National Curriculum	<u>Reception</u>	<mark>Year 1</mark>	<mark>Year 2</mark>	<mark>Year 3</mark>	<mark>Year 4</mark>	<mark>Year 5</mark>	<mark>Year 6</mark>
		Mechanisms: Make a	Structures: Design	Cooking &	Electronics: Design	Mechanisms &	Cooking &
		card with sliders, levers	and make an animal	Nutrition: Design and	and make a night light or	Pneumatics: Design	Nutrition: Design and
		and pivots.	shelter.	prepare a healthy packed	torch using a switch.	and make a moving toy.	create a dish to reflect a
		Structures: Build a	Textiles: Design and	lunch.	Cooking &	Cooking &	culture or celebration.
		bridge for the 3 Billy	make a puppet using	Mechanisms: Design	Nutrition: Combine	Nutrition: Make a	CAD: Design an
		Goats Gruff.	joining techniques.	and make a poster with	ingredients to make	soup from seasonal	outdoor shelter for the
		Cooking &	Cooking &	moving parts using levers	healthy pancakes or	ingredients.	school grounds.
		Nutrition: Prepare a	Nutrition: Design and	and links.	bread.	Control: Use a	Textiles: Design and
		Fruit salad, skewer or	prepare dips, salads and	Structures: Design	Structures &	computer control	make a fabric phone
		smoothie.	crudities.	and make a structure to keep something safe.	Mechanisms: Design	program to enable an	holder.
				keep something sale.	and make a playground for play people.	electrical product to work.	
					Tot play people.	WOIK.	
		21.11		d Nutrition			
	Children shou	Children shou Ild work confidently within a ra		abulary for the projects they ar me, school, leisure, culture, ent		environment.	
		,		dures for safety and hygiene.	, , , , , , , , , , , , , , , , , , , ,		
EYFS: Manage their own	Food Hygiene and safety:	Food Hygiene and safety:	Food Hygiene and safety:	Food Hygiene and safety:	Food Hygiene and safety:	Food Hygiene and safety:	Food Hygiene and safety:
basic hygiene and personal	Wash hands before and	Know the importance of	Explain why hygiene and	Describe how to maintain	Know about allergy and	Know about allergy and	Handle/cook meat safely,
needs, including dressing, going to the toilet, and	after cooking.	hand washing and cleaning preparation areas.	safe preparation procedures are important.	hygienic preparation areas. Identify and explain	intolerance and most likely foods to cause them.	intolerance and most likely foods to cause them.	understanding and avoiding cross contamination.
understanding the		Clean up after themselves	Clean preparation area well	safe/unsafe preparation	Explain some procedures to	Know that meat and	Follow safety and hygiene
importance of healthy food		with adult assistance.	after themselves with little	and hygienic practices.	follow for safety and	vegetables should be	procedures during food
choices			adult assistance		hygiene when preparing	prepared separately.	preparation and cooking.
Key stage 1 ♣ use the basic		Where Food Comes From:	Describe how to maintain hygienic preparation areas.		and cooking food.	Prepare and cook food safely and hygienically.	
principles of a healthy and		Know that all food comes	,, 8. c p. cpa. a a. cas.			Sarety and tryglerineatry.	
varied diet to prepare dishes	Where Food Comes From:	from plants or animals	Where Food Comes From:	Where Food Comes From:	Where Food Comes From:	Where Food Comes From:	Where Food Comes From:
♣ understand where food	Know that all food comes from plants or animals.	Know that food has to be farmed, grown elsewhere	Know that all food comes from plants or animals.	Know that food is grown (such as tomatoes, wheat	Know that food ingredients can be fresh, pre-cooked	Explain simply, the process of manufacturing mass	Name the source of different food products.
comes from.	Observe food grown in	(Eg, home) or caught.	Know that food has to be	and potatoes), reared (such	and processed from UK,	production of food.	Explain how seasons may
	school garden. Eg, beans	Make observations about	farmed, grown elsewhere	as pigs, chickens and cattle)	Europe and the wider	Know that seasonality	affect the food available.
Key stage 2 ♣ understand	and salad vegetables.	food grown in the school	(Eg, home) or caught.	and caught (such as fish) in	world.	affects what food can be	Describe how sustainable
and apply the principles of a		garden. Eg, vegetables and tomatoes.	Make observations about crops growing locally.	the UK, Europe and the wider world.	Explain how some foods are processed into ingredients	grown. Explore the costs of food	the materials in food products are.
healthy and varied diet * prepare and cook a variety		tomatoes.	Explain observations about	Describe how some foods	that can be eaten or used in	products.	Talk about how much
of predominantly savoury			food grown in school	are processed into	cooking.	·	products cost to make.
dishes using a range of			gardens. Eg fruit, herbs and	ingredients that can be			
cooking techniques •	Food Groups:	Food Groups:	root vegetables.	eaten fresh or used in cooking.		Food Groups:	
understand seasonality, and know where and how a	Know that some food you	Sort foods into the five	Food Groups:	COOKING.	Food Groups:	Name the 5 main food	Food Groups:
variety of ingredients are	can eat a lot, some a	groups in The Eatwell	Describe the five main food	Food Groups:	Explain what constitutes a	groups and explain their	Know that different food
grown, reared, caught and	limited amount.	Guide.	groups and their	Know that a healthy diet is	healthy, balanced meal as	role, as depicted in the	and drink contain different
processed	Know the difference between sweet and	Know that everyone should eat at least five portions of	importance to good nutrition.	made up from a variety and balance of different food	depicted in the 'Eatwell Guide'.	'Eatwell Guide'. Be aware that not everyone	substances - nutrients, water and fibre - that are
	savoury dishes.	fruit and vegetables every	Describe the importance of	and drink, as depicted in the	Describe the role of each of	eats meat, or meat products	needed for health.
		day.	five a day on nutrition.	'Eatwell Guide'.	the 5 main food groups.	and that there are meat	Explain what portions of
			Know the difference	Know that to be active and		substitutes.	different foods people
			between sweet and savoury	healthy, food and drink are needed to provide energy		Discuss how different food	should eat.
			dishes.	for the body.		and drink contain different substances - nutrients,	
						water and fibre - that are	
						needed for health.	

	Preparing Food	Preparing Food	Preparing Food	Preparing Food	Preparing Food	Preparing Food
	Design:	Design:	Design:	Design:	Design:	Design:
	Generate ideas by drawing	Use knowledge of existing	Explain why ingredients	Create a simple design	Explain that a recipe can be	Carry out research, using
	on their own experiences.	products to help come up	have been chosen.	specification to guide their	adapted by adding or	surveys, interviews,
	Use simple design criteria to	with and develop ideas.	Gather information about	thinking.	substituting one or more	questionnaires and web-
		•	the needs and wants of	Generate innovative ideas,	_	based resources.
	help develop their ideas.	Develop and communicate			ingredients. Discuss how the	
	Adalas	ideas by talking and	particular individuals and	drawing on research.		Identify the needs, wants,
	Make:	drawing.	groups.	Talk about how to adapt a	appearance, taste, texture	preferences and values of
	Make and prepare a fruit	Describe how well textures,	Develop their own design	recipe and how the	and aroma would be	particular individuals and
	skewer, fruit salad or fruit	appearance and flavours	criteria and use these to	appearance, taste, texture	changed.	group.
	smoothie.	may go with each other.	inform their idea.	and aroma would be	Make design decisions,	Make:
	Use techniques such as		Order the main stages of	changed.	taking account of	Create a dish to reflect a
	cutting, peeling and grating	Make:	making.	Make:	constraints such as time,	culture or celebration.
	safely with support.	Make and prepare delicious	Indicate the design features	Prepare and cook pancakes	resources and cost.	Accurately assemble, join
	Apply a range of techniques	dips, salads and crudities.	of their products that will	with different	Make:	and combine ingredients.
	for measuring out,	Assemble, join and combine	appeal to intended users.	accompaniments.	Prepare and cook a soup	Accurately apply a range of
	preparing and combining	ingredients with help.	Make:	Assemble and combine	using savoury ingredients.	finishing techniques.
	ingredients.	Select from a range of tools	Prepare and make a	ingredients with some	Use a heat source safely.	Use techniques that involve
	Use appropriate equipment	and equipment, explaining	balanced packed lunch.	accuracy.	Use a range of techniques	a number of steps.
	and utensils.	their choices.	Select tools and equipment	Use a heat source safely.	such as peeling, chopping,	Use a wider range of
		Use a range of techniques	suitable for the task.	Apply a range of finishing	slicing, grating, mixing,	ingredients and tools than
		such as peeling, chopping,	Assemble, join and combine	techniques, to make food	spreading, kneading and	Lower Key Stage 2.
	Evaluate:	slicing, grating, mixing,	ingredients with some help.	appear appetising.	baking.	Evaluate:
	Describe what they like and	spreading, kneading and	Use a range of techniques	Evaluate:	Explain their choice of tools	Explain why foods have
	dislike about their products.	baking.	such as peeling, chopping,	Explain why ingredients	and equipment in relation	been chosen.
			slicing, grating, mixing,	have been chosen.	to the skills and techniques	Critically evaluate the
		Evaluate:	spreading, kneading and	Explain how well the food	they will be using.	quality of the design,
		Express their likes and	baking.	products achieve their	Evaluate:	manufacture and fitness for
		dislikes about their	Use a wider range of	purposes.	Identify the strengths and	purpose of their dishes.
		products.	ingredients and tools than	Explain how well the food	areas for development in	par pass at anomalia
		Suggest what changes might	Key Stage 1.	products meet user needs	their ideas and food	
		improve the dish.	ney stage 1.	and wants.	products.	
		improve the dish.	Evaluate:	and wants.	Consider the views of	
			Use their design criteria to		others, including intended	
			evaluate their completed		users, to improve their	
			products.		work.	
			Identify the strengths and		Explain how well the dishes	
			, -		1 '	
			areas for development in		achieve their purposes.	
			their ideas and products. Consider the views of		Explain how well the dishes	
			others, including intended		meet user needs and wants.	
			users, to improve their			
<u> </u>		<u> </u>	work.	<u> </u>		1
	Know about key events in design and technolog		sign	rn and tachnalagy bays halped	I shana tha warld	
	Know about key events in design and technolog					orprice industry and the
	Work confidently within a ran		•	ige of contexts, such as the not	me, school, leisure, culture, ent	erprise, industry and the
	imaginary, story-based, home		wider environment.			
	playgrounds, local community environment.	y, muustry and the wider				
KS1 Design	Investigate simple products	Research and evaluate	Research and evaluate	Gather information about	Research products or	Investigate products asking
design purposeful,	and ask questions: what a	some relevant products to	some appropriate products	the needs and wants of	models demonstrating how	and answering questions:
functional annealing	nroduct is called what	inform design ideas Ask	to inform design ideas: Ask	1	a crank a cam and lever	About how innovative

functional, appealing products for themselves and other users based on design criteria

♣ generate, develop, model and communicate their ideas through talking, drawing,

using construction kits to build walls, towers and frameworks. Experience of using basic tools e.g. scissors or hole punches with construction materials product is called, what products are for, who products are for, where products might be used how products work, how products are used, what

inform design ideas. Ask and answer questions about products: What a product is called, What products are for, Who products are for, Where products might be used

to inform design ideas: Ask and answer questions about products: How well products have been designed; why materials have been

chosen; what methods of

particular individuals and groups.

Research what methods of construction have been used; Why materials have been chosen; What shapes a crank, a cam and lever, and a crank and slider

Describe how innovative products are.

About how innovative products are; What impact products have beyond their intended purpose (environmental issues); What methods of construction have been

produce movement.

templates, mock-ups and,	e.g. plastic, card.	materials products are	How products work, How	construction have been	and structures have been	Explain how well products	used; How well products
where appropriate, information and communication technology	Experience of different methods of joining card and paper.	made from.	products are used, What materials products are made from?	used; how well products work; how well products meet user needs and wants?	used? Explain how well products achieve their purposes.	work.	have been made; Why materials have been chosen; How well products meet user needs and
KS2 Design			State what they like and dislike about products.	wants:	defineve their purposes.		wants?
use research and develop design criteria to inform the design of innovative, functional, appealing products that are fit for purpose, aimed at particular individuals or groups		Generate ideas by drawing on their own experiences.	Use knowledge of existing products to help come up with ideas.	Use knowledge of existing products to help develop ideas.			Research, using surveys, interviews, questionnaires and web-based resources to: Identify what our users want and find out preferences and values of particular individuals and groups.
generate, develop, model and communicate their ideas through discussion, annotated sketches, cross- sectional and exploded diagrams, prototypes		Say how they will make their products suitable for their intended user.	Explain how they will make their products suitable for their intended user in simple terms.	Indicate the design features of their products that will appeal to intended users.	Explain how well products meet user needs and wants.	Indicate the design features of their products that will appeal to intended users.	Explain how design features of their products meet the needs and wants of the intended users.
diagrams, prototypes, pattern pieces and computer-aided design		Talk about their design ideas and what they are making.	Use simple design criteria to help develop their ideas.	Develop their own design criteria and use these to inform their ideas.	Develop their own design criteria and use these to inform their ideas.	Develop a simple design specification to guide their thinking.	Develop a simple design specification to guide their thinking.
		Communicate ideas effectively in a range of ways, including drawings.	Develop and communicate ideas by talking and using labelled or annotated drawings.	Use annotated sketches and simple exploded drawings to develop and communicate their ideas.	Use annotated sketches and exploded drawings to develop and communicate their ideas.	Use annotated sketches and exploded diagrams to develop and communicate their ideas.	Use annotated sketches, cross-sectional drawings and exploded diagrams to develop and communicate their ideas.
				Share and clarify ideas through discussion.	Generate realistic ideas, focusing on the needs of the user.	Generate representative, appealing ideas based on focused research.	Generate innovative ideas, drawing on research.
				Refer to their design criteria as they design and make.	Make design decisions that take account of the availability of resources.	Make design decisions that take account of the availability of resources and time.	Make design decisions, taking account of constraints such as time, resources and cost.
		State what products they are designing and making describe what their products are for.	Describe the products they are designing and making, what their products are for, and how their products will work.	Explain how particular parts of their products work and the purpose of their products.	Explain how particular parts of their products work and the functions of their products.	Explain how particular parts of their products work. Describe the purpose of their products	Describe the purpose of their products.
			Use information and communication technology, where appropriate, to develop and communicate their ideas.				

Make Children should follow procedures for safety and consider hazards as they work practically.									
KS1 Make * select from and use a range of tools and	Explore resources and materials, including construction materials.	Talk about their design ideas and what they are making.	d follow procedures for safety of Model ideas by exploring materials, components and construction kits and by	Make prototypes to practise techniques.	ork practically.		Model their ideas using prototypes.		
equipment to perform practical tasks [for example, cutting, shaping, joining and finishing] select from and use a wide range of materials and components, including construction materials, textiles and ingredients, according to their characteristics KS2 Make select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately select from and use a wider range of materials and components, including construction materials, textiles and ingredients, according to their functional properties and aesthetic qualities	materials with increasing control. Construct with a purpose in mind with a range of objects and structures. Construct safely. Enjoy making products individually and with others. Make products which allow movement. Measure, mark out, cut and shape materials and components. Select from a range of materials and components according to their		making templates and mock ups.						
			Plan by suggesting what to do next.	Order the main stages of making.	Order the main stages of making.	Formulate step-by-step plans as a guide to making their product.	Formulate step-by-step plans and make lists of tools, equipment and materials that they need		
		tools from a given range	Select and use appropriate tools and equipment from a wider range linked to the suitability of the product.	Select tools and equipment suitable for the task, (for example, Stanley knives, hammers, hacksaws and hot glue guns, bench hooks, G- clamps, etc.)	Select components and tools suitable for the task (for example, Stanley knives, hammers, screw drivers, hacksaws and hot glue guns, bench hooks, G- clamps, etc.)	Select tools and equipment suitable for the task (for example, pliers, wire cutters, etc.)	Select tools and equipme suitable for the task (for example, pins, needles, thread, unpickers, measuring tape, etc.)		
		shape materials and	Measure, mark out, cut and shape materials and components with increasing competence.	Measure, mark out, cut and shape materials and components with some accuracy.	Measure, mark out, cut and shape materials and components with some accuracy.	Measure, mark out, cut and shape materials and components with increased accuracy and control.	Accurately measure, ma out, cut and shape materials and componer		
		materials and components according to their	Select from a range of materials and components according to their characteristics.	Select and use a wider range of materials and components than KS1, including mechanical components.	Use a wider range of materials and components than KS1, including wire, plastic sheet, wooden doweling, square sectioned wood and electrical components.	Use a wider range of materials and components than Key Stage 1, including electrical components.	Explain their choice of materials, fabrics and components according t functional properties an aesthetic qualities.		
		Assemble, join and combine materials and components.	Assemble, join and combine materials and components with some accuracy.	Assemble, join and combine materials and components with increased control and accuracy.	Accurately assemble, join and combine materials and components.	Accurately assemble, joi and combine materials a components.			
		Use finishing techniques, including those from art and design. Explain about the simple working characteristics of materials and components.	Use finishing techniques, including those from art and design.	Apply a range of finishing techniques, including those from art and design, with some accuracy.	Apply a range of finishing techniques, including those from art and design, with some accuracy.	Accurately apply a range of finishing techniques, sometimes involving a number of steps, considering functional and aesthetic properties.	Accurately apply a range finishing techniques, sometimes involving a number of steps, considering functional a aesthetic properties.		
		•		Make adjustments whilst making to refine their product.	Amend and refine the quality of the product during making to improve the product.	Make simple mechanical components. Make or explain adjustments to improve performance of movement.	Use computer-aided de to communicate their product.		

			Eval	uate			
KS1 Evaluate ♣ explore and evaluate a range of existing products ♣ evaluate their ideas and	Be excited and proud about what they make and say why.	Describe what they like and dislike about existing products.	Describe what they like and dislike about existing products and why.	Explain what they like and dislike about existing products and give reasons.	Explain how particular parts of their products work.	Explain how particular parts of their products work.	Explain how particular parts of their products work.
products against design criteria		Say what they like/dislike about their own product and why.	Suggest how their products could be improved.	Identify the strengths and areas for development in their ideas and products.	Identify the strengths and areas for development in their ideas and products.	Identify the strengths and areas for development in their ideas and products.	Identify the strengths and areas for development in their ideas and products.
KS2 Evaluate ♣ investigate and analyse a range of existing products ♣ evaluate their ideas and products against their own		Talk about how their products could be improved.	Make simple judgements about their products and ideas against design criteria. Respond to the views and ideas against of their design	Use their design criteria to evaluate their completed products. Consider the views of others, including intended	Evaluate the extent to which their product fulfils the design criteria. Consider the views of extens including intended	Evaluate their ideas and products against their original design specification. Consider the views of others, including intended	Evaluate their ideas and products against their original design specification. Consider the views of others, including intended
design criteria and consider the views of others to improve their work understand how key			judgements of their design from others.	others, including intended users, to improve their work.	others, including intended users, to improve their work.	others, including intended users, to improve their work.	others, including intended users, to improve their work.
events and individuals in design and technology have helped shape the world					Discuss how well products meet user needs and wants.	Critically evaluate the quality of the design, manufacture and fitness for purpose of their products as they design and make.	Critically evaluate the quality of the design, manufacture and fitness for purpose of their products as they design and make.
						Ask and answer questions about refining and adjusting the movements in their models.	Critically evaluate the quality of the design, manufacture and fitness for purpose of their products as they design and make.
			Technical	Knowledge	,	,	
KS1 Technical knowledge	Early experiences of	Structures:	Structures:	Mechanisms:	Electronics:	Mechanisms:	CAD:
build structures, exploring	working with paper and	Suggest ideas of how	Experience using tools to	Explain how mechanical	Describe how simple	Explain how simple	Talk about designers and
how they can be made	card to make simple flaps	freestanding structures can be made stronger, stiffer	cut/saw, drill, screw, nail, glue, file and sand wood	systems such as levers and linkages or pneumatic	electrical circuits and components can be used to	mechanisms, EG, a crank, a cam and lever, and a crank	engineers who have developed ground-breaking
stronger, stiffer and more stable	and hinges.	and more stable.	and other relevant materials to build, stiffen	systems create movement.	create functional products.	and slider produce movement.	products.
♣ explore and use	Experience of simple	Mechanisms:	and strengthen structures.	Structures:	Know that mechanical and		Use Tinkercad successfully
mechanisms [for example,	cutting, shaping and joining	Learn about the movement		Demonstrate how to make	electrical systems have an	Know that mechanical and	to illustrate design ideas.
levers, sliders, wheels and	skills using scissors, glue,	of simple mechanisms such	Talk about the simple	strong, stiff shell structures.	input, process and output.	electrical systems have an input, process and output.	Textiles:
axles], in their products.	paper fasteners and	as levers, sliders, wheels	working characteristics of materials and components.	Know that a net shape can		input, process and output.	Explain that a 3D textile
MC2 To short and long and a date	masking tape.	and axles.	materials and components.	be assembled to create a 3D	Link learning from science	Control:	product can be made from
KS2 Technical knowledge		Make products which allow	Textiles:	shape.	to help design and make products that work.	Describe how more complex	a combination of fabric
apply their understanding of how to strengthen, stiffen		movement using levers,	Know that a 3-D textile		products that work.	electrical circuits and components can be used to	shapes.
and reinforce more complex		sliders or wheels and axles.	product can be assembled		Structures:	create functional products.	Know that modern and
structures			from two identical fabric shapes.		Learn skills such as	·	smart textile materials exist.
understand and use					cutting/sawing, drilling, screwing, nailing, gluing,	Talk about how to program	
mechanical systems in their					filing and sanding.	a computer to monitor changes in the environment	Explain what the different properties of fabrics are
products [for example,						and control their products.	(functional and /or
gears, pulleys, cams, levers					Demonstrate reinforcing	·	aesthetic?)
and linkages]					and strengthening	Discuss new and emerging	
understand and use					techniques on a framework.	technology.	Demonstrate some different types of stitches
electrical systems in their							used in textiles.
products [for example, series							

atmostes to a sure of the		T	1	I	1	T
circuits incorporating switches, bulbs, buzzers and motors] apply their understanding of computing to program, monitor and control their products.						Know which stitch will be most suitable to join two pieces of fabric together.
	I	Use the correct techn	l nical vocabulary for the projects	they are undertaking		
Vocab	Cut, fold, join, fix, structure, wall, tower, weak, thinner, thicker, corner, point, straight, curved, metal, wood, plastic, circle, triangle, square, rectangle, cube, cylinder, design, make, evaluate, purpose, ideas, stable, strong, slider, lever, pivot, slot, bridge/guide, card, masking tape, paper fastener, join, pull, push, up, down, straight, curve, forwards, backwards, design, make, evaluate, user, purpose, ideas, design criteria, product, function Fruit and vegetable names, names of equipment and utensils, sensory vocabulary e.g. soft, juicy, crunchy, sweet, sticky, smooth, sharp, crisp, sour, hard, flesh, skin, seed, pip, core, slicing, peeling, cutting, squeezing, healthy diet, choosing, ingredients, planning, investigating tasting, arranging, popular, design, evaluate, criteria	Scissors, shears, felt, cotton, template, pattern pieces, mark out, join, decorate, finish, features, suitable, quality mock-up, design brief, design criteria, make, evaluate, user, purpose, function, identical, front, back Fruit and vegetable names, names of equipment and utensils, sensory vocabulary e.g. soft, juicy, crunchy, sweet, sticky, smooth, sharp, crisp, sour, hard, flesh, skin, seed, pip, core, slicing, peeling, cutting, squeezing, healthy diet, choosing, ingredients, planning, investigating tasting, arranging, popular, design, evaluate, criteria Natural, man-made, hollow, drainage, various, marking out, scoring, shaping, adhesives, joining, assemble, accuracy, material, stiff, strong, reduce, reuse, recycle, design, make, evaluate, user, purpose, ideas, design criteria, product, function	Texture, taste, sweet, sour, hot, spicy, appearance, smell, preference, greasy, moist, cook, fresh, savoury, hygienic, edible, grown, reared, caught, frozen, tinned, processed, seasonal, harvested, healthy/varied diet, planning, design criteria, purpose, user, annotated sketch, sensory evaluations Mechanism, lever, linkage, pivot, slot, bridge, guide, system, input, output, linear, rotary, oscillating, reciprocating, user, purpose, function, prototype, design criteria, innovative, appealing, design brief Shell structure, frame structure, solid structure, combination structure, three-dimensional (3-D) shape, net, cube, cuboid, edge, face, length, width, breadth, capacity, marking out, scoring, shaping, tabs, adhesives, joining, assemble, accuracy, material, stiff, strong, reduce, reuse, recycle, corrugating, ribbing, laminating, font, lettering, text, graphics, decision, evaluating, design brief design criteria, innovative, prototype	Series circuit, fault, connection, toggle switch, push-to make switch, push-to- break switch, battery, battery holder, bulb, bulb holder, wire, insulator, conductor, crocodile clip, input device, output device, copper track, user, purpose, function, prototype, design criteria, innovative, appealing, design brief. Ingredients, batter, beat, flour, wholemeal, unleavened, baking soda, spice, herbs, fat, sugar, carbohydrate, protein, vitamins, nutrients, nutrition, healthy, varied, gluten, dairy, allergy, intolerance, savoury, source, seasonality, utensils, combine, fold, stir, pour, mix, rubbing in, whisk, beat, roll out, shape, sprinkle, crumble, design specification, innovative, research, evaluate, design brief Framework, rigid, a-frame, wooden doweling, square sectioned wood, hinge, marking out, scoring, shaping, tabs, adhesives, joining, assemble, accuracy, material, stiff, strong, reduce, reuse, recycle, corrugating, ribbing, laminating, decision, evaluating, design brief design criteria, innovative, prototype	Outline, expression, net, length, mechanism, specification, shape, trace, width, height, slider, cam, shaft, cam and lever, cam and follower, crank, design decision, detail, proportion, movement, rotation, oscillation, reciprocation, adjustments, evaluation, review. Ingredients, stock, liquid, diced, chopped, sliced, season, spice, garnish, herbs, fat, sugar, carbohydrate, protein, vitamins, nutrients, nutrition, healthy, varied, gluten, dairy, allergy, intolerance, savoury, source, seasonality, utensils, combine, fold, knead, stir, pour, mix, rubbing in, whisk, beat, roll out, shape, sprinkle, crumble, design specification, innovative, research, evaluate, design brief. Reed switch, toggle switch, push-to-make switch, push to-break switch, light dependent resistor (LDR), tilt switch, light emitting diode (LED) USB cable, wire, insulator, conductor, crocodile clip, control, microprocessor, program, system, input device, output device, function, innovative, design specification, design brief, user, purpose, exploded,	Computer-aided design, (CAD), Computer-aided manufacture (CAM) augmented reality, face, plane, extrude, view cube, dimension, radius, align, empathy, scale, modify, repeat, copy, flip design brief, design criteria, design decisions, innovative, prototype Ingredients, yeast, dough, bran, flour, wholemeal, unleavened, baking soda, spice, herbs, fat, sugar, carbohydrate, protein, vitamins, nutrients, nutrition, healthy, varied, gluten, dairy, allergy, intolerance, savoury, source, seasonality, utensils, combine, fold, knead, stir, pour, mix, rubbing in, whisk, beat, roll out, shape, sprinkle, crumble, design specification, innovative, research, evaluate, design brief Seam, seam allowance, wadding, reinforce, right side, wrong side, hem, template, pattern pieces, design criteria, annotate, design decisions, functionality, innovation, authentic, user, purpose, evaluate, mock-up, prototype, aesthetics, function, constraints
Cross curricular:	English RE PSHE Art and Design	Science English Art and Design	Science PSHE Art and Design	Maths Science Art and Design	isometric, prototype Maths Science Computing Art and Design	Computing PSHE RE Art and Design