

## KINETIC PARTICLE THEORY

This theory states that matter is made up of particles in continuous motion. The motion could be vibrational, translational or rotational. Matter is made up of atoms, ions, and molecules.

Atom = smallest part of an element that can take part in a chemical reaction.

Chemical reaction is when an atom, loses, shares or shares valence electrons.

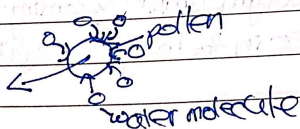
Ion is an atom or a group of atoms with a charge.

Molecule: A particle having two or more atoms joined by a covalent bond.

KPT is supported by natural phenomena such as diffusion, osmosis, and Brownian motion.

Brownian motion = provides evidence for kinetic particle theory. Example: zigzag motion of pollen grain in still water.

Bombardment of molecules on the pollen grain causing it to move in the direction of the arrow.



Brownian motion is the bombardment of large molecules by smaller molecules.