Science: Y9 Long Term Plan

	Topic	Themes	Knowledge
Autumn 1	Physics	Waves	Waves on water and ropes A wave model of sound The human ear and detection of sound Ultrasound
	Chemistry	Changing rocks	Chemical weathering Physical weathering and erosion The Rock cycle
Autumn 2	Biology	Reproduction	Sexual reproduction in humans Contraception Heredity and the genome
	Chemistry	Energy and chemical reactions	Combustion and the conservation of energy Exothermic reactions Endothermic reactions Particle model to explain energy changes
Spring 1	Physics	Electric circuits	Resistance Effect of wire on resistance Relationship between resistance current and voltage Current distribution and parallel circuits Effect of components on current Parallel Circuits and potential difference Voltmeters Batteries
Spring 2	Biology	Health and Disease	Microorganisms and pathogens Pathogens and disease Types of pathogen How pathogens cause illness Uses of microorganisms
	Physics	Floating and sinking	Mass, volume and density Pressure in fluids and floating objects

Science: Y9 Long Term Plan

			Heating effects on gases Convection in fluids and energy transfer
Summer 1	Chemistry	Periodic table	Atomic model Physical properties of elements Trends in physical proeprties Trends in physical properties Chemical and physical properties of elements in the periodic table Grouping elements Atomic number and the periodic table
	Biology	Biodiversity, conservation and human Impact	Biodiversity Endangered and extinct species Negative human impact on biodiversity Positive human impact on biodiversity
Summer 2	Physics	Magnets and electromagnets	Magnetic materials Magnetic poles and the magnetic force Compasses and the Earth Current and magnetism Solenoids Electromagnets Controlling the strength of an electromagnet
	Biology	Explaining evolution	Fossil evidence Heritable variation Intra-species competition Natural selection and evolution