Science GCSE – Physics Curriculum Journey

Ashby School
Empowered to Learn

Y10

Energy
What are the stores of energy and how is energy conserved? How is energy transferred from one store to another? What are current and future energy resources?

Topic Test

Electricity
What components are used to build test circuits? What are potential difference, current and resistance and how does ohms law link them?

Topic Test

Particles
How are particles arranged in solids, liquids and gasses? How does total internal energy change with change of state? How is density calculated?

Topic Test

Y11

Magnetism
What is a magnetic field and how can they be induced?
Space (triple only)
What are the features of the solar system. What is the life cycle of a star?

End of topic test

Radioactivity
What are the different forms of radioactivity and how does decay occur
What are the dangers of radioactivity?
How is half-life calculated?

Waves
What are the function and properties of waves?
What are electromagnetic waves and their properties?
What are the dangers of electromagnetic waves?

Physics Mock Paper 1

Forces and motion
What is a force and how are they measured?
How can motion be described along a line.
What are Newton's 3 laws of motion and how can they be calculated?

Physics Mock Paper 2

Revision Program

GCSE exams

Sequenced and mapped out to provide a coherent flow

Spiraled to build on previous learning

All topics are based on these 'Big Ideas' from Key Stage 3:

Forces
Electromagnets
Waves
Energy