

## *Year 7 Chemical Sciences Student Outline*

### Properties of Substances

- List the states of matter and identify the characteristics of each.
- Define Physical and Chemical properties.
- Define the Particle Model.
- Explain changes of state, using water as an example.

### Pure Substances and Mixtures

- Recognise the differences between pure substances and mixtures and identify examples of each.
- Understand the difference between soluble and insoluble substances.
- Identify the solvent and solute in solutions.
- List some factors that impact on solubility.

### Separation Techniques

- For each of the following separation techniques, be able to draw a diagram showing the technique, explain what it separates and give examples.
  - Filtration
  - Magnetic Separation
  - Sieving
  - Decanting
  - Chromatography
  - Centrifuging
  - Evaporation
  - Distillation

## *Year 7 Chemical Sciences Student Outline*

### Properties of Substances

- List the states of matter and identify the characteristics of each.
- Define Physical and Chemical properties.
- Define the Particle Model.
- Explain changes of state, using water as an example.

### Pure Substances and Mixtures

- Recognise the differences between pure substances and mixtures and identify examples of each.
- Understand the difference between soluble and insoluble substances.
- Identify the solvent and solute in solutions.
- List some factors that impact on solubility.

### Separation Techniques

- For each of the following separation techniques, be able to draw a diagram showing the technique, explain what it separates and give examples.
  - Filtration
  - Magnetic Separation
  - Sieving
  - Decanting
  - Chromatography
  - Centrifuging
  - Evaporation
  - Distillation