



PROGRESSION IN DESIGN TECHNOLOGY

		Reception	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 6
DESIGN TECHNOLOGY			<p>Construction-aeroplanes</p> <p>Mechanisms- rain catcher/weather vane</p>	<p>Textiles - gifts</p> <p>Mechanisms – draw bridges</p>	<p>Construction – biscuit box</p> <p>Mechanisms - catapult</p>	<p>Textiles – pencil case</p> <p>Construction – Long boat</p>	<p>Textiles-sewing</p> <p>Mechanisms - levers</p>	<p>Construction – paper circuits</p> <p>Textiles - evaluating</p>
			<ul style="list-style-type: none"> State the purpose of the design and the intended user Generate own ideas for design 	<ul style="list-style-type: none"> State the purpose of the design and the intended user Explore materials, make templates 	<ul style="list-style-type: none"> Share and clarify ideas through discussion Model their ideas using prototypes and pattern pieces Gather information about the needs and wants of individuals and groups 	<ul style="list-style-type: none"> Use annotated sketches, cross-sectional drawings and diagrams Use computer-aided design Develop their own design criteria and use these to inform their ideas Research designs 	<ul style="list-style-type: none"> Generate innovative ideas, drawing on research Carry out research, using surveys, interviews, questionnaires and web-based resources -Identify the needs, wants, preferences and values of particular individuals and groups 	<ul style="list-style-type: none"> Develop prototypes Develop a simple design specification to guide their thinking Recognise when their products have to fulfil conflicting requirements
	<p>Constructs with a purpose in mind, using a variety of resources.</p> <p>Uses simple tools and techniques competently and appropriately.</p> <p>Selects tools and techniques needed to shape, assemble and join materials</p>		<ul style="list-style-type: none"> Select from a range of tools and equipment explaining their choices Follow procedures for safety Use simple fixing materials e.g. temporary – paper clips tape and permanent 	<ul style="list-style-type: none"> Select from a range of materials and components according to their characteristics Use and make own templates Measure, mark out, cut out and shape materials and components Follow safety procedures 	<ul style="list-style-type: none"> Select tools and equipment suitable for the task Measure, mark out, cut and shape materials and components with some accuracy Assemble, join and combine materials and components with some accuracy Follow safety procedures 	<ul style="list-style-type: none"> Explain their choice of tools and equipment in relation to the skills and techniques they will be using Apply a range of finishing techniques, include those from art and design, with some accuracy Follow safety procedures 	<ul style="list-style-type: none"> Select and explain materials and components suitable for the task Accurately assemble, join and combine materials/components Follow safety procedures 	<ul style="list-style-type: none"> Accurately measure to nearest mm, mark out, cut and shape materials and components Use techniques that involve a number of steps Follow safety procedures
			<ul style="list-style-type: none"> Talk about their design ideas and what they are making Suggest how their products could be improved Investigate existing products- what products are, who they are for 	<ul style="list-style-type: none"> Make simple judgements about products and ideas against design criteria Evaluate products and components used Investigate existing products- how they are made and what materials are used 	<ul style="list-style-type: none"> Identify the strengths and weaknesses of their ideas and products Investigate existing products - how well products have been designed, how well products have been made 	<ul style="list-style-type: none"> Consider the views of others, including intended users, to improve their work Investigating existing products - why materials have been chosen 	<ul style="list-style-type: none"> Compare their ideas and products to their original design specification Investigate existing products - who designed and made the products, where products were designed and made, when products were designed and made and whether products can be recycled or reused 	<ul style="list-style-type: none"> Critically evaluate the quality of the design, manufacture and fitness for purpose of their products as they design and make Investigate existing products - how much products cost to make, how innovative products are and how sustainable the materials in products are

			YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 6
		TECHNICAL KNOWLEDGE	<ul style="list-style-type: none"> Understand how freestanding structures can be made stronger, stiffer and more stable Understand about the movement of simple mechanisms such as levers and sliders Know how to prepare simple dishes safely and hygienically, without using a heat source 	<ul style="list-style-type: none"> Understand about the movement of simple mechanisms including wheels and axis Assemble and join materials Understand the basic principles of a healthy and varied diet 	<ul style="list-style-type: none"> Understand how levers and linkages or pneumatic systems create movement Understand how to construct a box using the correct tools and methods Know that a healthy diet is made up from a variety and balance of different foods and drinks, 	<ul style="list-style-type: none"> Know that a single fabric shape can be used to make a 3D textiles product Know how to make strong, stiff shell structures Know that food ingredients can be fresh, pre-cooked and processed 	<ul style="list-style-type: none"> Know that a 3D textiles product can be made from a combination of fabric shapes Know how a recipe can be adapted Understand how mechanical systems such as pulleys, cams and gears can create movement 	<ul style="list-style-type: none"> Understand more complex electrical circuits Understand how a computer program can monitor and control products Know that different foods contain different substances -Investigate and analyse textile products
		VOCABULARY	<ul style="list-style-type: none"> Construction – cut, fold, join, fix, structure, weak, strong, side, edge, surface, thicker, thinner, straight, curved, point, square, triangle, square, rectangle, cuboid, cube design Mechanisms – planning, investigating, design, evaluate, make, user purpose, ideas product Evaluate - planning, investigating design, evaluate, make, user, purpose, ideas, product, 	<ul style="list-style-type: none"> Textiles – fabric, felt, cotton, structure, template, purpose, glue, model, design, sketch, function, thread, needle, stitch Mechanisms -slider, lever, pivot, slot, bridge/guide, card, masking tape, paper fastener, join, pull, push, up, down, straight, curve, forwards, backwards Evaluate - investigating, planning, design, make, evaluate, user, purpose, ideas, design criteria, product, function 	<ul style="list-style-type: none"> Constructions – 3-D, shape, net, cube, cuboid, prism, vertex, edge, face, length, width, breadth, capacity, marking out, scoring, tabs, joining, adhesive, accuracy, stiff, strong, design Mechanisms -mechanism, lever, bucket, linkage, pivot, slot, arm, payload, frame, restraining rope, bucket Evaluate -user, purpose, design, model, evaluate, prototype, annotated sketch, functional, innovative, investigate, label, drawing, function, planning, design criteria, annotated sketch, appealing 	<ul style="list-style-type: none"> Textiles – fabric, compartment, button, structure, strength, weakness, stiffening, purpose, design, model, pattern, thread, sew, stitch Construction – shell structure, three-dimensional (3-D) shape, capacity, marking out, scoring, shaping, tabs, adhesives, joining, assemble, accuracy, material, stiff, strong, reduce, reuse, recycle, corrugating Evaluate - evaluating, design brief design criteria, innovative, prototype, user, purpose, function, prototype, design criteria, innovative, appealing, design brief, planning, annotated sketch, sensory evaluations 	<ul style="list-style-type: none"> Textiles – thread, design, stitch, sew, felt, materials. fancy wool, pattern, overstretch, running stitch, wadding, evaluate, needles Mechanisms – mechanism, lever, pivot, function, purpose, slot, system, design Evaluate - design decisions, functionality, authentic, user, purpose, design specification, design brief, innovative, research, evaluate, design criteria, annotate, evaluate, mock-up, prototype 	<ul style="list-style-type: none"> Construction – paper circuit, series circuit, parallel circuit, switches, input device, output device, system, function, design, specification Textiles – evaluate, fair trade, function, innovative, design specification, purpose design specification, prototype, annotated sketch, purpose, innovation, research, Evaluate - function, innovative, design specification, design brief, user, purpose design brief, design specification, prototype, annotated sketch, purpose, user, innovation, research, functional, mock-up, prototype
		ADDITIONAL ACTIVITIES COOKING & NUTRITION	<ul style="list-style-type: none"> Understand where food comes from Name and sort foods into the five groups of the 'eat well' plate Know that everyone should eat at least five portions of fruit and vegetables every day 	<ul style="list-style-type: none"> Use appropriate equipment to weigh and measure ingredients Demonstrate how to prepare simple dishes safely and hygienically, without using a heat source. 	<ul style="list-style-type: none"> Begin to understand how to use a range of techniques such as peeling, chopping and slicing Discuss that the seasons may affect the food available 	<ul style="list-style-type: none"> Measure using grams Follow a recipe Use a range of techniques such as peeling, chopping and slicing 	<ul style="list-style-type: none"> Prepare and cook a savoury dish safely and hygienically including where appropriate, the use of heat source Measure accurately Know that food is grown (such as tomatoes), reared (such as pigs) and caught (such as fish) in the UK, Europe and the wider world 	<ul style="list-style-type: none"> Work out ratios in recipes Understand the need for correct storage Prepare and cook a variety of savoury dishes safely and hygienically using a heat source

Whole School Cooking Focus – Ready Steady Cook

			YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	YEAR 6
			Fruit Salad	Fruit Crumble -Autumn walk	Making soup	Make a bread-based product	Salad with a carbohydrate	Make a pizza
		VOCABULARY	Fruit, vegetables, soft, juicy, crunchy, sticky, smooth, sharp, crisp, sour, hard, fresh, skin, seed, pip, core, slicing, peeling, cutting, squeezing, healthy, tasting, diet, slice, spread		Ingredients, healthy, varied, diet, texture, taste, appearance, moist, dough, yeast, savoury, wholemeal, hygenic, edible, grown, reared, caught, frozen, tinned, processed, seasonal		Culture, ingredients, carbohydrate, herbs, gluten, sugar, fat, vitamins, protein, nutrients, unleavened, wholemeal, allergy, intolerance, savoury, seasonality, pour, mix, knead, whisk, beat, combine, fold, rubbing in	