

Prior learning: Year 1 and 2.

Year 1 Everyday materials

- Distinguish between an object and the material from which it is made.
- Identify and name a variety of everyday materials, including wood, plastic, glass, metal, water, and rock.
- Describe the simple physical properties of a variety of everyday materials.
- Compare and group together a variety of everyday materials on the basis of their simple physical properties.

Year 2 Uses of everyday materials.

- Identify and compare the suitability of a variety of everyday materials, including wood, metal, plastic, glass, brick, rock, paper and cardboard for particular uses.



In this topic, we are learning to:

- Understand that rocks are a naturally occurring material.
- Recognise that rocks may be different sizes and have different properties.
- Compare and group together different kinds of rocks on the basis of their appearance and simple physical properties.
- Know that there are three different types of rocks.
- Describe in simple terms how fossils are formed when things that have lived are trapped within sedimentary rock.
- Recognise that soils are made from rocks and organic matter.
- Understand that the type of rock, size of rock pieces and the amount of organic matter affect the property of the soil.

Key Vocabulary:

rock	A solid collection of minerals with three main types: sedimentary, igneous and metamorphic.
crystal	A solid in which molecules form in a repeating pattern.
mineral	Inorganic substances, meaning that they do not come from an animal or a plant.
layers	Layers mean several different levels where each level has the same properties or features.
absorb	Absorb means to take in or soak up.
fossil	The preserved remains, or traces of remains of ancient organisms.
weathering	The breaking down or dissolving of rocks and minerals on the surface of the Earth.
organic matter	Decomposed plants and animals.
soil	Soil is a mixture of minerals and organic material that covers much of Earth's surface.



Questions you will know the answers to...

What is a rock?
How many types of rocks are there?
How are fossils created?

Do all rocks have the same properties?
What does weathering do to rocks?
What is soil made from and why is it important?



Working Scientifically Assessment Focus:

RECORDING DATA.

- Gather, record, classify and present data in a variety of ways to help answer questions.
- Record findings using simple scientific language, drawings, labelled diagrams, bar charts, and tables. The children sometimes decide how to record and present evidence.
- Record observation e.g., using photographs, videos, pictures, labelled diagrams or writing. Record measurements e.g., using tables, tally charts and bar charts (given templates, if required, to which they can add headings).
- Record classifications e.g., using tables, Venn diagrams, Carroll diagrams. Children are supported to present the same data in different ways to help with answering the question.

ANALYSIS.

- Use straightforward scientific evidence to answer their own and others' questions based on observations they have made, measurements they have taken or information they have gained from secondary sources. The answers are consistent with the evidence.
- Identify differences, similarities or changes related to simple scientific ideas and processes by interpreting their data to generate simple comparative statements based on their evidence.
- Begin to identify naturally occurring patterns and causal relationships.
- Use results to draw simple conclusions, make predictions for new values, suggest improvements and raise further questions based on their evidence and current subject knowledge.
- Identify ways in which they adapted their method as they progressed or how they would do it differently if they repeated the enquiry.