

Ionic Compounds

	Cl⁻	CO₃²⁻	OH⁻	SO₄²⁻	PO₄³⁻	NO₃⁻
Na⁺						
NH₄⁺						
K⁺						
Ca²⁺						
Mg²⁺						
Zn²⁺						
Fe³⁺						
Al³⁺						
Co²⁺						
Fe²⁺						
H⁺						

Writing Chemical formulas for ionic compounds

Coefficient	+ Charge		Coefficient	- Charge	
1	+2	+	2	-1	= 0
	+1	+		-2	= 0
	+4	+		-1	= 0
	+3	+		-2	= 0
	+2	+		-3	= 0
	+3	+		-1	= 0
	+1	+		-4	= 0
	+1	+		-1	= 0
	+4	+		-3	= 0
	+2	+		-2	= 0

The coefficient is the number you would need to multiply by to balance the charges. The first one is done for you. 1(+2) balances 2(-1).

Coefficient	Cation		Coefficient	Anion		Chemical Formula
1	Mg^{2+}	+	2	Cl^{-}	= 0	$MgCl_2$
	Na^{+}	+		Cl^{-}	= 0	
	Pb^{4+}	+		S^{2-}	= 0	
	Al^{3+}	+		O^{2-}	= 0	
	Ca^{2+}	+		P^{3-}	= 0	
	NH_4^{+}	+		S^{2-}	= 0	
	Fe^{2+}	+		SO_4^{2-}	= 0	
	Fe^{3+}	+		SO_4^{2-}	= 0	
	Li^{+}	+		SO_4^{2-}	= 0	
	Ba^{2+}	+		NO_3^{-}	= 0	