

Year Two LTP

Working scientifically overview	Lines of enquiry: research, pattern seeking, comparative testing, identifying & classifying, investigation over time		7 super science skills: asking questions, setting up tests, observations, recording and presenting data, interpreting data, evaluating.
Summary	Autumn 1: What's Alive outside? Science: Biology Strand: living things and their habitats	Autumn 2: Materials Science: Physics Strand: materials and their properties	Summer 2: How can I stay fit and healthy? Science: Biology Strand: animals inc humans
Prior knowledge	Y1: Children will know that animals have different needs to live. For example, animals such as fish and amphibians use gills to breath under water and animals such mammals, reptiles & birds use lungs to breath air. They will know that animals live in different places such as farm animals & pets.	Y1: Children will be able to identify and classify materials and their properties such as wood, plastic, glass, metal, water & rock . Properties: hard/ soft, rough/smooth, fragile/ strong, stretchy/ stiff, shiny/ dull, rigid/flexible, see through/ not see through, absorbent/ not absorbent, waterproof/ not waterproof	Y1: Children will be able to name and label body parts and know that humans are mammals . Children will know about a range of animal's offspring from Spring learning in EYFS.
Key Vocabulary	Living, dead, never been alive, food chain, predator, prey, consumer, habitat, micro-habitats	Suitability, Opaque, transparent, translucent, reflective, non-reflective, push, pull, twist, squash, round, flat, bend, stretch	Offspring, reproduction, young, old, baby, child, teenager, adult, healthy choices, germs, disease, carbohydrates, protein, fruit, vegetables, meat, fish, dairy
Cultural capital	Trips: Austerfield study centre Class text: Meerkat Mail	Famous scientists: John Dunlop, Charles Macintosh	Books: The Runaway Pea
Core (sticky) knowledge/ skills	Children will know how to use their 7SSS (particularly asking questions & observing) to identify and classify dead, alive and never been alive objects. They will carry out comparative tests & record data to show how animals and plants vary dependent on their habitat/ micro-habitat . They will create simple food chains to show the basic needs of different animals/ plants.	Children will know how to use their 7SSS (specifically observing & recording data) to identify & classify materials & their properties to carry out comparative tests to investigate objects and materials suitability .	Children will know how to use their 7SSS (specifically observing and measuring) to investigate changes over time of animals inc humans growing from babies to adults . They will be able talk about healthy choices for humans.
Future links	Y4 – classifying animals & environments/ habitats Y5 - life cycles Y6 – classifying animals inc, micro organisms/ plants/ animals.	Y3 – forces & magnets Y5 – properties & change of materials.	Y3 – animal inc humans nutrition & skeletons Y5 - life cycles of mammals, reptiles... Y6 – classifying animals

Forest school links	Plants Children will use their 7SSS (specifically observing and measuring) to investigate the growth of bulbs and seeds over time . They will know what a plant needs to grow & stay healthy. Pupils will set up tests to test comparatively to show how plants grow differently without all of their requirements. Vocab: light, shade, germinate, warm, cool, water, grow, healthy, seed.
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