Fareham Academy Science Overview – Year 10 Physics

Fareham Academy | Unlocking Potential Creating Opportunity

	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
Topic(s)	Topic 4.1: Energy Topic 4.2: Electricity	Topic 4.3: Particle Model Topic 4.4: Radioactivity	Topic 1: Revision	Forces and Motion	Forces in Fluids	Topic 4.5: Forces Overview
Topic Objectives	Establish the fundamental ideas in the topic of energy and apply these to new situations. Analyse the real-world applications of electrical circuits.	Explain the properties of matter using the particle model. Link matter to energy. Evaluate the variety and uses of different types of nuclear radiation.	Establish techniques that will help individuals recall key information and apply this to new situations.	Analyse the forces that act on objects in different scenarios. Evaluate how forces change the movement of objects.	Establish properties of forces in gases and liquids. Examine scenarios related to forces acting on objects in fluids.	Explore complicated situations and establish how they relate to the forces topic.
Acquired Knowledge/Skills	Effective use of equation triangles and substitution of calculated values. Evaluation of different resources.	Equations that help explain the properties of materials around us. Types of nuclear radiation. Evaluate the uses of different types of nuclear radiation.	Revision techniques and individualised revision opportunities by topic.	The interaction of forces can explain the movement of all macroscopic objects. Linking forces to motion. Representation of motion in graphical form.	Analysis of graphical data. Use of equations to solve calculation questions.	Simplification and abstraction of problems. Multi-step equation practice.
Assessments	P4.1 topic test: Energy P4.2 topic test: Electricity	P4.3 topic test: Particle Model P4.4 topic test: Radioactivity	P1 topic test: Mock Exam	Interleaved assessments of forces and P1 topic test	Interleaved assessments of forces and P1 topic test	P4.5 topic Test: Forces