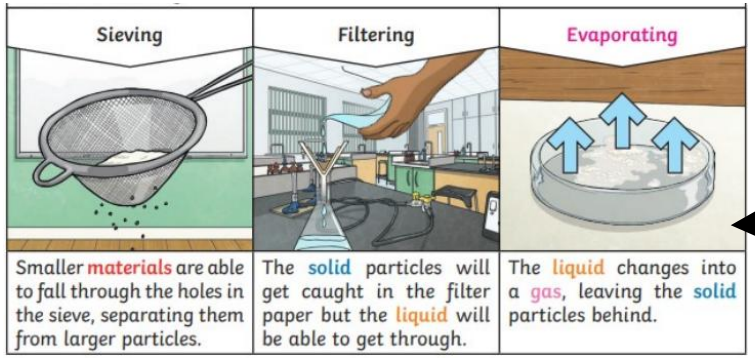
Lent Term 2 – Year 5 - Science

Reversible and Irreversible Changes

Three states of matter

GAS: particles far apart and randomly arranged / move around
LIQUID: particles close but randomly arranged / move around
SOLID: particles very close together / vibrate around a fixed position

Examples	Examples	Examples
Steam (water vapour) Hydrogen Carbon Dioxide Oxygen	Water Milk Washing up liquid Juice	Ice Wood Glass Diamond



Reversible changes, such as mixing and dissolving solids and liquids together, can be reversed by: sieving, filtering and evaporating.

Key Words

Reversible Change – when a material changes form but can easily be changed back to its original state. For example: ice can change to water and then it can be changed back to ice.

Irreversible Change – is when a material is changed permanently and a new material is made. For example: Burning wood creates ash and smoke. Ash and smoke can not be changed back into wood.

Dissolving – when a solid breaks down into tiny, invisible pieces and spreads out in a liquid.

Solutions – the clear liquids you get after dissolving.

Filtering – a method of separating an insoluble solid from a liquid.

Evaporating – when a liquid turns into a gas or vapour. It can then return to its original liquid state.