

Islip Manor High School

Scheme of Learning Overview



This scheme of learning has been designed to ensure that you make progress, develop, and master key knowledge, skills, and ideas through academically rich content that reflects, values, and celebrates the diverse experiences, identities, and contributions of our school community.

Year group: 8	Term: Autumn	Unit duration: 3 weeks	Number of lessons: 5		Unit title: The Periodic Table
Unit assessment: End of topic test				Fertile question: Why does some "metal" explode in water while others are used for jewellery?	
Key skills/ concepts/ prior knowledge that students should have when starting this unit:				Start RAG	End RAG
- Elements are made of one type of atom. - Chemical symbols are used to represent elements. - The difference between a physical and chemical change. - Atoms are the building blocks of all matter. - Basic properties of metals (shiny, conductive).					
Key skills/concepts/knowledge that students should cover				Start RAG	End RAG
Mendeleev: Describe how the Periodic Table was first developed. Groups and Periods: Identify the difference between columns and rows. Metals vs. Non-Metals: Locate them on the table and compare their physical properties. Group 1 (Alkali Metals): Describe the physical properties and the trend in reactivity. Group 1 Reactions: State the products when Group 1 metals react with water. Group 7 (Halogens): Describe the properties and the trend in reactivity (decreasing down). Displacement Reactions: Predict if a displacement reaction will occur between halogens. Group 0 (Noble Gases): Explain why these elements are unreactive (inert). Patterns: Use the table to predict properties of "missing" or unknown elements. State at Room Temp: Identify which elements are solids, liquids, or gases at 25°C.					
Stretch. Key skills/concepts/knowledge that students should cover					
Link the position of an element in the table to its electronic structure (shells).					

Literacy. Key vocabulary/subject terminology that students should cover

Periodic Table, Group, Period, Alkali Metals, Halogens, Noble Gases, Metalloid, Trend, Reactivity, Density.

Suggested materials teachers could/should use:

Ks3 Activate 2

Key home learning tasks students should complete:

Home learning booklet

