|  | **Autumn 1** | **Autumn 2** | **Spring 1** | **Spring 2** | **Summer 1** | **Summer 2** |
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|  | **Chemistry** | **Physics** | **Biology** | **Chemistry** | **Physics** | **Biology** |
| Year  7 | ***SUBSTANCES AND PROPERTIES*** *Composite materials*  *Classifying materials*  *Substance Solutions*  *Separating solutions*  ***PARTICLES AND STRUCTURE***  *Particle model for the solid, liquid and gas states.*  *Particles in solutions* | **FORCES AND MOTION**  What do forces do  Describing forces  Balanced and unbalanced forces Friction  Energy sotres and transfers  **SOUND, LIGHT AND WAVES** Production and transmission of sound  Characteristics of light | ***CELLS***  *Living, dead and never been alive Cells and cell structures*  *Cell shape and size*  *Diffusion and the cell membrane* ***HEREDITY AND LIFE CYCLES*** *Heredity and genetic information The structure and function of the genome* | **PARTICLES AND STRUCTURE** Atoms and molecules  Symbols and formulae  Polymer properties  Rearrangement of atoms **SUBSTANCES AND PROPERTIES**  Comparing solubility  **CHEMICAL REACTIONS** Formation of new substances | **EARTH IN SPACE**  Planets and the solar system Gravity  The night sky, stars and galaxies **MATTER**  Temperature  Heating and cooling  Thermal Conduction  Thermal store of energy | **CELLS**  Working together: cells, tissues and organ systems.  Supplying cells: the human circulatory system  The human skeleton and muscles **VARIATION, ADAPATATION AND EVOLUTION**  Differences within species  Changes in species over time; fossil evidence |
| Year  8 | **DYNAMIC EARTH**  What's in a rock  Inside the earth Making rocks by heating **PARTICLES AND STRUCTURE** Representing reactions  Conservation of mass  Reactions in solution  Combustion  **CHEMICAL REACTIONS**  Reactions in solution  Combustion | **FORCES AND MOTION**  Describing speed  Motion graphs  Changing motion  Drag **SOUND, LIGHT AND WAVES** The passive eye  Seeing in colour | **HEALTH AND DISEASE**  Good and ill health  Disease  **HEREDITY AND LIFE CYCLES** Growth  Lifecycles | **EARTH CHEMISTRY**  Air quality  Water cycle processes  Acid rain  **SUBSTANCES AND PROPERTIES**  pH scale  C**HEMICAL REACTIONS** Exothermic and endothermic reactions  Neutralisation | **SOUND AND LIGHT**  The ray model of light to explain images  Refraction and lenses  **EARTH IN SPACE**  Days and seasons  **FORCES AND MOTION**  Mass and weight  Hidden forces  Turning effects | **CELLS**  Plant nutrition and photosynthesis Cellular respiration  **VARIATION, ADAPTATION AND EVOLUTION**  Identifying and classifying organisms  **HEALTH AND DISEASE**  Diet and exercise |
| Year  9 | ***EARTH CHEMISTRY***  *Chemical weathering*  ***DYNAMIC EARTH-***  *Physical weathering and erosion* ***SUBSTANCES AND PROPERTIES***  *Trends in physical properties*  ***PARTICLES AND STRUCTURE***  *Atomic structure*  ***CHEMICAL REACTIONS***  *Periodic patterns* | ***ELECTRICITY AND MAGNETISM*** *Making circuits*  *Electric current*  *Voltage Static electricity*  ***SOUND, LIGHT AND WAVES*** *Waves on water and ropes*  *A wave model of sound* | **HEREDITY AND LIFE CYCLES** Sexual reproduction in humans Contraception  Sexual and asexual reproduction in flowering plants  **ORGANISMS AND THEIR ENVIRONMENT**  Food chains and food webs Interdependence within ecosystems  Ecosystem components and dynamics | **PARTICLES AND STRUCTURE** Atomic Model  **SUBSTANCES AND PROPERTIES**  Trends in physical properties **CHEMICAL REACTIONS**  Periodic patterns  **DYNAMIC EARTH**  Making rocks by pressure and cementing  Making fossil fuels | **ELECTRICITY AND MAGNETISM** Resistance Parallel circuits Magnetic fields  Electromagnets  **MATTER**  Floating, sinking and density Pressure in fluids  Convection | **HEALTH AND DISEASE** Pathogens  **ORGANISMS AND THEIR ENVIRONMENT**  Biodiversity, conservation and sustainability  **VARIATION, ADAPTATION AND EVOLUTION**  Explaining evolution |