

SCIENCE-BASED TOPICS



PRECIOUS POTIONS

Explore making potions, including mixing, floating, sinking, dissolving and counting.



AIR

Explore different ways to make bubbles and fun ways to play with moving objects around with air.



COLOUR SCIENCE

Explore primary colours, mixing colours and separating colours with chromatography



WATER

Explore properties of water and the basics of the water cycle, including warm water rising.



MAGNETS

Explore magnets, magnetic materials and strength of magnets including games with magnets.



ICE ADVENTURES

Explore the properties of ice and freezing and melting, plus a fun trick with salt, ice and string.



RAINBOW HUNTERS

Explore rainbow colours, how rainbows are made and hunt for rainbows inside and outside.



CHEMISTRY CHAMPIONS

Explore chemistry and how reactions make things change, observing three different reactions.



MIRROR MISSIONS

Explore mirrors and reflections, read mirror codes and use mirrors and angles to see around and under.



WEATHER WATCHERS

Explore the weather and clouds and make rain gauges and anemometers to take measurements.



PITCH PERFECT

Explore how sounds are made and investigate pitch and vibrations making our own instruments.



WHAT'S IT MADE OF?

Explore what things are made of, investigating and sorting materials by their properties, including absorption.



BODY BUDDIES

Explore the human body including our hearts, our digestive systems and our skeletons.



GRAVITY PLAYGROUNDS

Explore gravity, make our own slides, create artwork with swings and use magnets to defy gravity.



SINK IT!

Explore floating and sinking with counting, weight and problem solving challenge games.



SOUND SCIENCE

Explore the science of how sounds are made with shakers and drums and a fun way to see vibrations.



WHEN THE EARTH MOVES

Explore basic earth science with earthquake towers, tsunamis and volcanic eruptions.



A SHADOW SHOW

Explore how shadows are made, different ways to change shadows and make a shadow puppet show.



CRAZY CATERPILLARS

Explore the life cycle of caterpillars with maths games, science reactions and zip line butterflies.

ENGINEERING-BASED TOPICS



BOAT BUILDING

Explore floating and buoyancy, making boats and testing them out in a scientific way.



BRIDGES ENGINEERING

Explore building bridges from different materials including books, straws and craft sticks.



MINI ARCHITECTS

Explore different building designs and how we can replicate these using things in our home.



FLYING FUN

Explore flying and make planes to test how weight and shape affect how well something flies.



TOWERS UP

Explore engineering and strong foundations to build tall towers with blocks and other materials.



RAMP RACERS

Explore ramps, gradients, speed and friction to race cars and other objects using fair tests.



MAGNIFICENT MACHINES

Explore engineering with simple machines, specifically the inclined plane using fun games and activities.



PULLEY ME UP

Explore pulleys and why they are useful and make a few different pulleys to investigate.



CLEVER LEVERS

Explore another simple machine: the lever to make seesaws, lift things and build and test catapults.



COOL CARS

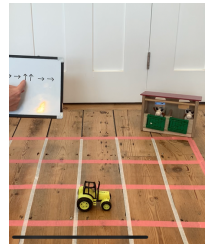
Explore cars for imaginative play, make car artwork and learn about wheels and axles.

MATHS & TECHNOLOGY-BASED TOPICS



WEIGHT

Explore weight, build our own seesaws and weighing scales and weigh and compare different objects.



CODING UNPLUGGED

An introduction to coding and logic, ordering with numbers and rhymes and giving instructions.



A CIRCUS OF SHAPES

Explore 2D shapes, identifying and hunting for shapes, making our own shapes and pictures.



HOW MUCH SPACE?

Explore and compare volume with solids and liquids and investigate water displacement.



CODING PLAYMATES

Explore robots and learn skills needed for coding: logic, sequencing and problem solving.



PATTERN PICKERS

Explore maths and science with patterns and matching including messy art and bubble patterns.



CREEPY CRAWLY SYMMETRY

Explore symmetry with loose parts artwork, butterfly paintings and use mirrors to be symmetry detectives.

THEMES & TIME OF YEAR TOPICS



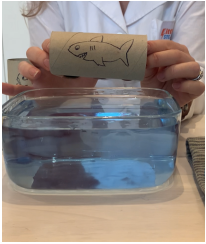
DISCOVER DINOSAURS

Explore dinosaurs by making fossils, digging like paleontologists and making dinosaur skeletons.



SPACE EXPLORERS

Explore space by creating star constellations, launching a rocket and printing the Moon surface.



UNDER THE SEA

Explore the sea including saltwater, what stops sharks sinking and a fishing trip with magnets.



SAFARI STEAM

Explore science and maths tied to animals with habitats, tracks and absorption giraffe skin.



ENVIRO WARRIORS

Explore what it means to save the planet by sorting rubbish, saving polar bears and cleaning oil spills.



HOCUS POCUS POTIONS

Explore potions for Halloween by mixing and combining and separating mixtures and making lava lamps.



FANTASTIC FIREWORKS

Explore fireworks by mixing oil and water, making firework launchers and messy art.



WINTER WONDERING

Explore science with a winter theme with snow in a jar, icy snowmen and snowflake patterns.



CHRISTMAS SPECIAL

Explore Christmas-themed STEAM with toy chutes, ice lanterns and engineered Christmas trees.



NEW YEAR'S STEAM

Explore New Year with shaving foam firework pictures, confetti launchers, and 2021 printing pictures.



PLANTING SPRING

Explore plants by growing from beans, making art from the outdoors and making celery change colour.



EASTER EGGS-PERIMENTS

Explore on an Easter theme to decorate eggs, experiment with eggs and investigate properties of chocolate.