 3. IONIZATION ENERGY

For each of the following sets of atoms, rank them from lowest to highest ionization energy.

- Mg, Si, S
- Mg, Ca, Ba
- F, Cl, Br
- Ba, Cu, Ne
- Si, P, He

### 4. ELECTRONEGATIVITY

For each of the following sets of atoms, rank them from lowest to highest electronegativity.

- Li, C, N
- C, O, Ne
- Si, P, O
- K, Mg, P
- S, F, He