Li^+	F^-
Li^+	F^-
Na^+	Cl^-
K^+	Br^-
K^+	Br^-
NH_4^+	I^-
H^+	HCO_3^-
H^+	OH^-
H^+	OH^-
H^+	OH^-
Ag^+	CH_3COO^-
Ag^+	CH_3COO^-
Cu^+	NO_3^-
Rb^+	SCN^-
Rb^+	SCN^-
Cs^+	CN^-

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Na^+	Cl^-
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NH_4^+	I^-
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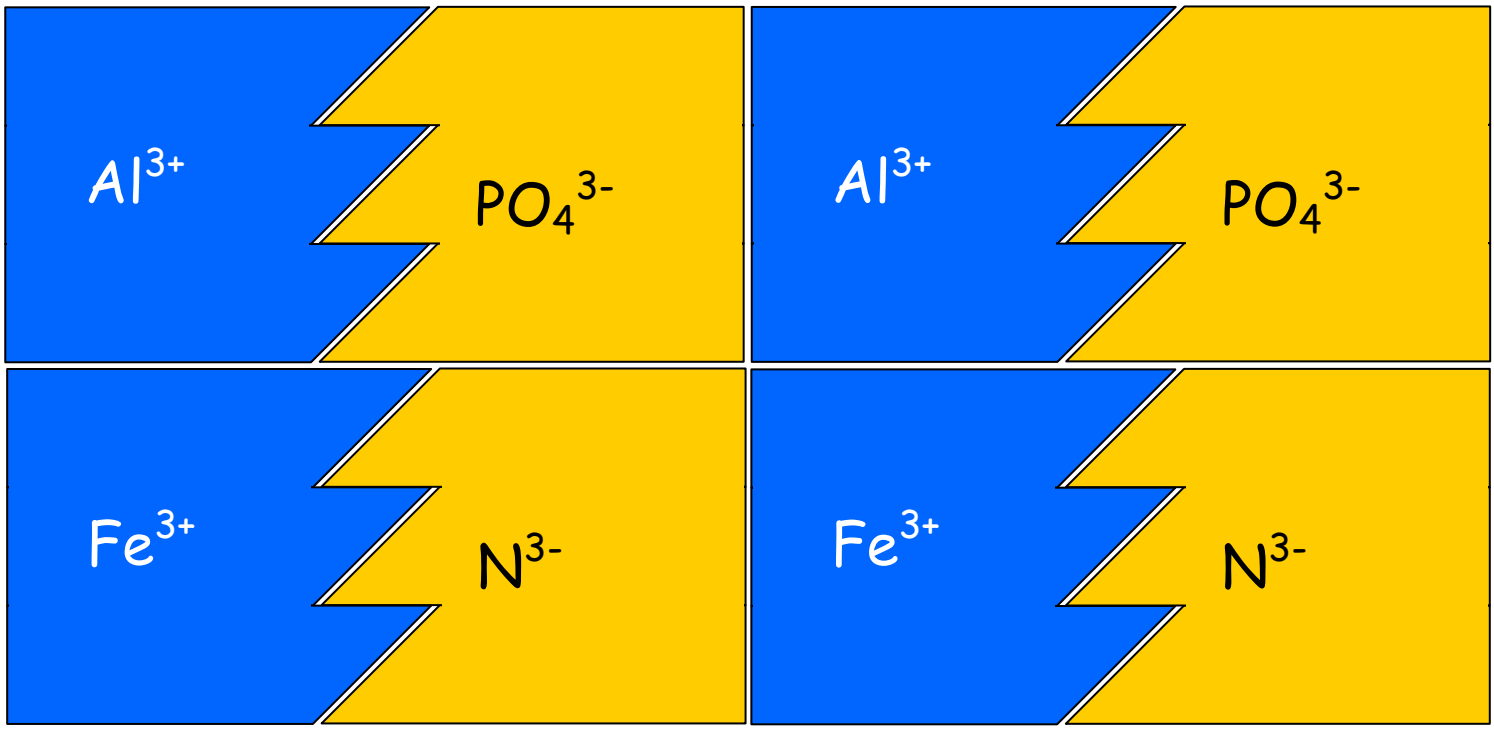
H^+	OH^-
Ag^+	CH_3COO^-
Cu^+	NO_3^-
Cu^+	NO_3^-
Rb^+	SCN^-
Cs^+	CN^-
Cs^+	CN^-

Ca^{2+}	SO_4^{2-}
Ca^{2+}	SO_4^{2-}
Ca^{2+}	SO_4^{2-}
Ca^{2+}	SO_4^{2-}
Zn^{2+}	O^{2-}
Zn^{2+}	O^{2-}
Zn^{2+}	O^{2-}
Zn^{2+}	O^{2-}
Cu^{2+}	O^{2-}
Cu^{2+}	O^{2-}
Mn^{2+}	CO_3^{2-}
Mn^{2+}	CO_3^{2-}
Mg^{2+}	CO_3^{2-}
Mg^{2+}	S^{2-}
Pb^{2+}	S^{2-}
Pb^{2+}	S^{2-}
Fe^{2+}	SO_4^{2-}
Fe^{2+}	SO_4^{2-}



Making Ionic Compounds – Using the Ionic jigsaw

Please look after your jigsaw. Try to keep the pieces together in one place on your bench and not mixed up with other sets.

A Tasks

Arrange your jigsaw into three groups: Metals, Non-metals and Electrons.
Make a list of the ions in each of the Metals and Non-metals groups for your notes.
Find a sodium ion, a calcium ion and an iron (III) ion in your jigsaw.
Describe how you would make each of these ions into an atom again.
Find a bromide ion, a nitrate ion and an oxide ion.
Describe how you would make each of these ions into an atom again.

B Tasks

Use the jigsaw to **make** sodium chloride (this is the common salt used in cooking).
The chemical formula for sodium chloride is NaCl. This is because one sodium ion fits onto one chloride ion with no gaps left. Make a **note** of the name and formula of sodium chloride.
Make and **note** the name and formula for potassium chloride, sodium iodide and potassium fluoride.
Make and **note** the name and formula for calcium oxide, lead oxide, calcium fluoride and magnesium chloride. (Check with your teacher if you are not sure how to write these down.)

C Tasks

Make and **note** the name and formula for zinc carbonate.
Make a **note** of the THREE different atoms that go to make up zinc carbonate.
Make and **note** the name and formula lead sulphate, iron (II) sulphate, magnesium nitrate and potassium nitrate.
For each of the four compounds you made in 3 make a **note** of the different atoms that make them up.

D Tasks

Make and **note** the name and formula for aluminium oxide, iron (III) oxide and aluminium sulphate.
Make and **note** the name and formula for some of your own chemical compounds.