

## Naming binary compounds

Most compounds are named systematically but there is one non-systematic one in the table. Before you answer the puzzles below fill in the table of compounds using:

aluminium iodide	water	iron sulfide	magnesium oxide
<b>Name</b>		<b>Elements in the compound</b>	
sodium chloride		sodium and chlorine	
		magnesium and oxygen	
		iron and sulfur	
		aluminium and iodine	
calcium carbide		calcium and carbon	
lithium fluoride		lithium and fluorine	
aluminium nitride		aluminium and nitrogen	
		hydrogen and oxygen	

### Gridlock 1

Each row, column and 2 x 2 box contains information about the first four compounds listed above. Use your problem solving skills and the answers in the table above to fill in the blank boxes.

compound		made up of the elements	
magnesium oxide			
		aluminium and iodine	
		sodium chloride	
	iron and sulfur		
made up of the elements		compound	

# gridlocks – can you unlock the grid?

## Gridlock 2

Each row, column and 2 x 2 box contains information about each of the last four compounds in the table.

compound		made up of the elements	
	calcium carbide		hydrogen and oxygen
			calcium and carbon
lithium and fluorine			aluminium nitride
made up of the elements		compound	

## Gridlock 3

You will need to identify which four compounds are in this puzzle.

compound		made up of the elements	
water			sodium and chlorine
			lithium fluoride
iron and sulfur			
made up of the elements		compound	

## Naming binary compounds – answers

Most compounds are named systematically but there is one non-systematic one in the table. Before you answer the puzzles below fill in the table of compounds using:

aluminium iodide	water	iron sulfide	magnesium oxide
<b>Name</b>	<b>Elements in the compound</b>		
sodium chloride	sodium and chlorine		
magnesium oxide	magnesium and oxygen		
iron sulfide	iron and sulfur		
aluminium iodide	aluminium and iodine		
calcium carbide	calcium and carbon		
lithium fluoride	lithium and fluorine		
aluminium nitride	aluminium and nitrogen		
water	hydrogen and oxygen		

## Puzzle 1 – answers

Each row, column and 2 x 2 box contains information about the first four compounds listed above. Use your problem solving skills and the answers in the table above to fill in the blank boxes.

compound		made up of the elements	
magnesium oxide	aluminium iodide	iron and sulfur	sodium and chlorine
iron sulfide	sodium chloride	aluminium and iodine	magnesium and oxygen
aluminium and iodine	magnesium and oxygen	sodium chloride	iron sulfide
sodium and chlorine	iron and sulfur	magnesium oxide	aluminium iodide
made up of the elements		compound	

# gridlocks – can you unlock the grid?

## Puzzle 2 – answers

Each row, column and 2 x 2 box contains information about each of the last four compounds in the table.

compound		made up of the elements	
aluminium nitride	calcium carbide	lithium and fluorine	hydrogen and oxygen
water	lithium fluoride	aluminium and nitrogen	calcium and carbon
calcium and carbon	aluminium and nitrogen	water	lithium fluoride
lithium and fluorine	hydrogen and oxygen	calcium carbide	aluminium nitride
made up of the elements		compound	

## Puzzle 3 – answers

You will need to identify which four compounds are in this puzzle.

compound		made up of the elements	
water	iron sulfide	lithium and fluorine	sodium and chlorine
lithium fluoride	sodium chloride	hydrogen and oxygen	iron and sulfur
sodium and chlorine	hydrogen and oxygen	iron sulfide	lithium fluoride
iron and sulfur	lithium and fluorine	sodium chloride	water
made up of the elements		compound	