

Ionic Bonding

SNCIDI

Refresher!

- Atoms form ionic compounds by donating and accepting electrons to reach a full VALENCE SHELL
- Metals tend to lose electrons
 - become POSITIVE IONS
- Non-metals tend to gain electrons
 - become NEGATIVE IONS

Which of the following would form a $1+$ ion?

- A: Ca

- B: Al

- C: Li 

- D: Ne

How many valence electrons does Aluminium have?

- A: 4


- B: 3



- C: 2

- D: 1

Metals tend to _____
electrons, non-metals
tend to _____ electrons

- A: lose; gain 
- B: gain; lose
- C: attract; repel
- D: lose; lose

Oxygen has 6 valence electrons. What will the charge be on oxygen as an ion?

• A: 1-

• B: 2-



• C: 1+

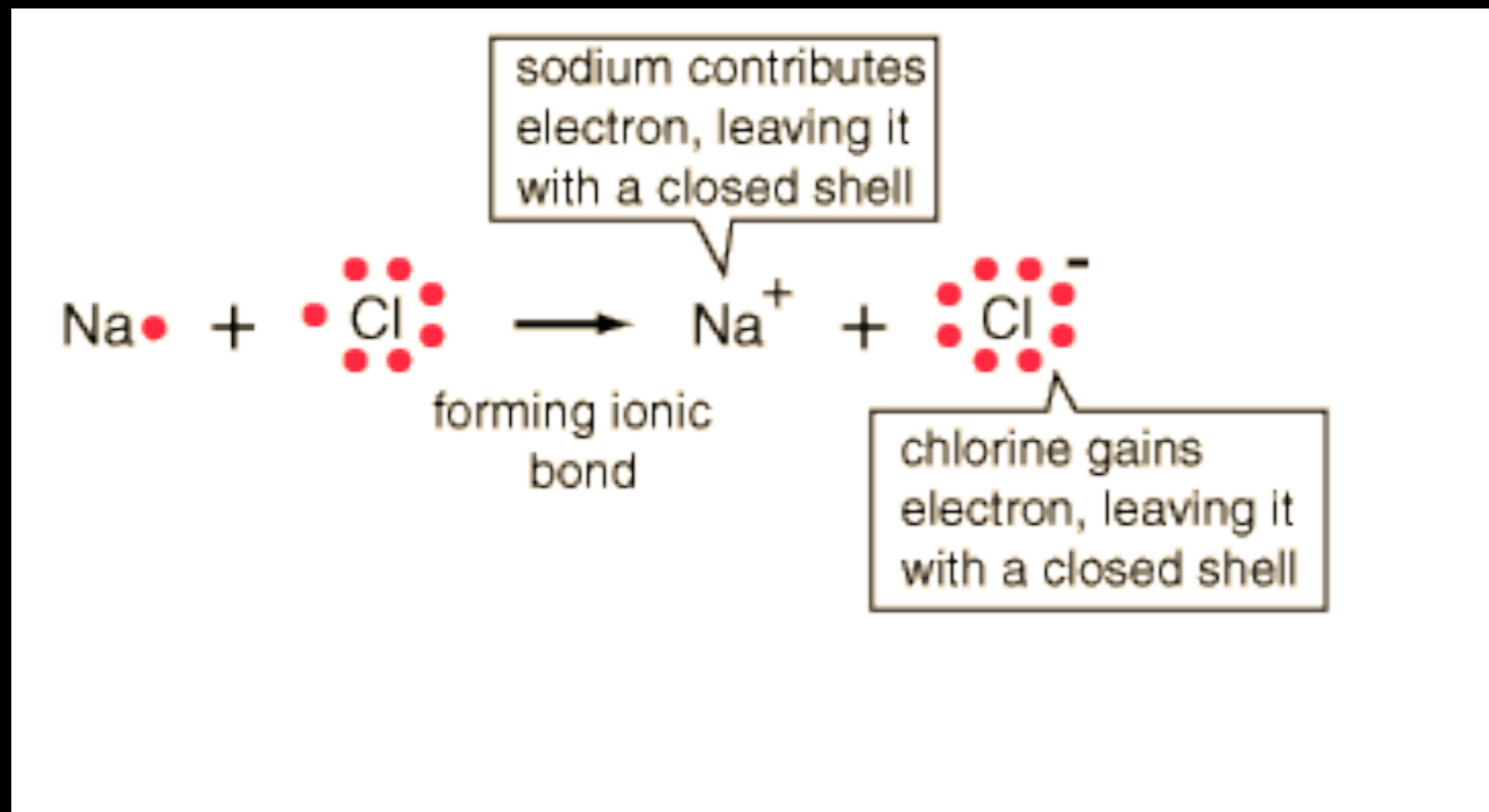
• D: 2+

When an atom of calcium bonds with chlorine, what will the chemical formula be?

- A: CaCl
- B: CaCl₂
- C: ClCa
- D: ClCa₂



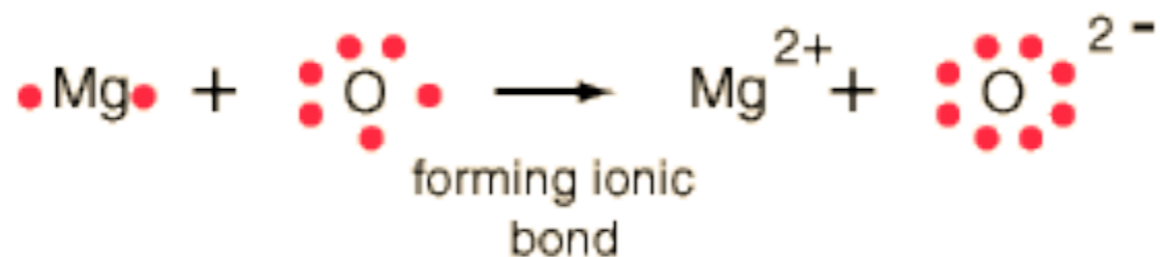
Using Lewis diagrams,
-show the bonding between
sodium & chlorine
-write the formula
-name the compound



NaCl
Sodium chloride

Using Lewis diagrams,
-show the bonding between
magnesium & oxygen
-write the formula
-name the compound

MgO
Magnesium oxide



Using Lewis diagrams,
-show the bonding between
calcium & chlorine
-write the formula
-name the compound

CaCl_2
Calcium chloride



Complete!

-Ionic compounds:

Names & formulas

worksheet

-p.21 in your workbook