



## Design Technology Long Term Plan

EYFS

The EYFS framework is structured very differently to the national curriculum as it is organised across seven areas of learning rather than subject areas.

The table below demonstrates which early years outcomes are prerequisite skills for DT within the national curriculum.

	Nursery	Reception	Reception ELG
Explore	<p>Understanding the World</p> <ul style="list-style-type: none"><li>Explore how things work.</li></ul> <p>Expressive Arts and Design</p> <ul style="list-style-type: none"><li>Explore different materials freely, in order to develop their ideas about how to use them and what to make.</li></ul>	<p>Expressive Arts and Design</p> <ul style="list-style-type: none"><li>Explore, use and refine a variety of artistic effects to express their ideas and feelings.</li></ul>	<p>Expressive Arts and Design</p> <ul style="list-style-type: none"><li>Safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function.</li></ul>
Design	<p>Physical Development</p> <ul style="list-style-type: none"><li>Use large-muscle movements to wave flags and streamers, paint and make marks.</li></ul> <p>Expressive Arts and Design</p> <ul style="list-style-type: none"><li>Explore different materials freely, in order to develop their ideas about how to use them and what to make.</li><li>Develop their own ideas and then decide which materials to use to express them.</li></ul>	<p>Physical Development</p> <ul style="list-style-type: none"><li>Progress towards a more fluent style of moving, with developing control and grace.</li><li>Use their core muscle strength to achieve a good posture when sitting at a table or sitting on the floor.</li></ul> <p>Expressive Arts and Design</p> <ul style="list-style-type: none"><li>Explore, use and refine a variety of artistic effects to express their ideas and feelings.</li></ul>	<p>Physical Development</p> <ul style="list-style-type: none"><li>Use a range of small tools, including scissors, paintbrushes and cutlery.</li></ul>

Autumn 1		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Theme		Traditional Tales (English)	From Queens to Astronauts and Nurses to Artists	Key Events and Individuals in DT	How To Train Your Dragon	Natural Disasters – What rocks our Earth?	Key Events and Individuals in DT
Key Question		Guess who?	How do they travel?	Tell me more about famous events and faces in Design and Technology.	How exciting can you make a story book?	How can I keep my belongings dry?	Tell me more about famous events and faces in Design and Technology.
Key Content		<ul style="list-style-type: none"> <li>• Design an appealing product based on given criteria</li> <li>• Make a product selecting tools, equipment, and materials</li> <li>• Evaluate product against design criteria</li> </ul>	<ul style="list-style-type: none"> <li>• Design a functional product using mechanisms – wheels and axles</li> <li>• Make a product selecting tools, equipment, and materials, according to their characteristics</li> <li>• To explore a range of existing products</li> <li>• To evaluate product against design criteria</li> </ul>	<ul style="list-style-type: none"> <li>• Understand how key events and individuals in design and technology have helped shape the World</li> </ul>	<ul style="list-style-type: none"> <li>• Use research and develop design criteria to inform the design of functional, appealing products that use mechanisms, aimed at individuals or groups</li> <li>• Develop, model and communicate ideas</li> <li>• Select from wider range of tools and equipment for practical tasks</li> <li>• Investigate and analyse a range of existing products</li> <li>• Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>• Use research and develop design criteria to inform the design of innovative, functional products that are fit for purpose.</li> <li>• Develop, model and communicate ideas.</li> <li>• Select from wider range of tools and equipment for practical tasks</li> <li>• Select from wider range of materials and components according to functional properties</li> <li>• Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>• Understand how key events and individuals in design and technology have helped shape the World</li> </ul>
Skills	Design	<ul style="list-style-type: none"> <li>• I can identify a target group for what I intend to design and make.</li> <li>• I can generate ideas through talk and drawing based on my own experiences.</li> <li>• I can design appealing products for myself and others, based on given design criteria.</li> <li>• I can model my ideas in card and paper.</li> </ul>	<ul style="list-style-type: none"> <li>• I can identify a purpose for what I intend to design and make.</li> <li>• I can identify simple design criteria.</li> <li>• I can generate ideas through talk and drawing based on my own, and others' experiences.</li> <li>• I can develop my design ideas through discussion, observation, drawing and modelling.</li> <li>• I can make simple drawings and label parts.</li> <li>• I can plan how my vehicle will move and what materials and tools I will need.</li> </ul>	<ul style="list-style-type: none"> <li>• I can research using books, newspapers and ICT about key events and / or key inventors/designers/engineers of ground-breaking products.</li> </ul>	<ul style="list-style-type: none"> <li>• I can identify a purpose for what I intend to design and make, based on my research.</li> <li>• I can identify the design criteria for my product.</li> <li>• I can generate ideas through talk and drawing based on my own, and others' experiences.</li> <li>• I can develop my design ideas through discussion, observation, drawing, annotating, and modelling.</li> <li>• I can make simple drawings and label parts, creating prototypes where necessary.</li> <li>• I can research / explore a variety of levers and linkages before deciding which would work best in my design.</li> </ul>	<ul style="list-style-type: none"> <li>• I can generate ideas through brainstorming and identify a purpose for my structure.</li> <li>• I can draw up a specification for my design, using cross-sectional planning and annotated sketches.</li> <li>• I can develop a clear idea of what must be done, planning how to use materials, equipment, and processes, and suggesting alternative methods of making if the first attempts fail.</li> <li>• I can use results of investigations, information sources, including ICT when developing design ideas.</li> <li>• I can use computer-aided designs</li> </ul>	<ul style="list-style-type: none"> <li>• I can research using a range of sources about key events and / or key inventors/designers/engineers of ground-breaking products in Design and Technology.</li> </ul>
	Make	<ul style="list-style-type: none"> <li>• I can make my design using appropriate techniques.</li> <li>• With help, I can measure, mark out, cut</li> </ul>	<ul style="list-style-type: none"> <li>• I am beginning to select tools and materials, using the correct vocabulary to name and describe them.</li> <li>• I can measure, cut, and score with some accuracy.</li> </ul>		<ul style="list-style-type: none"> <li>• I can select appropriate tools and techniques for making my product.</li> <li>• I can measure, mark out, cut and shape a range of materials, using appropriate</li> </ul>	<ul style="list-style-type: none"> <li>• I can select appropriate materials, tools and techniques fit for purpose; explain choices, considering functionality.</li> </ul>	

		and shape a range of materials. • I can use tools eg scissors and a hole punch safely • I can assemble, join and combine materials and components together using a variety of temporary methods e.g. glues or masking tape. • I can use simple finishing techniques to improve the appearance of my product.	• I can use hand tools safely and appropriately. • I can assemble, join, and combine materials to make the vehicle move. • I can choose and use appropriate finishing techniques.		tools, equipment, and techniques with increasing accuracy. • I can join and combine materials and components accurately in temporary and permanent ways. • I can use leavers and / or linkages successfully in my design.	• I can create and follow a detailed step-by-step plan • I can measure and mark out accurately. • I can use a range of skills using different tools and equipment safely and accurately. • I can cut and join with accuracy to ensure a good-quality finish to the structure. • I am beginning to be resourceful with practical problems.	
	Evaluate	• I can evaluate my products as it is developed, identifying strengths and possible changes I might make. • I can evaluate my product by asking questions about what I have made and how I have gone about it.	• I can evaluate my product as it is developed, identifying strengths and possible changes I might make. • I can evaluate my product against my design criteria. • I can say what I would change / do differently next time.		• I can evaluate existing products, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose. • I can evaluate my work both during and at the end of the assignment. • I can evaluate my products carrying out appropriate tests, referring to my design criteria. • I can research whether products can be recycled or reused.	• I can evaluate and discuss existing structures, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose. • I can evaluate my structure against the original design specification, considering purpose and appearance. • I can evaluate my product personally and seek evaluation from others. • I can talk about some key inventors/designers/engineers of ground-breaking products	
Suggested Outcome		Fabric Face of a character from a Traditional Tale	A moving vehicle created with wheels and axles	Information booklet or presentations shared with others	A Pop Up Story Book for a specific audience	3D Waterproof container for a backpack	Information booklet with pictures, charts and / or diagrams to be shared with a given audience.
Subject Specific Vocabulary		Pattern, join, mark out, decorate, running stitch, needle, fabric.	Wheels & Axles: Wheel, axel, fixed, free, design, make, cutting, joining, hacksaw, vice, dowel, body, cab, shaping		Leavers & Linkages: Loose pivot, fixed pivot, system, input, process, output, linear, rotary, reciprocating, innovative, appealing, linkage, oscillating	Frame Structures: Reinforce, triangulation, stability, temporary, permanent, prototype, innovation, functional, design brief	
Challenge		Can you create a puppet from your favourite Traditional Tale?	Can you make a different moving vehicle	Can you research about another key events or key individual who has impacted Design and Technology today?	Can you make a Non-Fiction Pop Up book?	How could you adapt your design for another purpose?	Can you research about another key events or key individual who has impacted Design and Technology today?

Autumn 2		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Theme		Traditional Tales (English)		Skeletons and the Body (Science)	It's Christmas! (DT)	Natural disasters – What rocks our Earth?	Accessory Case (DT)
Key Question		How can I tell a story?		How do muscles work?	What Seasonal product could I make that would be suitable for any age?	Can you showcase a natural disaster using one or more - light, movement, sound, action / motion?	Design versus function?
Key Content		<ul style="list-style-type: none"> <li>• To design an appealing product based on given criteria</li> <li>• To talk about ideas and communicate through drawings</li> <li>• To explore and use mechanisms; levers, sliders</li> <li>• To make a product selecting tools, equipment, and materials</li> <li>• To evaluate product against design criteria</li> </ul>		<ul style="list-style-type: none"> <li>• Develop design criteria to inform the design of innovative, functional products that are fit for purpose</li> <li>• Develop, model and communicate ideas, including the use of CAD</li> <li>• Select from wider range of tools and equipment for practical tasks</li> <li>• Select from wider range of materials and components according to functional properties</li> <li>• Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>• Use research and develop design criteria to inform the design of innovative, functional, appealing products that are fit for purpose, aimed at individuals or groups</li> <li>• Develop, model and communicate ideas, including the use of CAD</li> <li>• Select from wider range of tools and equipment for practical tasks</li> <li>• Select from wider range of materials according to functional properties and aesthetic qualities</li> <li>• Investigate and analyse a range of existing products</li> <li>• Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>• Use research and develop design criteria to inform the design of innovative, functional products that is fit for purpose, aimed at individuals or groups</li> <li>• Develop, model and communicate ideas.</li> <li>• Select from wider range of tools and equipment for practical tasks</li> <li>• Select from wider range of materials and components according to functional properties and aesthetic qualities</li> <li>• Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>• Use research and develop design criteria to inform the design of innovative, functional, appealing products that are fit for purpose, aimed at individuals or groups</li> <li>• Develop, model and communicate ideas.</li> <li>• Select from wider range of tools and equipment for practical tasks</li> <li>• Select from wider range of materials according to functional properties and aesthetic qualities</li> <li>• Investigate and analyse a range of existing products</li> <li>• Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>
Skills	Design	<ul style="list-style-type: none"> <li>• I can identify a target group for what I intend to design and make.</li> <li>• I can generate ideas through talk and drawing based on my own experiences.</li> <li>• I can explore different mechanisms I could use in my design.</li> <li>• I can design purposeful, functional, and appealing products for myself and others, based on given design criteria including a chosen mechanism.</li> </ul>		<ul style="list-style-type: none"> <li>• I can identify a purpose and establish criteria for a successful mechanical product.</li> <li>• I can generate ideas for an item, considering its purpose and the user/s.</li> <li>• I can plan the order of my work before starting.</li> <li>• I can explore, develop, and communicate design proposals by modelling ideas.</li> <li>• I can make drawings with labels when designing.</li> <li>• I am beginning to use computers to show my design.</li> </ul>	<ul style="list-style-type: none"> <li>• I can identify a purpose for what I intend to design and make, based on my research.</li> <li>• I can identify the design criteria for my product.</li> <li>• I can generate ideas through talk and drawing based on my own, and others' experiences.</li> <li>• I can develop my design ideas through discussion, observation, drawing, annotating, and modelling.</li> <li>• I can make simple drawings and label parts, creating prototypes where necessary.</li> <li>• I can identify which materials would be best for my product and give reasons why.</li> </ul>	<ul style="list-style-type: none"> <li>• I can generate ideas through brainstorming and identify a purpose for my product.</li> <li>• I can draw up a specification for my design, using cross-sectional planning and annotated sketches.</li> <li>• I can develop a clear idea of what must be done, planning how to use materials, equipment, and processes, and suggesting alternative methods of making if the first attempts fail</li> <li>• I can use computer-aided designs</li> </ul>	<ul style="list-style-type: none"> <li>• I can communicate my ideas through detailed labelled drawings, including cross-sectional planning and annotated sketches.</li> <li>• I can develop my own detailed design specification.</li> <li>• I can explore, develop, and communicate aspects of my design proposals by modelling my ideas in a variety of ways.</li> <li>• I can plan the order of my work, choosing appropriate materials, tools, and techniques.</li> <li>• I can make design decisions, considering, resources and/or cost</li> <li>• I can clearly explain how parts of design will work, and how they are fit for purpose</li> </ul>
	Make	<ul style="list-style-type: none"> <li>• I can explore and make prototypes of different mechanisms.</li> </ul>		<ul style="list-style-type: none"> <li>• I can select tools and techniques for making my product.</li> </ul>	<ul style="list-style-type: none"> <li>• I can select appropriate tools and techniques for making my product.</li> </ul>	<ul style="list-style-type: none"> <li>• I can select appropriate materials, tools and techniques fit for purpose;</li> </ul>	<ul style="list-style-type: none"> <li>• I can select appropriate tools, materials, components, and techniques, explaining choices,</li> </ul>



		<ul style="list-style-type: none"> <li>• I can make my design using appropriate techniques.</li> <li>• With help, I can measure, mark out, cut and shape a range of materials.</li> <li>• I can use tools eg scissors and a hole punch safely</li> <li>• I can assemble, join and combine materials and components together using a variety of temporary methods e.g. glues or masking tape.</li> <li>• I can use simple finishing techniques to improve the appearance of my product.</li> </ul>		<ul style="list-style-type: none"> <li>• I can measure, mark out, cut, score, and assemble components with more accuracy.</li> <li>• I can work safely and accurately with a range of simple tools.</li> <li>• I can use finishing techniques, strengthen and improve the appearance of my product using a range of equipment.</li> </ul>	<ul style="list-style-type: none"> <li>• I can measure, mark out, cut and shape a range of materials, using appropriate tools, equipment, and techniques with increasing accuracy.</li> <li>• I can measure, tape or pin, cut and join fabric with some accuracy.</li> <li>• I can sew using a range of different stitches, and applique.</li> </ul>	<p>explain choices, considering functionality.</p> <ul style="list-style-type: none"> <li>• I can create and follow detailed step-by-step plan.</li> <li>• I can use a range of skills using different tools and equipment safely and accurately.</li> <li>• I can cut and join with accuracy to ensure a good-quality finish to the product.</li> <li>• I am beginning to be resourceful with practical problems.</li> </ul>	<p>considering functionality and aesthetics.</p> <ul style="list-style-type: none"> <li>• I can use tools safely and accurately.</li> <li>• I can make modifications as I go along.</li> <li>• I can pin, sew, and stitch materials together to create my product.</li> <li>• I can accurately apply a range of finishing techniques.</li> <li>• I can be resourceful with practical problems.</li> </ul>
	Evaluate	<ul style="list-style-type: none"> <li>• I can evaluate my product by discussing how well it works in relation to the purpose.</li> <li>• I can evaluate my product by asking questions about what I have made and how I have gone about it.</li> </ul>		<ul style="list-style-type: none"> <li>• I am beginning to evaluate existing products, considering: how well they have been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate my product against original design criteria e.g. how well it meets its intended purpose.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate existing products, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate my work both during and at the end of the assignment.</li> <li>• I can evaluate my products carrying out appropriate tests, referring to my design criteria.</li> <li>• I am beginning to explain how I could improve my original design.</li> <li>• I can research whether products can be recycled or reused.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate a product against the original design specification, considering purpose and appearance.</li> <li>• I can evaluate my product personally and seek evaluation from others.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate my product, identifying strengths and areas for development, and carrying out appropriate tests.</li> <li>• I can record my evaluations using drawings with labels.</li> <li>• I can evaluate against my original criteria and suggest ways that my product could be improved.</li> <li>• I can evaluate how much products cost to make and how innovative they are.</li> <li>• I can research and discuss how sustainable materials are.</li> <li>• I can consider the impact of products beyond their intended purpose.</li> </ul>
Suggested Outcome		Moving pictures to support the telling of a Traditional Tale		Opposing muscles / Skeleton – arm	Fabric Stocking showing various finishing techniques	Electrical interactive information box – showcase of Natural Disasters	Phone case that is fit for purpose
Subject Specific Vocabulary		Slider & Leavers: Mechanism, lever, slider, slot, pivot, guide/bridge, masking tape, fastener, pull/push, down, straight, work, design, evaluate, purpose		Leavers & linkages: Loose/fixed pivot, system, input, process	Aesthetics, seam allowance, pinning, embroidery, back/blanket/cross stitch, applique	Parallel circuit, light emitting diode, monitor, flowchart, design specification, reed switch, tilt switch	Annotate, evaluate, innovation, functionality, renewable, authentic, chain stitch.
Challenge		Can you use more than one mechanism?		Can you create a mechanical robot?	What else could you create using your new skills?	What adaptations would you make to your design and why?	How could you improve your product? What new skills do you need?

Spring 1		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Theme			Back to the Capital	Instructions (English / Trip)	Key Events and Individuals in DT	Key Events and Individuals in DT	Come Dine with Me <i>Seasonal Food</i> (DT)
Key Question			What role do shapes play in architecture?	What is your favourite fast food?	Tell me more about famous events and faces in Design and Technology.	Tell me more about famous events and faces in Design and Technology.	Can you showcase seasonal produce?
Key Content			<ul style="list-style-type: none"> <li>• To design a purposeful product based on design criteria</li> <li>• To communicate their ideas through drawing and ICT</li> <li>• To build a structure exploring how they can be made stronger, stiffer and more stable.</li> <li>• To select tools, equipment, and materials according to their characteristics</li> <li>• To evaluate product against design criteria</li> </ul>	<ul style="list-style-type: none"> <li>• Understand and apply the principles of a healthy and varied diet</li> <li>• Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques</li> </ul>	<ul style="list-style-type: none"> <li>• Understand how key events and individuals in design and technology have helped shape the World</li> </ul>	<ul style="list-style-type: none"> <li>• Understand how key events and individuals in design and technology have helped shape the World</li> </ul>	<ul style="list-style-type: none"> <li>• Understand and apply the principles of a healthy and varied diet</li> <li>• Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques</li> <li>• Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed</li> </ul>
Skills	Design		<ul style="list-style-type: none"> <li>• I can identify a purpose for what I intend to design and make.</li> <li>• I can identify simple design criteria.</li> <li>• I can generate ideas through talk and drawing based on my own, and others' experiences.</li> <li>• I can develop my design ideas through discussion, observation, drawing and modelling.</li> <li>• I can make simple drawings and label parts.</li> </ul>	<ul style="list-style-type: none"> <li>• I can discuss where different foods come from (e.g. foods which are farmed, grown elsewhere (e.g. home) or caught) and also food native to different countries.</li> <li>• I can record a recipe.</li> </ul>	<ul style="list-style-type: none"> <li>• I can independently research using books, newspapers and ICT about key events and / or key inventors/designers/engineers of ground-breaking products.</li> </ul>	<ul style="list-style-type: none"> <li>• I can use a variety of sources to learn about a specific event within my theme 'Space'</li> </ul>	<ul style="list-style-type: none"> <li>• I can explain how ingredients were grown, reared, and caught.</li> <li>• I can explain how seasons may affect the food available.</li> <li>• I can plan a healthy and affordable diet.</li> <li>• I can plan a meal, record a recipe, and write a description for the consumer.</li> </ul>
	Make		<ul style="list-style-type: none"> <li>• I am beginning to select tools and materials, using the correct vocabulary to name and describe them.</li> <li>• I can measure, cut, and score with some accuracy.</li> <li>• I can use hand tools safely and appropriately.</li> <li>• I can assemble, join, and combine materials to make structure.</li> <li>• I can choose and use appropriate finishing techniques in line with my design criteria.</li> </ul>	<ul style="list-style-type: none"> <li>• I can prepare simple dishes safely and hygienically, without using a heat source.</li> <li>❖ KNIFE SKILLS Claw knife technique – harder foods e.g. carrot Peeling soft vegetables e.g. courgette</li> <li>❖ WEIGHING AND MEASURING Using digital or spring balance scales</li> <li>❖ BAKING SKILLS Adding liquid to flour Cutting out rolled pastry</li> </ul>			<ul style="list-style-type: none"> <li>• I can prepare and cook a variety of predominantly savoury dishes safely and hygienically including the use of a heat source.</li> <li>• I can use a range of techniques such as peeling, chopping, slicing, grating, mixing, spreading, kneading, and baking.</li> <li>• Previous skills, but to also include the following:</li> <li>❖ KNIFE SKILLS Fine chopping of herbs Peeling e.g. carrots.</li> </ul>

				❖ OTHER SKILLS Draining through a sieve or colander			
	Evaluate		<ul style="list-style-type: none"> <li>• I can evaluate my structure against my design criteria, including it's purpose.</li> <li>• I can evaluate my product as it is developed, identifying strengths and possible changes I might make.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate my food product and consider if I would make changes to my original recipe.</li> </ul>			<ul style="list-style-type: none"> <li>• I can evaluate a meal and consider if they contribute towards a balanced diet.</li> <li>• I can evaluate my meal and ask others to evaluate it against the description I created</li> </ul>
Suggested Outcome			Timber Framed House	Pizza dough Trip to Pizza Express	Information booklet or presentations shared with others	Information booklet or presentations shared with others	Seasonal 2 / 3 course meal
Subject Specific Vocabulary			Freestanding Structures: Structure, base, underneath, thicker, thinner, corner, point, straight, curved, rectangle, cube, cuboid, cylinder	Healthy & Varied Diet: Texture, taste, appearance, preference, greasy, moist, fresh, savoury, hygienic, edible, grown, reared, caught, frozen, tinned, processed, seasonal, harvested, kneaded			Celebrating Culture & Seasonality: Ingredients, yeast, dough, wholemeal, unleavened, baking soda, spice, herbs, carbohydrate, sugar, fat, protein, vitamins, nutrients, gluten, allergy, intolerance, savoury, seasonality, pour, mix, knead, whisk, beat, combine, fold, rubbing in
Challenge			Can you research about a Timber Framed house that still stands today?	Can you research healthy pizzas? What did you learn?	Tell me more about famous events and faces in Design and Technology.	Who else played a role in Design and Technology in Space exploration?	Can you plan a 3-course menu from a different season? Will you include dishes from other cultures?



Spring 2		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Theme		Africa Is not a country		Isle of Coll	It's a problem free Philosophy	Space – Is there anybody out there?	Playgrounds (DT)
Key Question		How do structures create a sense of security?		How are Fabrics constructed?	How can you display your message for everyone to see?	How can you travel across the moon?	How many different structures on a Playground?
Key Content		<ul style="list-style-type: none"> <li>To design a purposeful and functional product based on given criteria</li> <li>To build structures selecting tools, equipment, and materials</li> <li>To evaluate product against design criteria</li> </ul>		<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of functional, appealing products that are fit for purpose</li> <li>Develop, model and communicate ideas.</li> <li>Select from wider range of tools and equipment for practical tasks</li> <li>Select from wider range of materials according to functional properties and aesthetic qualities</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, functional, appealing products that are fit for purpose, aimed at individuals or groups</li> <li>Develop, model and communicate ideas, including the use of CAD</li> <li>Select from wider range of tools and equipment for practical tasks</li> <li>Select from wider range of materials and components according to functional properties and aesthetic qualities</li> <li>Understand and use electrical systems</li> <li>Investigate and analyse a range of existing products</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, functional products that are fit for purpose</li> <li>Develop, model and communicate ideas, including the use of CAD</li> <li>Select from wider range of tools and equipment for practical tasks</li> <li>Select from wider range of materials and components according to functional properties</li> <li>Understand and use mechanical systems in their products</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, functional, appealing products that are fit for purpose, aimed at individuals or groups</li> <li>Develop, model and communicate ideas, including the use of CAD</li> <li>Select from wider range of tools and materials for practical tasks</li> <li>Apply understanding of how to strengthen, stiffen and reinforce more complex structures</li> <li>Investigate and analyse a range of existing products</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>
Skills	Design	<ul style="list-style-type: none"> <li>I can identify a target group for the structure I intend to design and make.</li> <li>I can generate ideas through talk and drawing based on my own experiences.</li> <li>I can design purposeful, functional, and appealing products for myself and others, based on given design criteria.</li> <li>I can model my ideas in card and paper.</li> </ul>		<ul style="list-style-type: none"> <li>I can identify a purpose and establish criteria for a successful product.</li> <li>I can generate ideas for an item, considering its purpose and the user/s.</li> <li>I can plan the order of my work before starting</li> <li>I can explore, develop, and communicate design proposals by modelling ideas.</li> <li>I can make drawings with labels when designing.</li> <li>I am beginning to use computers to show my design.</li> </ul>	<ul style="list-style-type: none"> <li>I can identify a purpose for what I intend to design and make, based on my research.</li> <li>I can identify the design criteria for my product.</li> <li>I can generate ideas through talk and drawing based on my own, and others' experiences.</li> <li>I can develop my design ideas through discussion, drawing, annotating, and modelling.</li> <li>I can make simple drawings and label parts.</li> <li>I can identify which materials would be best for my product and give reasons why.</li> <li>I can explain how my light up sign will work.</li> </ul>	<ul style="list-style-type: none"> <li>I can generate ideas through brainstorming and identify a purpose for my product.</li> <li>I can draw up a specification for my design, using cross-sectional planning and annotated sketches.</li> <li>I can develop a clear idea of what must be done, planning how to use materials, equipment, and processes, and suggesting alternative methods of making if the first attempts fail.</li> <li>I can research / explore using pulleys and / or gears.</li> <li>I can use results of investigations, information sources, including ICT when developing design ideas.</li> <li>I can use computer-aided designs</li> </ul>	<ul style="list-style-type: none"> <li>I can communicate my ideas through detailed labelled drawings, including cross-sectional planning and annotated sketches.</li> <li>I can develop my own detailed design specification.</li> <li>I can explore, develop, and communicate aspects of my design proposals by modelling my ideas in a variety of ways.</li> <li>I can plan the order of my work, choosing appropriate materials, tools, and techniques</li> <li>I can clearly explain how parts of design will work, and how they are fit for purpose</li> <li>I can come up with innovative design ideas</li> </ul>
	Make	<ul style="list-style-type: none"> <li>I can make my design using appropriate techniques.</li> </ul>		<ul style="list-style-type: none"> <li>I can select tools and techniques for making my product.</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate tools and techniques for making my product.</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate materials, tools and techniques fit for purpose; explain choices, considering functionality.</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate tools, materials, components, and techniques, explaining choices,</li> </ul>

		<ul style="list-style-type: none"> <li>• With help, I can measure, mark out, cut and shape a range of materials.</li> <li>• I can use tools safely, with guidance.</li> <li>• I can assemble, join and combine materials and components together using a variety of temporary methods e.g. masking tape, rope.</li> <li>• I can use simple finishing techniques to improve the appearance of my structure.</li> </ul>		<ul style="list-style-type: none"> <li>• I can measure, mark out, cut, score, and assemble components with more accuracy.</li> <li>• I can work safely and accurately with a range of simple tools.</li> <li>• I can think about my ideas as I make progress and be willing change things if this helps me improve my work.</li> <li>• I can measure, tape or pin, cut and join fabric with some accuracy.</li> </ul>	<ul style="list-style-type: none"> <li>• I can measure, mark out, cut and shape a range of materials, using appropriate tools, equipment, and techniques with increasing accuracy.</li> <li>• I can join and combine materials and components accurately in temporary and permanent ways.</li> </ul>	<ul style="list-style-type: none"> <li>• I can create and follow a detailed step-by-step plan.</li> <li>• I can measure and mark out accurately.</li> <li>• I can use a range of skills using different tools and equipment safely and accurately.</li> <li>• I can use a mechanical system within my final product.</li> <li>• I am beginning to be resourceful with practical problems.</li> </ul>	<ul style="list-style-type: none"> <li>considering functionality and aesthetics.</li> <li>• I can assemble components and make working models.</li> <li>• I can use tools safely and accurately.</li> <li>• I can construct products using permanent joining techniques.</li> <li>• I can make modifications as I go along.</li> <li>• I can accurately apply a range of finishing techniques.</li> <li>• I can be resourceful with practical problems.</li> </ul>
	Evaluate	<ul style="list-style-type: none"> <li>• I can evaluate my structure by discussing how well it works in relation to the purpose.</li> <li>• I can evaluate my structure as it is developed, identifying strengths and possible changes I might make.</li> <li>• I can evaluate my structure by asking questions about what I have made and how I have gone about making it.</li> </ul>		<ul style="list-style-type: none"> <li>• I am beginning to evaluate existing products, considering: how well they have been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate my product against original design criteria e.g. how well it meets its intended purpose.</li> <li>• I am beginning to learn about some inventors/designers/engineers/chefs/ manufacturers of ground-breaking products.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate existing products, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate my work both during and at the end of the assignment.</li> <li>• I can evaluate my product carrying out appropriate tests, referring to my design criteria.</li> <li>• I can research whether products can be recycled or reused.</li> <li>• I can talk about some key inventors/designers of ground-breaking products.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate and discuss existing products, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate a product against the original design specification, considering purpose and appearance.</li> <li>• I can evaluate my product personally and seek evaluation from others.</li> <li>• I can talk about some key inventors/designers/ engineers of ground-breaking products</li> </ul>	<ul style="list-style-type: none"> <li>• I can record my evaluations using drawings with labels.</li> <li>• I can evaluate against my original criteria and suggest ways that my product could be improved.</li> <li>• I can evaluate how innovative my structure is.</li> <li>• I can research and discuss how sustainable materials are.</li> <li>• I can consider the impact of structures beyond their intended purpose.</li> </ul>
Suggested Outcome		3D Den for at least one person		Tartan / Woven fashion item	Light up sign	Moon Buggies	Playground model with different pieces of working equipment
Subject Specific Vocabulary		Freestanding Structures: Cut, fold, join, fix, weak, strong		Fastening, compartment, zip, finishing technique, function, prototype, back stitch, felted, woven, bonded.	Series circuit, connection, push-to-make switch, pushto-break switch, innovative, appealing, control box, input device, output device, system	Pulleys or Gears: Pulley, gear, driver, follower, rotation, motor, belt, spindle, motor, circuit, switch, ratio, transmit, annotated drawings, exploded diagrams, functionality	Frame Structures: Reinforce, triangulation, stability, temporary, permanent, prototype, innovation, functional, design brief
Challenge		How would you adapt your Den and why?		Can you find out more about the history of 'Tartan'?	How would you change your design for a different audience?	Can you find out more about the engineers who are developing space travel today?	Can you design a new piece of playground equipment using recycled materials?

Summer 1		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Theme		Hurray, we're going on holiday!	Holy Guacamole	Stone Age	The Attenborough Affect	World War II	The Astonishing Amazon
Key Question		Where can I find healthy food for a picnic?	What are the different Fashion trends around the World?	How can you see your way out of the cave?	What is a greenhouse? What features do they have? Why are they needed?	How were dolls from World War 2 different from today?	How can you make animal models move?
Key Content		<ul style="list-style-type: none"> <li>To use the basic principles of a healthy and varied diet to prepare dishes</li> <li>To understand where food comes from</li> </ul>	<ul style="list-style-type: none"> <li>To design an appealing product based on given criteria</li> <li>To make a product selecting tools, equipment, and materials</li> <li>To explore and evaluate existing products</li> <li>To evaluate product against design criteria</li> </ul>	<ul style="list-style-type: none"> <li>Develop design criteria to inform the design of functional, products that are fit for purpose</li> <li>Develop, model and communicate ideas, including the use of CAD</li> <li>Select from wider range of tools, materials, and components</li> <li>Understand and use electrical systems</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, functional products that are fit for purpose</li> <li>Develop, model and communicate ideas</li> <li>Select from wider range of tools and materials according to functional properties</li> <li>Apply understanding of how to strengthen, stiffen and reinforce more complex structures</li> <li>Investigate and analyse a range of existing products</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of appealing products that are fit for purpose, aimed at individuals or groups</li> <li>Develop, model and communicate ideas</li> <li>Select from wider range of tools and materials according to functional properties and aesthetic qualities</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, appealing products that are fit for purpose, aimed at individuals or groups</li> <li>Develop, model and communicate ideas, including the use of CAD</li> <li>Select from wider range of tools, materials and components according to functional properties and aesthetic qualities</li> <li>Understand and use mechanical systems in their products</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>
Skills	Design	<ul style="list-style-type: none"> <li>I am beginning to develop a food vocabulary using taste, smell, texture and feel.</li> <li>I can explore familiar food products e.g. fruit and vegetables.</li> <li>I can share my ideas through pictures and labels.</li> </ul>	<ul style="list-style-type: none"> <li>I can identify a purpose for what I intend to design and make.</li> <li>I can identify simple design criteria.</li> <li>I can develop my design ideas through discussion, observation, drawing and modelling.</li> <li>I can make simple drawings and label parts.</li> </ul>	<ul style="list-style-type: none"> <li>I can identify a purpose and establish criteria for a successful product from the task given.</li> <li>I can generate ideas for an item, considering its purpose and the user/s.</li> <li>I can explore, develop and communicate design proposals by modelling ideas.</li> <li>I can make drawings with labels when designing.</li> <li>I am beginning to use computers to show my design.</li> </ul>	<ul style="list-style-type: none"> <li>I can identify a purpose for what I intend to design and make, based on my research.</li> <li>I can identify the design criteria for my Greenhouse.</li> <li>I can generate ideas through talk and drawing based on my own, and others' experiences.</li> <li>I can make simple drawings and label parts, creating prototypes where necessary.</li> <li>I can identify which materials would be best for my structure and give reasons why.</li> <li>I can explain how my mini greenhouse will work.</li> </ul>	<ul style="list-style-type: none"> <li>I can generate ideas through brainstorming and identify a purpose for my product.</li> <li>I can draw up a specification for my design, using cross-sectional planning and annotated sketches.</li> <li>I can develop a clear idea of what must be done, planning how to use materials, equipment, and processes, and suggesting alternative methods of making if the first attempts fail.</li> <li>I can use results of investigations, information sources, including ICT when developing design ideas.</li> </ul>	<ul style="list-style-type: none"> <li>I can communicate my ideas through detailed labelled drawings, including cross-sectional planning and annotated sketches.</li> <li>I can develop my own detailed design specification.</li> <li>I can explore, develop, and communicate aspects of my design proposals by modelling my ideas in a variety of ways.</li> <li>I can plan the order of my work, choosing appropriate materials, tools and techniques.</li> <li>I can clearly explain how parts of design will work, and how they are fit for purpose</li> <li>I can come up with innovative design ideas</li> </ul>
	Make	<ul style="list-style-type: none"> <li>I can work safely and hygienically, with support.</li> <li>I can measure and weigh food items, non-statutory measures e.g. spoons, cups.</li> </ul>	<ul style="list-style-type: none"> <li>I am beginning to select tools and materials, using the correct vocabulary to name and describe them.</li> <li>I can measure, cut, and score with some accuracy.</li> </ul>	<ul style="list-style-type: none"> <li>I can select tools and techniques for making my product.</li> <li>I can measure, mark out, cut, score, and assemble</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate tools and techniques for making my structure.</li> <li>I can measure, mark out, cut and shape a range of materials, using appropriate</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate materials, tools and techniques fit for purpose; explain choices, considering functionality.</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate tools, materials, components and techniques, explaining choices, considering functionality and aesthetics.</li> </ul>



		<ul style="list-style-type: none"> <li>❖ KNIFE SKILLS Claw knife technique – soft foods e.g. cucumber Snipping herbs in a jug using scissors</li> <li>❖ OTHER SKILLS Mashing</li> </ul>	<ul style="list-style-type: none"> <li>• I can use hand tools safely and appropriately.</li> <li>• I can cut, shape, and join fabric to make a simple garment. I can use basic sewing techniques.</li> <li>• I can choose and use appropriate finishing techniques.</li> </ul>	<ul style="list-style-type: none"> <li>components with more accuracy.</li> <li>• I can work safely and accurately with a range of simple tools.</li> <li>• I can use finishing techniques, strengthen and improve the appearance of my product using a range of equipment.</li> </ul>	<ul style="list-style-type: none"> <li>tools, equipment, and techniques with increasing accuracy.</li> <li>• I can join and combine materials and components accurately in temporary and permanent ways</li> </ul>	<ul style="list-style-type: none"> <li>• I can create and follow detailed step-by-step plan.</li> <li>• I can measure and mark out accurately.</li> <li>• I can use a range of skills using different tools and equipment safely and accurately.</li> <li>• I can cut and join with accuracy to ensure a good-quality finish to the product.</li> <li>• I am beginning to be resourceful with practical problems, repairing any holes or gaps.</li> </ul>	<ul style="list-style-type: none"> <li>• I can assemble components and make working models.</li> <li>• I can use tools safely and accurately.</li> <li>• I can construct products using permanent joining techniques.</li> <li>• I can make modifications as I go along.</li> <li>• I can achieve a quality product.</li> <li>• I can accurately apply a range of finishing techniques.</li> <li>• I can be resourceful with practical problems.</li> </ul>
	Evaluate	<ul style="list-style-type: none"> <li>• I can evaluate my food product saying what I like and dislike.</li> <li>• I am beginning to talk about the need for a variety of foods in a diet.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate my product against my design criteria</li> <li>• I can evaluate my product, identifying strengths and possible changes I might make.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate my product against original design criteria e.g. how well it meets its intended purpose.</li> <li>• I am beginning to learn about some inventors/designers/engineers/chefs/manufacturers of ground-breaking products</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate existing products, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate my work both during and at the end of the assignment.</li> <li>• I can evaluate my structure carrying out appropriate tests, referring to my design criteria.</li> <li>• I am beginning to explain how and why I could improve my original design.</li> <li>• I can research whether products can be recycled or reused.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate and discuss existing products, considering: how well they've been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate a product against the original design specification, considering purpose, appearance, and their constraints with materials (availability during WW II).</li> <li>• I can evaluate my product personally and seek evaluation from others.</li> <li>• I am beginning to evaluate how much products cost to make and how innovative they are</li> <li>• I can reflect on availability and cost of materials during World War II.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate my product, identifying strengths and areas for development, and carrying out appropriate tests.</li> <li>• I can record my evaluations using drawings with labels.</li> <li>• I can evaluate against my original criteria and suggest ways that my product could be improved.</li> <li>• I can research and discuss how sustainable materials are.</li> <li>• I can consider the impact of products beyond their intended purpose.</li> </ul>
Suggested Outcome		Sandwiches and salads	Mexican poncho for a teddy / doll	Torch / light	Mini-Greenhouse to grow seeds successfully	World War II Doll using recycled materials	An automata animal which is a hand powered mechanical toy
Subject Specific Vocabulary		Preparing Fruit & Vegetables: Fruit, vegetables, soft, juicy, crunchy, sticky, smooth, sharp, crisp, sour hard, flesh, skin, seed pip, core, slicing, peeling, cutting, squeezing, healthy diet, choosing, ingredients, planning, tasting, arranging	Template, quality, suitable, features, overstretch, design, fray, mock-up, seam.	User, fault, toggle switch, circuit, insulator, conductor, battery holder, crocodile clip	Shell Structures: Assemble, prism, vertex, breadth, capacity, scoring, adhesives, reduce, reuse, recycle, corrugating, ribbing, laminating	Specification, tacking, working drawing, clasp, pinking shears, design criteria, hem, reinforce, stem stitch, satin stitch.	Pulleys or Gears: Transmit, annotated drawings, exploded diagrams, functionality
Challenge		Can you think of other healthy combinations for a sandwich?	What changes would you need to make to your design to make a Poncho for an adult?	Can you change how bright your torch / light shines?	How could you adapt your design on a larger scale?	Can you explain the differences between your doll and those made during World War II?	What other movement could you include in your design?

Summer 2		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Theme			Holy Guacamole	Romans	The Attenborough Affect	World War II	Electrical Games (DT)
Key Question			How do we make a Mexican feast?	How can you transport water?	What is ready to eat in the garden?	Limited ingredients, what can you cook?	Can you create an interactive game?
Key Content			<ul style="list-style-type: none"> <li>To use the basic principles of a healthy and varied diet to prepare dishes</li> <li>To understand where food comes from</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, functional products that are fit for purpose</li> <li>Develop, model and communicate ideas, including the use of CAD</li> <li>Select from wider range of tools, equipment, and materials for practical tasks according to functional properties</li> <li>Apply understanding of how to strengthen, stiffen and reinforce more complex structures</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>	<ul style="list-style-type: none"> <li>Understand and apply the principles of a healthy and varied diet</li> <li>Prepare and cook predominantly savoury dishes using a range of cooking techniques</li> <li>Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed</li> </ul>	<ul style="list-style-type: none"> <li>Understand and apply the principles of a healthy and varied diet</li> <li>Prepare and cook predominantly savoury dishes using a range of cooking techniques</li> <li>Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed</li> </ul>	<ul style="list-style-type: none"> <li>Use research and develop design criteria to inform the design of innovative, functional products that are fit for purpose, aimed at individuals or groups</li> <li>Develop, model and communicate ideas</li> <li>Select from wider range of tools, materials and components according to functional properties</li> <li>Understand and use electrical systems</li> <li>Investigate and analyse a range of existing products</li> <li>Evaluate their products against own criteria and consider views of others to improve their work</li> </ul>
Skills	Design		<ul style="list-style-type: none"> <li>I am beginning to name and sort foods into the five groups (e.g. 'The Eat well plate')</li> <li>I can design a meal using my knowledge of foods from another country and share this in a labelled diagram.</li> <li>I can list ingredients.</li> </ul>	<ul style="list-style-type: none"> <li>I can identify a purpose and establish criteria for a successful product.</li> <li>I can generate ideas for an item, considering its purpose and the user/s.</li> <li>I can plan the order of my work before starting.</li> <li>I can explore, develop, and communicate design proposals by modelling ideas.</li> <li>I can make drawings with labels when designing.</li> <li>I am beginning to use computers to show my design.</li> </ul>	<ul style="list-style-type: none"> <li>I can discuss how a healthy diet is made up from a variety and balance of different food and drink.</li> <li>I can identify foods which come from the UK and other countries in the world</li> <li>I can plan a main meal using my knowledge of seasonal ingredients.</li> <li>I can record a simple recipe that someone else could follow.</li> </ul>	<ul style="list-style-type: none"> <li>I am beginning to understand that seasons may affect the food available.</li> <li>I can talk about how food is processed into ingredients that can be eaten or used in cooking.</li> <li>I can plan a meal, within the constraints set.</li> <li>I can record a recipe that someone else could follow.</li> </ul>	<ul style="list-style-type: none"> <li>I can communicate my ideas through detailed labelled drawings, including cross-sectional planning and annotated sketches.</li> <li>I can develop my own detailed design specification.</li> <li>I can plan the order of my work, choosing appropriate materials, tools and techniques.</li> <li>I can make design decisions, considering, resources and/or cost</li> <li>I can clearly explain how parts of my design will work, and how they are fit for purpose.</li> <li>* I can come up with innovative design ideas</li> </ul>
	Make		<ul style="list-style-type: none"> <li>I can prepare simple dishes safely and hygienically, without using a heat source.</li> <li>❖ KNIFE SKILLS Bridge knife technique – harder foods with a round bladed knife Grating soft foods e.g. courgette, cheese</li> </ul>	<ul style="list-style-type: none"> <li>I can select tools and techniques for making my structure.</li> <li>I can measure, mark out, cut, score, and assemble components with more accuracy.</li> </ul>	<ul style="list-style-type: none"> <li>I can prepare and cook a dish, including use of a heat source.</li> <li>❖ KNIFE SKILLS Grating harder foods e.g. carrot, apple</li> <li>❖ BAKING SKILLS Separating an egg</li> </ul>	<ul style="list-style-type: none"> <li>I can prepare and cook a variety of predominantly savoury dishes including the use of a heat source.</li> <li>❖ KNIFE SKILLS Simple combination of bridge and claw e.g. onion Coring an apple Fine</li> </ul>	<ul style="list-style-type: none"> <li>I can select appropriate tools, materials, components and techniques, explaining choices, considering functionality and aesthetics.</li> <li>I can assemble components and make working models.</li> </ul>



			<ul style="list-style-type: none"> <li>❖ WEIGHING AND MEASURING Using a jug to measure liquids</li> <li>❖ BAKING SKILLS Cutting fat into flour Cracking an egg Beating an egg Rubbing fat into flour Mixing to form bread dough Handling and rolling puff pastry</li> <li>❖ OTHER SKILLS Spreading with a table knife e.g. butter Crushing garlic Shaping</li> </ul>	<ul style="list-style-type: none"> <li>• I can work safely and accurately with a range of simple tools.</li> <li>• I can think about my ideas as I make progress and be willing change things if this helps me improve my work.</li> <li>• I can strengthen and improve the appearance of my structure using a range of equipment including ICT.</li> </ul>	Creaming fat and sugar Folding flour into creamed mixture Handling and rolling shortcrust pastry ❖ OTHER SKILLS Seasoning to taste	grating e.g. parmesan cheese, nutmeg. ❖ OTHER SKILLS Using the hob (only with adult supervision) e.g. to sweat vegetables for soup Whisking e.g. egg whites or cream	<ul style="list-style-type: none"> <li>• I can use tools safely and accurately.</li> <li>• I can construct products using permanent joining techniques.</li> <li>• I can make modifications as I go along</li> <li>• I can achieve a quality product.</li> <li>• I can accurately apply a range of finishing techniques.</li> <li>• I can be resourceful with practical problems.</li> </ul>
	Evaluate		<ul style="list-style-type: none"> <li>• I can evaluate my food product against criteria given.</li> </ul>	<ul style="list-style-type: none"> <li>• I am beginning to evaluate existing products, considering: how well they have been made, materials, whether they work, how they have been made, fit for purpose.</li> <li>• I can evaluate my structure against original design criteria e.g. how well it meets its intended purpose.</li> <li>• I can say what I would change to make my design better.</li> <li>• I am beginning to learn about architects of ground-breaking products.</li> </ul>	<ul style="list-style-type: none"> <li>• I can discuss what times of year particular foods are eaten in.</li> <li>• I can evaluate my product based on the criteria set.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate a meal and consider if it contributes towards a balanced diet.</li> <li>• I can describe what to do to be hygienic and safe.</li> <li>• I can evaluate my food product against the criteria and constraints set.</li> </ul>	<ul style="list-style-type: none"> <li>• I can evaluate my product, identifying strengths and areas for development, and carrying out appropriate tests.</li> <li>• I can evaluate against my original criteria and suggest ways that my product could be improved.</li> <li>• I can evaluate how much products cost to make and how innovative they are.</li> </ul>
Suggested Outcome			Mexican meal for the family	Aqueduct that carries water successfully	Seasonal main meal	World War II Rationing Menu and Meal	Steady Hand game
Subject Specific Vocabulary			Preparing Fruit & Vegetables: Fruit, vegetables, soft, juicy, crunchy, sticky, smooth, sharp, crisp, sour hard, flesh, skin, seed pip, core, slicing, peeling, cutting, squeezing, healthy diet, choosing, ingredients, planning, tasting, arranging, kneading	Shell Structures: Shell, structure, net, marking out, material, joining, three dimensional, stiff	Healthy & Varied Diet: Texture, taste, appearance, preference, greasy, moist, fresh, savoury, hygienic, edible, grown, reared, caught, frozen, tinned, processed, seasonal, harvested	Celebrating Culture & Seasonality: Ingredients, yeast, dough, wholemeal, unleavened, baking soda, spice, herbs, carbohydrate, sugar, fat, protein, vitamins, nutrients, gluten, allergy, intolerance, savoury, seasonality, pour, mix, knead, whisk, beat, combine, fold, rubbing in	Light dependent resistor, interface control, micro switch, latching switch
Challenge			Can you find out about other Mexican dishes?	Explain any challenges you had in building your Aqueduct. What have you learnt?	Select a different season. What main meal would you plan and make?	Can you create a book of recipes that all have one ingredient in common?	Can you design a new innovative game using what you have learnt?