

WRITING CHEMICAL FORMULAS

Name: _____

Date: _____

Consider the packets of colour squares that we used to construct molecules:

	+1	+2	+3	???	-1	-2	-3
COLOUR	Light blue	Green	Pink	Mustard	White	Purple	Dark blue
ELEMENTS <i>Or groups of elements that had this identity Or "charge"</i>	Na K	Ca Mg	Al B	Sn Cu Fe	Cl F OH	O S CO ₃	N P PO ₄

On the following page, complete the combinations that would make a neutral molecule.

AFTER you complete the next page, come back and write some rules to follow for combining elements (and groups of elements) in order to make neutral, stable molecules:

- 1.
- 2.
- 3.
- 4.
- 5.
- 6.
- 7.

Complete the combinations below that would make a neutral molecule. The first few are done for you as an example. For some questions, you must use the given name to determine what the combination was.

COMBINATION	ANSWER		CHEMICAL FORMULA	CHEMICAL NAME
+1 with -1	+1	-1		
K with Cl	K	Cl	KCl	Potassium chloride
+3 with -1	+3	-1 -1 -1		
Al with F	Al	F F F	AlF ₃	Aluminum Fluoride
+1 with -2				
Na with O	Na Na	O	Na ₂ O	Sodium oxide
+2 with -1				
Mg with Cl				Magnesium chloride
+3 with -3				
				Aluminum nitride
+2 with -2				
				Copper carbonate
+2 with -3				
				Calcium nitride
+3 with -2				
				Boron oxide

Make as many more combinations of elements you can, using the table on the first page or using different elements from the periodic table: