

gas  
no definite  
shape  
or volume

all matter  
can change  
from one phase  
to another

Depends on  
Temperature  
and pressure

Elements defined by  
number of protons

Same as  
atomic number

can have more  
or fewer neutrons  
called Isotopes

Can have  
more or fewer  
electrons  
called Ions

Ninety elements  
occur naturally  
Each has  
characteristic  
chemical properties  
physical properties  
Chemical properties  
describe how  
element reacts  
with other elements

Physical properties  
can be measured  
do not change  
the element

Examples include  
density  
boiling point  
freezing point  
malleability  
electrical  
heat conduction

Listed in  
the Periodic Table

Columns called Groups  
have similar  
physical and chemical  
properties

Rows called Periods  
increasing electrons  
increasing protons  
left to right

displays much other  
information

allows prediction  
likely reactions  
likely properties

Two or more  
elements together  
a compound

different properties  
from individual  
elements