

List of Common Ions

Monatomic Cations		
1+	H ⁺	hydrogen
	Li ⁺	lithium
	Na ⁺	sodium
	K ⁺	potassium
	Rb ⁺	rubidium
	Cs ⁺	cesium
	Ag ⁺	silver
2+	Mg ²⁺	magnesium
	Ca ²⁺	calcium
	Sr ²⁺	strontium
	Ba ²⁺	barium
	Zn ²⁺	zinc
	Cd ²⁺	cadmium
3+	Al ³⁺	aluminum
	Bi ³⁺	bismuth
Monatomic Anions		
1-	H ⁻	hydride
	F ⁻	fluoride
	Cl ⁻	chloride
	Br ⁻	bromide
	I ⁻	iodide
2-	O ²⁻	oxide
	S ²⁻	sulfide
3-	N ³⁻	nitride
	P ³⁻	phosphide
4-	C ⁴⁻ (C ₂ ²⁻)	carbide

Polyatomic Cations	
NH ₄ ⁺	ammonium
H ₃ O ⁺	hydronium
Polyatomic Anions	
OH ⁻	hydroxide
CN ⁻	cyanide
O ₂ ²⁻	peroxide
CO ₃ ²⁻	carbonate
C ₂ O ₄ ²⁻	oxalate
NO ₂ ⁻	nitrite
NO ₃ ⁻	nitrate
PO ₃ ³⁻	phosphite
PO ₄ ³⁻	phosphate
SO ₃ ²⁻	sulfite
SO ₄ ²⁻	sulfate
S ₂ O ₃ ²⁻	thiosulfate
ClO ⁻	hypochlorite
ClO ₂ ⁻	chlorite
ClO ₃ ⁻	chlorate
ClO ₄ ⁻	perchlorate
CH ₃ COO ⁻ or C ₂ H ₃ O ₂ ⁻	acetate
AsO ₄ ³⁻	arsenate
BO ₃ ³⁻	borate
SiO ₃ ²⁻	silicate
MnO ₄ ⁻	permanganate
CrO ₄ ²⁻	chromate
Cr ₂ O ₇ ²⁻	dichromate
CHO ₂ ⁻	formate
HCO ₃ ⁻	hydrogen carbonate or bicarbonate
HSO ₃ ⁻	hydrogen sulfite or bisulfite
HSO ₄ ⁻	hydrogen sulfate or bisulfate
HPO ₄ ²⁻	hydrogen phosphate
H ₂ PO ₄ ⁻	dihydrogen phosphate

Some Common Ions

IA	IIA											III A	IV A	V A	VIA	VII A	VIII A
H ⁺												H ⁻					
Li ⁺												N ³⁻	O ²⁻	F ⁻			
Na ⁺	Mg ²⁺											Al ³⁺		P ³⁻	S ²⁻	Cl ⁻	
K ⁺	Ca ²⁺				Cr ²⁺ Cr ³⁺	Mn ²⁺ Mn ³⁺	Fe ²⁺ Fe ³⁺	Co ²⁺ Co ³⁺		Cu ¹⁺ Cu ²⁺	Zn ²⁺	Ga ³⁺				Br ⁻	
Rb ⁺	Sr ²⁺									Ag ⁺	Cd ²⁺	In ³⁺	Sn ²⁺ Sn ⁴⁺			I ⁻	
Cs ⁺	Ba ²⁺											Hg ₂ ²⁺ Hg ²⁺	Pb ²⁺ Pb ⁴⁺				

Metals with more than one ion

Element	Ion	Stock system	Classical (ous, ic) System
Chromium	Cr ²⁺	chromium(II)	chromous
	Cr ³⁺	chromium(III)	chromic
Cobalt	Co ²⁺	cobalt(II)	cobaltous
	Co ³⁺	cobalt(III)	cobaltic
Copper	Cu ⁺	copper(I)	cuprous
	Cu ²⁺	copper(II)	cupric
Iron	Fe ²⁺	iron(II)	ferrous
	Fe ³⁺	iron(III)	ferric
Lead	Pb ²⁺	lead(II)	plumbous
	Pb ⁴⁺	lead(IV)	plumbic
Manganese	Mn ²⁺	manganese(II)	manganous
	Mn ³⁺	manganese(III)	manganic
	Mn ⁴⁺	manganese(IV)	-
Mercury	Hg ₂ ²⁺	mercury(I)	mercurous
	Hg ²⁺	mercury(II)	mercuric
Tin	Sn ²⁺	tin(II)	stannous
	Sn ⁴⁺	tin(IV)	stannic