

Chemistry 9/10

p^+ = proton
 e^- = electron
 n^0 = neutron

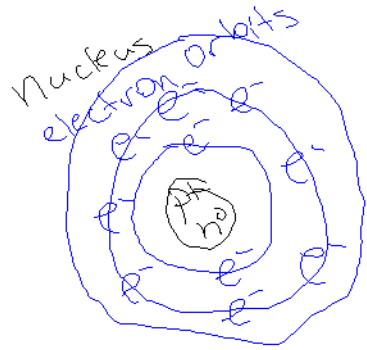
I Atomic Structure

A) 3 parts

- 1) proton (+) > nucleus of a Atom
- 2) neutron (0)
- 3) electrons (-) - outside of nucleus

B) Periodic Table

- 1.) Atomic # = # of p^+
- 2.) Atomic mass = # of p^+ and n^0
- 3.) Symbol = Carbon = C
Nitrogen = N
- 4.) Valence e^- # = e^- in the outer most orbit
w/ = with



1st = $2e^-$
 2nd = $8e^-$
 3rd = $8e^-$ (until chemistry)

C.) Changes

- 1.) Can't change # of p^+
- 2.) change # of e^- = **ion** an atom w/ \neq # of p^+ & e^-

$$+1 + (-1) = 0$$

| | |
|-------------|-----------|
| H | $p^+ = 1$ |
| $e^- = 1$ | |
| ----- | |
| 0 no charge | |
| $e^- - 1$ | |
| ----- | |
| +1 | |

| | | |
|---------------------------|------------|---------|
| Na | $p^+ = 11$ | $11p^+$ |
| $e^- = 11 - 1e^- = 10e^-$ | | |
| ----- | | |
| 0 | | |
| $-1e^-$ | | |
| ----- | | |
| +1 | | |

D) Chemical Bonding

3 types

1) Ionic Bonding = transfer of e^- creating oppositely charged ions

