

Year 5 objectives

Scientific enquiry	Living things and their habitats	Properties and changes of materials	Earth and space	Animals, including humans	Forces
planning different types of scientific enquiries to answer questions, including recognising and controlling variables where necessary	describe the differences in the life cycles of a mammal, an amphibian, an insect and a bird	compare and group together everyday materials on the basis of their properties, including their hardness, solubility, transparency, conductivity (electrical and thermal), and response to magnets	describe the movement of the Earth, and other planets, relative to the Sun in the solar system	describe the changes as humans develop to old age	explain that unsupported objects fall towards the Earth because of the force of gravity acting between the Earth and the falling object
taking measurements, using a range of scientific equipment, with increasing accuracy and precision, taking repeat readings when appropriate	describe the life process of reproduction in some plants and animals	know that some materials will dissolve in liquid to form a solution, and describe how to recover a substance from a solution	describe the movement of the Moon relative to the Earth		identify the effects of air resistance, water resistance and friction, that act between moving surfaces
recording data and results of increasing complexity using scientific diagrams and labels, classification keys, tables, scatter graphs, bar and line graphs		use knowledge of solids, liquids and gases to decide how mixtures might be separated, including through filtering, sieving and evaporating	describe the Sun, Earth and Moon as approximately spherical bodies		recognise that some mechanisms, including levers, pulleys and gears, allow a smaller force to have a greater effect.

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using test results to make predictions to set up further comparative and fair tests		give reasons, based on evidence from comparative and fair tests, for the particular uses of everyday materials, including metals, wood and plastic	use the idea of the Earth's rotation to explain day and night and the apparent movement of the sun across the sky.		
reporting and presenting findings from enquiries, including conclusions, causal relationships and explanations of and degree of trust in results, in oral and written forms such as displays and other presentations		demonstrate that dissolving, mixing and changes of state are reversible changes			
identifying scientific evidence that has been used to support or refute ideas or arguments.		explain that some changes result in the formation of new materials, and that this kind of change is not usually reversible, including changes associated with burning and the action of acid on bicarbonate of soda.			