

	Autumn Term		Spring Term		Summer Term	
	HT1	HT2	HT3	HT4	HT5	HT6
Year 8	Topic: Introduction - Scientific questioning - Lab equipment - Health and safety - Data and errors - Variables - Method writing - Recording results - Analysing results - Peer review Baseline Testing Topic: Forces and motion - Balanced and unbalanced forces - Non-contact forces - Pressure in fluids - Density	Topic: Atoms, elements - States of matter - Changes of state - Atomic model - Atoms, elements and compounds - Conservation of mass - Pure and impure substances - Mixtures - Separation techniques Topic: Interdependence and interactions - Food chains / webs - Pollination Topic: Space physics - Gravity - Stars - Seasons / Days / Years	Topic: Materials cycling and energy - Photosynthesis - Aerobic respiration - Anaerobic respiration Topic: Chemical reactions - Chemical reactions - Physical and chemical changes - Combustion - Oxidation - Neutralisation - Exothermic and endothermic	Topic: Waves - Transverse and longitudinal - Energy and waves - Structure of a wave - Sound waves - Light waves - Lenses and prisms Topic: Genetic and evolution - Inheritance - Variation - Natural selection - Biodiversity Topic: Periodic table - Structure (groups and periods) - Mendeleev - Metals and non-metals	Topic: Energy - Energy in food - Fuel bills - Energy resources - Energy transfers - Conservation of energy Topic: Structure and function of living organisms - Cells - Microscopy - Skeletal system - Muscular systems - Healthy diet - Digestive system - Respiratory system - Reproduction - Drugs	Topic: Earth and atmosphere - Earth structure - Rock cycle - Carbon cycle - Atmosphere composition - Human impact and climate change Topic: Electricity and magnetism - Current - Potential difference - Resistance - Static electricity - Magnets - Magnetic fields - Earth's magnetism - Electromagnets
	Year 8 Learners have 1 IXL timetabled lesson per week					

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Year 9	Baseline Testing Topic: Biology – The Human Body - Animal cells - Specialised cells - Tissues - Organs - Circulatory system - Digestive system - Respiration - Diet and lifestyle - Exercise - Pathogens - White blood cells - Vaccinations - Drugs - Nervous system - Reflexes - Hormones and glands - Menstrual cycle - Fertility	Topic: Chemistry – Elements, Mixtures and Compounds - Atoms, elements and compounds - Metals and non-metals - Periodic table - Naming compounds - Word equations - States of matter - Changes of state - Melting and boiling points - Diamond and graphite - Separating mixtures - Paper chromatography - Reactivity series - Extracting metals - Recycling metals - Alloys - Polymers	Topic: Physics – Energy, Forces and Structure of Matter - Energy stores - Energy transfers - Efficiency - Reducing energy waste - Thermal insulation - Energy resources - Contact and non-contact forces - Work done - Friction - Speed - Stopping distances - Reaction times - Nuclear radiation	Topic: Biology – Environment, Evolution and Inheritance - Photosynthesis - Adaptations - Food chains / webs - Interdependence - Carbon cycle - Competition - Living and non-living environmental changes - Pollution - Evolution - Natural selection - Selective breeding - Sexual and asexual reproduction - DNA and chromosomes - Genetic engineering	Topic: Chemistry In Our World - Metals and acids - Hydrogen test - Acids and alkalis - Acids and carbonates - Crystallisation of salts - Exothermic and endothermic - Factors affecting rates of reaction - Earth's atmosphere - Crude oil - Fractional distillation - Complete and incomplete combustion - Greenhouse gases - Climate change - Water treatment	Topic: Physics – Electricity, Magnetism and Waves - Current - Voltage - Resistance - Complete circuits - ACDC - Plugs - Fuses - Power ratings - Magnetism - Magnetic fields - Electromagnets - Transverse and longitudinal waves - Structure of a wave - Wave speed - EM spectrum - EM wave uses
	Year 9 learners have 1 IXL timetabled lesson per week					
Year 10 Entry Level	Baseline Testing Topic: Biology – The Human Body				Topic: Chemistry In Our World	

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	- Animal cells - Specialised cells - Tissues - Organs - Circulatory system - Digestive system - Respiration - Diet and lifestyle - Exercise - Pathogens - White blood cells - Vaccinations - Drugs - Nervous system - Reflexes - Hormones and glands - Menstrual cycle - Fertility	Topic: Chemistry – Elements, Mixtures and Compounds - Atoms, elements and compounds - Metals and non-metals - Periodic table - Naming compounds - Word equations - States of matter - Changes of state - Melting and boiling points - Diamond and graphite - Separating mixtures - Paper chromatography - Reactivity series - Extracting metals - Recycling metals - Alloys - Polymers	Topic: Physics – Energy, Forces and Structure of Matter - Energy stores - Energy transfers - Efficiency - Reducing energy waste - Thermal insulation - Energy resources - Contact and non-contact forces - Work done - Friction - Speed - Stopping distances - Reaction times - Nuclear radiation	Topic: Biology – Environment, Evolution and Inheritance - Photosynthesis - Adaptations - Food chains / webs - Interdependence - Carbon cycle - Competition - Living and non-living environmental changes - Pollution - Evolution - Natural selection - Selective breeding - Sexual and asexual reproduction - DNA and chromosomes - Genetic engineering	- Metals and acids - Hydrogen test - Acids and alkalis - Acids and carbonates - Crystallisation of salts - Exothermic and endothermic - Factors affecting rates of reaction - Earth's atmosphere - Crude oil - Fractional distillation - Complete and incomplete combustion - Greenhouse gases - Climate change - Water treatment	Topic: Physics – Electricity, Magnetism and Waves - Current - Voltage - Resistance - Complete circuits - ACDC - Plugs - Fuses - Power ratings - Magnetism - Magnetic fields - Electromagnets - Transverse and longitudinal waves - Structure of a wave - Wave speed - EM spectrum - EM wave uses
	<i>Year 10 learners have 1 IXL timetabled lesson per week</i>					

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Year 10 GCSE Biology	Baseline Testing Topic: Cell Biology - Eukaryotes and prokaryotes - Microscopy (RPA) - DNA and chromosomes - Mitosis - Stem Cells - Diffusion - Osmosis (RPA) - Active Transport	Topic: Bioenergetics - Photosynthesis - Rate of photosynthesis (RPA) - Uses of glucose - Metabolism Topic: Organisation - Food tests (RPA) - Enzymes (RPA) - CHD - Cancer - Plant tissues and organs	Topic: Infection & Response - Vaccinations - Drug discovery - Drug development - Culturing microbes (RPA) - Plant diseases - Plant defences	Topic: Homeostasis - Homeostasis - Reaction times (RPA) - The brain - The eye - Controlling body temperature - Water and nitrogen balance - Contraception - Plant hormones (RPA)	Topic: Inheritance and evolution - Meiosis - Inherited disorders - Sex determination - Variation - Cloning - Speciation - Mendel - Evidence for evolution – fossils, antibiotic resistance - Extinction - Classification	Topic: Ecology - Sampling (RPA) - Decomposition (RPA) - Biodiversity - Trophic levels - Pyramids and transfer of biomass - Food security - Farming - Fisheries - Biotechnology
	<i>Year 10 learners have 1 IXL timetabled lesson per week</i>					

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Year 11 Entry Level	Baseline Testing Topic: Biology – The Human Body - Animal cells - Specialised cells - Tissues - Organs - Circulatory system - Digestive system - Respiration - Diet and lifestyle - Exercise - Pathogens - White blood cells - Vaccinations - Drugs - Nervous system - Reflexes - Hormones and glands - Menstrual cycle - Fertility	Topic: Chemistry – Elements, Mixtures and Compounds - Atoms, elements and compounds - Metals and non-metals - Periodic table - Naming compounds - Word equations - States of matter - Changes of state - Melting and boiling points - Diamond and graphite - Separating mixtures - Paper chromatography - Reactivity series - Extracting metals - Recycling metals - Alloys - Polymers	Topic: Physics – Electricity, Magnetism and Waves - Current - Voltage - Resistance - Complete circuits - ACDC - Plugs - Fuses - Power ratings - Magnetism - Magnetic fields - Electromagnets - Transverse and longitudinal waves - Structure of a wave - Wave speed - EM spectrum - EM wave uses	Catch up for missed content and assessments	Revision	
	<i>Year 11 learners have 1 IXL timetabled lesson per week</i>					

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Year 11 GCSE Biology	Baseline Testing Topic: Cell Biology - Eukaryotes and prokaryotes - Microscopy (RPA) - DNA and chromosomes - Mitosis - Stem Cells - Diffusion - Osmosis (RPA) - Active Transport Topic: Organisation - Food tests (RPA) - Enzymes (RPA) - CHD - Cancer - Plant tissues and organs	Topic: Bioenergetics - Photosynthesis - Rate of photosynthesis (RPA) - Uses of glucose - Metabolism Topic: Infection & Response - Vaccinations - Drug discovery - Drug development - Culturing microbes (RPA) - Plant diseases - Plant defences	Topic: Homeostasis - Homeostasis - Reaction times (RPA) - The brain - The eye - Controlling body temperature - Water and nitrogen balance - Contraception - Plant hormones (RPA)	Topic: Inheritance and evolution - Meiosis - Inherited disorders - Sex determination - Variation - Cloning - Speciation - Mendel - Evidence for evolution – fossils, antibiotic resistance - Extinction - Classification	Revision	
	<i>Year 11 learners have 1 IXL timetabled lesson per week</i>					