# April 11, 2019

- answers pg 175 #1,2,4,5
- Periodic Table explained

## Answers p. 175 #1, 2, 4, 5

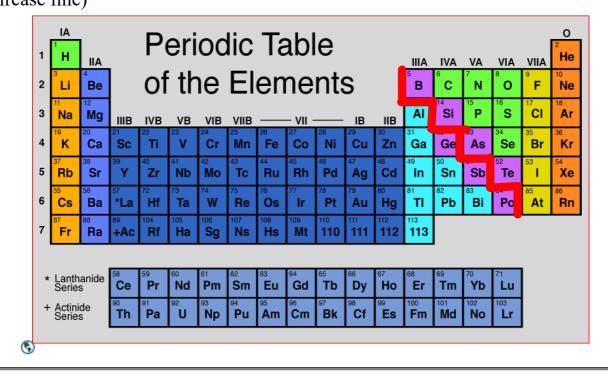
- #1.a) soapy water = mixture because it contains more than one substance
  - b) hydrogen gas = pure substance because it is the name of an element
- c) sodium chloride = pure substance because it is the name of a compound, which contains two elements which are pure.
- #2. a) hydrogen = element
- b) potassium carbonate = compound because it contains more than one kind of element (potassium, carbon and oxygen)
- c) water = compound because it contains more than one kind of element (hydrogen and oxygen)
  - d) Mg = element
- #4. a) gasoline is a clear pink solution = physical property
  - b) gasoline burns in air = chemical property
  - c) water boils at  $100^{\circ}$  C = physical property
- d) electric current can split water into hydrogen and oxygen gases = chemical property
- #5. a) chemical change
  - b) reactants = aluminum metal, hydrobromic acid products = hydrogen gas, aluminum bromide

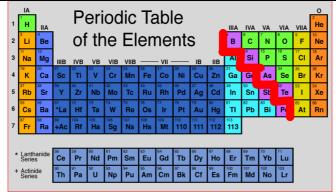
### The Periodic Table of Elements



<u>Periodic table</u> - a structured arrangement of elements that help us explain and predict physical and chemical properties.

<u>Metals</u> are generally located on the left, while the <u>non-metals</u> are located on the right side of the table. (staircase line)





Elements in the same column (down) are called a group. Ex: Li, Na, K, Rb, Cs and Fr are in a group.

Rows on a periodic table (across) are called periods. Ex. Going across from lithium to neon

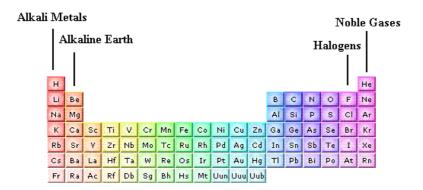
In your textbook periodic table, gases (g) are red, liquids (l) are blue and solids (s) are black.

What state are most elements on the periodic table??

#### Important Groups to know:

Alkali metals (group 1) Alkaline earth metals (group 2)

The *halogens* (group 17) *Noble gases* (group 18)



Group 1 are the most reactive and Group 18 are the least reactive elements on the periodic table.

### Periodic Table Worksheet

S10 answers pg 187 #1-4.doc answers pg 187 #1,2,4.doc