

Science Knowledge Organiser: Year 2 - Spring Term

Materials for clothing – Which material could be used to make a strong, warm and waterproof coat?

What we already know:

- There are many different materials that have different observable properties.
- Materials that have similar properties are grouped into metals, rocks, fabrics, wood, plastic and ceramics (including glass).
- 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.

Key Vocabulary:

- * change
- * Physical force
- * Absorb
- * Crumbly
- * Property / Properties
- * Drag
- * Suitable
- * Strongest
- * Flexible

What we are going to learn:

- The properties of a material determine whether they are suitable for a purpose.
- Materials can be changed by physical force (twisting, bending, squashing and stretching).
 - The purpose of the activities within this learning journey is for children to understand why we choose certain materials to do certain jobs. Children will plan how to test materials (wood, metal, plastic, glass, brick, paper, rock, cardboard)

What we are going to learn next time: Year 3

- Materials can be divided into solids, liquids and gases.
- Solids hold their shape unless forced to change.
- Liquids flow easily but stay in their container because of gravity. The more viscous a liquid the less runny it is.
- Gases move everywhere and are not held in containers by gravity
- Heating causes solids to melt into liquids and liquids to evaporate to gases.
- Cooling causes gases to condense to liquids and liquids to freeze to solids.
- Different substances change state at different temperatures but the temperatures at which given substances changes state is always the same.