

Design Technology Scheme of Work Year 1/2

Design	Make	Evaluate	Technical knowledge	Cooking and nutrition
Design purposeful, functional, appealing products for themselves and other users based on design criteria. Generate, develop, model and communicate their ideas through talking, drawing, templates, mock-ups and where appropriate, information and communication technology.	Select from and use a range of tools and equipment to perform practical tasks. Select from and use a wide range of materials and components, including construction materials, textiles and ingredients.	Explore and evaluate a range of existing products. Evaluate their ideas and products against design criteria.	Build structures, exploring how they can be made stronger, stiffer and more stable Explore and use mechanisms in their products eg wheels and axles, levers, sliders.	Use the basic principles of a healthy and varied diet. Understand where food comes from.

	Autumn		Spring		Summer
Cycle A	<p>Sheet materials Design and make Link to topic and science work on materials Roll paper to create tubes, curl paper, create hinges, make simple pop ups Use a hole punch Insert paper fasteners for card linkages Sewing Design and evaluate Link to Art Experience using several different kinds of simple stitch</p>	Use DT skill when making Christmas card – sewing, hinge, slider etc	<p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to PSHE/science - keeping healthy Follow safe procedures for food safety and hygiene. Savoury recipe Cut, peel, grate, chop</p>	Use DT skill when making Easter/Mother's day card – sewing, lever, slider etc	<p>Construction Evaluate and technical knowledge Link to topic – vehicle? Cut strip wood/dowel using a hacksaw and bench hook Observe a glue gun being used and use it on a 1:1 adult : child ratio</p>
Cycle B	<p>Sheet materials Evaluate and technical knowledge Link to topic and science work on materials Investigate strengthening sheet materials Investigate joinings – temporary, fixed and moving Sewing Design and evaluate Link to Art Experience using several different kinds of simple stitch – running and cross stitch</p>		<p>Construction Design and make Link to topic Use a range of materials to create models with wheels and axles eg tubes, dowel, cotton reels Attach wheels to a chassis using an axle Cut strip wood/dowel using a hacksaw and bench hook Observe a glue gun being used and use it on a 1:1 adult : child ratio</p>		<p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to PSHE/science - keeping healthy Follow safe procedures for food safety and hygiene. Sweet recipe Cut, peel, grate, chop</p>

Design Technology Scheme of Work Year 3/4

Design	Make	Evaluate	Technical knowledge	Cooking and nutrition
Use research and develop design criteria to inform the innovative, functional, appealing products that are fit for purpose, aimed at particular groups or individuals	Select from and use a wider range of tools and equipment to perform practical tasks accurately	Investigate and analyse a range of existing products	Apply their understanding of how to strengthen, stiffen and reinforce more complex structures	Understand and apply the basic principles of a healthy and varied diet
Generate, develop, model and communicate their ideas through discussion, annotated sketches, cross-sectional and exploded diagrams, prototypes, pattern pieces and computer aided design	Select from and use a wider range of materials, textiles and ingredients, according to their functional properties and aesthetic qualities	Evaluate their ideas and products against their own design criteria and consider the views of others to improve their work	Understand and use mechanical systems in their products eg gears, levers, pulleys, cams, levers and linkages	Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques
		Understand how key events and individuals in design technology have helped shape the world	Understand and use electrical systems in their products eg switches, buzzers, bulbs and motors	Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed
			Apply their understanding of computing to program, monitor and control their products	

	Autumn		Spring		Summer
Cycle A	<p>Sheet materials Design and make Link to topic – levers Cut slots and internal shapes Use lolly sticks/card to make levers and linkages Use linkages to make movement larger or more varied Use a glue gun with close supervision</p> <p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to Literacy/PSHE/science - keeping healthy & teeth Follow safe procedures for food safety and hygiene. Savoury recipe Measure and weigh ingredients appropriately</p>	Use DT skill when making Christmas card – sewing, hinge, slider etc	<p>Construction Evaluate and technical knowledge Link to topic Look at models with circuits including bulbs and buzzers</p> <p>Sewing Design and evaluate Link to Art Experience some appliqué work Expand the range of stitches that can be used Sew buttons, sequins onto work</p>	Use DT skill when making Easter/Mother's day card – sewing, lever, slider etc	<p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to Literacy/PSHE/science - keeping healthy & teeth Follow safe procedures for food safety and hygiene. Savoury recipe Measure and weigh ingredients appropriately</p>
Cycle B	<p>Construction Design and make Link to topic – Tudor houses? Create shell or frame structures, strengthen frames with diagonal struts Make structures more stable by giving them a wide base Use a glue gun with close supervision Measure and mark square selection, strip and dowel accurately to 1cm</p>		<p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to PSHE/science - keeping healthy Follow safe procedures for food safety and hygiene. Savoury recipe Measure and weigh ingredients appropriately</p>		<p>Sheet materials Evaluate and technical knowledge Link to topic – diorama? Use and explore complex pop ups Explore and create nets</p> <p>Sewing Design and evaluate Link to Art Experience some appliqué work Expand the range of stitches that can be used Sew buttons, sequins onto work</p>

Design Technology Scheme of Work Year 5/6

Design	Make	Evaluate	Technical knowledge	Cooking and nutrition
<p>Use research and develop design criteria to inform the innovative, functional, appealing products that are fit for purpose, aimed at particular groups or individuals</p> <p>Generate, develop, model and communicate their ideas through discussion, annotated sketches, cross-sectional and exploded diagrams, prototypes, pattern pieces and computer aided design</p>	<p>Select from and use a wider range of tools and equipment to perform practical tasks accurately</p> <p>Select from and use a wider range of materials, textiles and ingredients, according to their functional properties and aesthetic qualities</p>	<p>Investigate and analyse a range of existing products</p> <p>Evaluate their ideas and products against their own design criteria and consider the views of others to improve their work</p> <p>Understand how key events and individuals in design technology have helped shape the world</p>	<p>Apply their understanding of how to strengthen, stiffen and reinforce more complex structures</p> <p>Understand and use mechanical systems in their products eg gears, levers, pulleys, cams, levers and linkages</p> <p>Understand and use electrical systems in their products eg switches, buzzers, bulbs and motors</p> <p>Apply their understanding of computing to program, monitor and control their products</p>	<p>Understand and apply the basic principles of a healthy and varied diet</p> <p>Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques</p> <p>Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed</p>

	Autumn		Spring		Summer
Cycle A	<p>Sheet materials Design, make, technical knowledge Link to topic & science – interactive poster? Use electrical systems in their products such as a motor and a switch Cut slots</p>	Use DT skill when making Christmas card etc – sewing, hinge, slider	<p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to PSHE/science/history - keeping healthy Follow safe procedures for food safety and hygiene. Savoury recipe/marble cake Cut and shape ingredients using the appropriate tools Join and combine ingredients appropriately eh beating, rubbing in etc Sewing Design and evaluate Link to Art/History Experience simple patchwork Be able to use a range of stitches to achieve different effects</p>	Use DT skill when making Easter/MoD card – sewing, lever, slider etc	<p>Construction Evaluate and technical knowledge Link to topic Control a model using an ICT control program -control Lego</p>
Cycle B	<p>Sheet materials Evaluate and technical knowledge Link to topic – bridges/architecture Cut accurately and safely to a marked line Combine materials with temporary, fixed or moving joinings Use craft knife, cutting mat and safety ruler under one to one supervision if appropriate Choose an appropriate sheet material for a purpose</p>		<p>Cooking and nutrition Design, make, evaluate Link to maths with measure Link to PSHE/science - keeping healthy Follow safe procedures for food safety and hygiene. Savoury recipe Cut -and shape ingredients using the appropriate tools Join and combine ingredients appropriately eh beating, rubbing in etc</p>		<p>Construction Design and make Link to topic Use a hand drill to drill tight and loose fit holes Cut wood, dowel, square section wood accurately to 1mm Use a glue gun with close supervision Use a cam to make an up and down mechanism Build frameworks using a range of materials Sewing Design and evaluate Link to Art – soft/hard toy? Experience simple patchwork Be able to use a range of stitches to achieve different effects</p>