Year 6 Progressions of Skills - Science

2025/26	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
Enrichment opportunities						
Science Unit	Living Things: Classifying big and small	Energy: Light and reflection	Living things: Evolution and Inheritance	Energy: Circuits, batteries and switches	Animals: Circulation and health	Making connections: Are some sunglasses safer than others?
Knowledge						
	To know that 'organism' is a term used to refer to an individual living thing. To know that micro-organisms are incredibly small and cannot usually be seen by the naked eye.	To know that light travels in a straight line from a light source. To understand that luminous objects are seen as a result of light directly entering the eye, whereas non-luminous objects reflect light into the	To know that 'organism' is a term used to refer to an individual living thing. To know that micro-organisms are incredibly small and cannot usually be seen by the naked eye.	To know a wider variety of components in a series circuit (including buzzer and motor). To know the conventions used to draw circuit diagrams, including the recognised symbols for common components	To know the main parts of the human circulatory system (heart, blood vessels and blood). To know that the heart pumps blood around the body. To know that the blood	To revise the units Circulation and health and light and reflection. To revise the units lights and reflection and circuits, batteries and switches. To revise the units light and reflection and

	To know the characteristics of the different groups of vertebrates and commonly found invertebrates. To know that living things have changed over time. To know that fossils provide us with information about living things that inhabited the Earth millions of years ago. To know that characteristics are passed from parents to their offspring, but that all offspring vary from their parents. To know that over time, variation in	eye. To know that shiny surfaces reflect light uniformly. To know that when light is reflected off a surface, its direction changes. To know that mirrors and periscopes work using reflection of light on smooth surfaces. To understand why shadows have the same shape as the objects that cast them as a result of light travelling in straight lines. To understand relationships between light sources, objects and shadows	To know the characteristics of the different groups of vertebrates and commonly found invertebrates. To know that living things have changed over time. To know that fossils provide us with information about living things that inhabited the Earth millions of years ago. To know that characteristics are passed from parents to their offspring, but that all offspring vary from their parents. To know that over time, variation in offspring	and using straight lines. To know that the voltage of a circuit can be changed and how this affects bulb brightness (or buzzer volume).	vessels transport blood around the body. To know that the blood transports vital substances around the body, including oxygen and nutrients. To understand the relationships between different organ systems To understand the impact of diet, exercise, drugs and lifestyle on the way a body functions. To know that the heart rate is the number of beats per minute. To know that exercise increases heart rate.	circulation and health. Revise the units light and reflection and circulation and health. To report on findings in the form of an advert.

	offspring can affect animals' chances of survival in particular environments. To know that animals and plants have adapted to suit their environment over many millions of years and that this process can be called evolution.	To understand how and why the distance between the object and the screen affects the size of the shadow. To understand how the angle of a reflected ray is affected by the angle of the incoming ray on a smooth surface.	can affect animals' chances of survival in particular environments. To know that animals and plants have adapted to suit their environment over many millions of years and that this process can be called evolution.			
Working scientifically						
	To produce a classification key To use a classification key	To use evidence to form conclusions. To draw scientific diagrams. To pose questions To record results as a line graph.	To group factors. To evaluate the degree of trust and pose new questions for further enquiry. To consider evidence used to inform theories.	To use standardised symbols when drawing diagrams. To explain results using scientific knowledge. To design a results tables. To plan an enquiry.	To evaluate sources of information. To evaluate a model. To interpret patterns in data To write a method.	To plan a comparative test. To gather and record data To conclude and evaluate the investigation.

			To consider the degree of trust in the evidence used.	To recognise that scientific knowledge can solve a problem.	To draw a line graph.	To report on findings in the form of an advert.