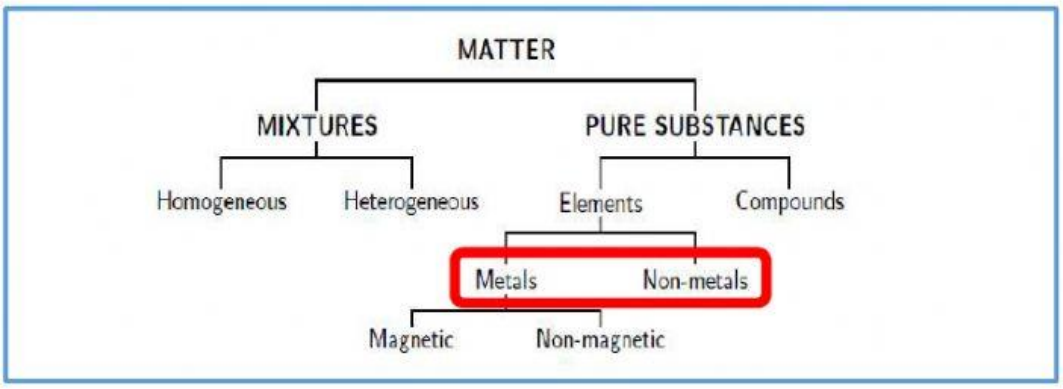
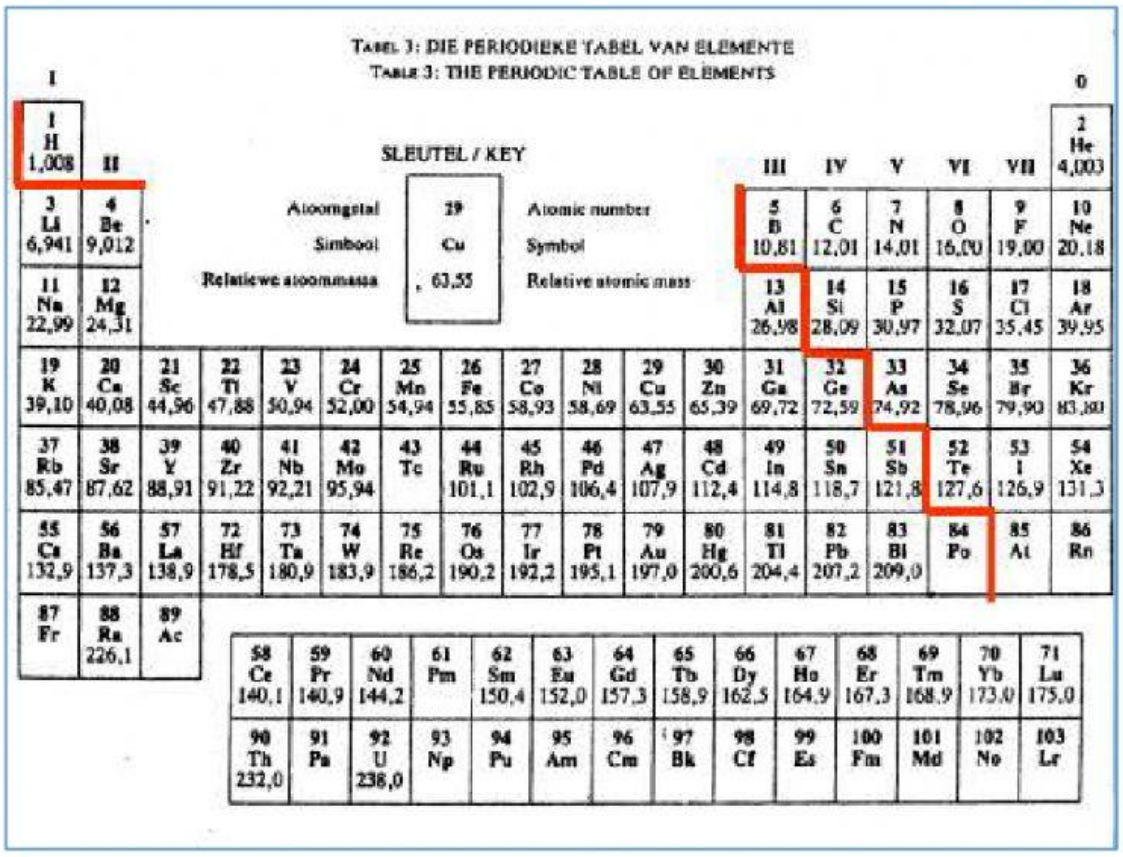
MATTER AND MATERIALS – Worksheet 2



Label the Periodic Table below to show which part contains Metals and which part contains Non-metals:



Properties of Metals and Non-metals:

Drag each of the properties below into the relevant column.

Don't have lustre (dull)	Conduct heat
Low boiling point	Not ductile
Good electrical insulators	Brittle
Have lustre (shiny)	Ductile
Poor thermal conductors	Conduct electricity
High melting point	Malleable

METALS	NON-METALS

Which properties of metal make it useful for:

a) **electrical wires** (there may be more than one correct answer)

Dull	Conduct heat
Low boiling point	Not ductile
Good electrical insulators	Brittle
Shiny	Ductile
Poor thermal conductors	Conduct electricity
High melting point	Malleable

b) **cooking pots and utensils**

Dull	Conduct heat
Low boiling point	Not ductile
Good electrical insulators	Brittle
Shiny	Ductile
Poor thermal conductors	Conduct electricity
High melting point	Malleable

c) **jewellery**

Dull	Conduct heat
Low boiling point	Not ductile
Good electrical insulators	Brittle
Shiny	Ductile
Poor thermal conductors	Conduct electricity
High melting point	Malleable

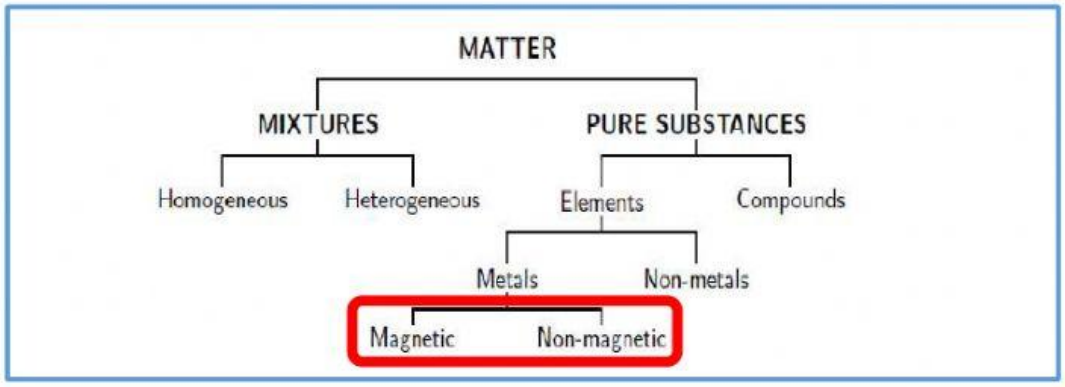
Semi-metals or metalloids are substances that have both metal and non-metal properties. The symbols of the metalloids on the periodic table are:

B, , , , , , , ,

Metalloids are semi-conductors, but unlike with metals, their conductivity as their temperature .

Elements can also be classified into 3 groups according to their **conductivity**. Draw lines to link the correct items in the table below:

Conductors	Non-metals
Semi-conductors	Metals
Insulators	Semi-metals / Metalloids



is one of the phenomena by which materials exert attractive or repulsive forces on other materials.

Examples of ferromagnetic elements (naturally attracted to magnets and can easily be made into a magnet):