Art & Design at Spire Junior School

Art & Design Overview

Through systematically developing their designing and artistic skills, our children are given the opportunity to express their creative imagination while mastering art and design. We allow children real-world experiences to discover and be influenced by artists and designers.

Art and design underpins the whole curriculum, being an integral part of the “end product” of each topic, and the main driver for our summer term’s create topic. The summer term culminates in completed ‘product’ to be shared with other classes, families and the wider community.

Children are engaged in a range of cookery lessons, with the additional offer of after-school clubs when available. Additionally, children will develop their textile and sewing abilities throughout their time at Spire and apply these skills to a variety of creations.

We intend for each child to be proud of the products they design, make and evaluate in their art and design lessons, as well as the nature of these products to become more complex with age and ability.

Long term overview

	Year 3/4	Year 5/6
Cycle A 2025/2026	**Cooking & Nutrition** -understand and apply the principles of a healthy and varied diet -prepare and cook a variety of and computer-aided design predominantly savoury dishes using a range	**Textiles** - understanding and skills needed to engage in a process of designing and making items for a specific purpose - generate, develop, model and communicate their

	of cooking techniques - understand seasonality and know where and how a variety of ingredients are grown, reared, caught and processed.	ideas through discussion, annotated sketches, cross-sectional and exploded diagrams, prototypes, pattern pieces
Cycle A texts	The Great Food Bank Heist Dragon on the roof Colours Passing Through Us by Marge Piercy	Wonder Othello Jabberwocky
Cycle B 2026/2027	**Sculpture** -Select from and use a wider range of materials and components, including construction materials, according to their functional properties and aesthetic qualities. - Apply their understanding of how to strengthen, stiffen and reinforce more complex structures. - understand how key events and individuals in design and technology have helped shape the world	**Mechanical** - understand and use mechanical systems in their products [for example, gears, pulleys, cams, levers and linkages] -understand and use electrical systems in their products [for example, series circuits incorporating switches, bulbs, buzzers and motors] -apply their understanding of computing to program, monitor and control their products.
Cycle B	The Chronicles of Narnia Brother's Grimm- Phillip Pullman (Fairy tales)	Cogheart Biography of Michael Fariday

texts	Revolting Rhymes- Roald Dahl	

Progression of skills

	Year 3/4	Year 5/6
DESIGN	Through a variety of creative and practical activities, pupils should be taught the knowledge, understanding and skills needed to engage in an iterative process of designing. They should work in a range of relevant contexts [for example, the home, school, leisure, culture, enterprise, industry and the wider environment]. Children 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. They generate, develop, model and communicate their ideas through discussion, annotated sketches, cross-sectional and exploded diagrams, prototypes, pattern pieces and computer- aided design. Children can: a identify the design features of their products that will appeal to intended users; b use their knowledge of a broad range of existing products to help generate their ideas; c design innovative and appealing products that have a clear purpose and are aimed at a specific user;	Through a variety of creative and practical activities, pupils should be taught the knowledge, understanding and skills needed to engage in an iterative process of designing. They should work in a range of relevant contexts [for example, the home, school, leisure, culture, enterprise, industry and the wider environment]. Children 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. They generate, develop, model and communicate their ideas through discussion, annotated sketches, cross-sectional and exploded diagrams, prototypes, pattern pieces and computer- aided design. Children can: a use research to inform and develop detailed design criteria to inform the design of innovative, functional and appealing products that are fit for purpose and aimed at a target market; b use their knowledge of a broad range of existing products to help generate their ideas;

	d explain how particular parts of their products work; e use annotated sketches and cross-sectional drawings to develop and communicate their ideas; f when designing, explore different initial ideas before coming up with a final design; g when planning, start to explain their choice of materials and components including function and aesthetics; h test ideas out through using prototypes; i use computer-aided design to develop and communicate their ideas (see note on p. 1); j develop and follow simple design criteria; work in a broader range of relevant contexts, for example entertainment, the home, school, leisure, food industry and the wider environment.	c design products that have a clear purpose and indicate the design features of their products that will appeal to the intended user; d explain how particular parts of their products work; e use annotated sketches, cross-sectional drawings and exploded diagrams (possibly including computer-aided design) to develop and communicate their ideas; f generate a range of design ideas and clearly communicate final designs; g consider the availability and costings of resources when planning out designs; work in a broad range of relevant contexts, for example conservation, the home, school, leisure, culture, enterprise, industry and the wider environment.
MAKE	Through a variety of creative and practical activities, pupils should be taught the knowledge, understanding and skills needed to engage in an iterative process of making. Children select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing] accurately. They 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. Children can: Plan a with growing confidence, carefully select from a range of tools and equipment, explaining their choices; b select from a range of materials and components according to their functional properties and aesthetic qualities;	Through a variety of creative and practical activities, pupils should be taught the knowledge, understanding and skills needed to engage in an iterative process of making. Children select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately. They 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. Children can: Planning a independently plan by suggesting what to do next; b with growing confidence, select from a wide range of tools and equipment, explaining their choices; c select from a range of materials and components according to their functional properties and

	c place the main stages of making in a systematic order; Practical skills and techniques d learn to use a range of tools and equipment safely, appropriately and accurately and learn to follow hygiene procedures; e use a wider range of materials and components, including construction materials and kits, textiles and mechanical and electrical components; f with growing independence, measure and mark out to the nearest cm and millimetre; g cut, shape and score materials with some degree of accuracy; h assemble, join and combine material and components with some degree of accuracy; i demonstrate how to measure, cut, shape and join fabric with some accuracy to make a simple product; j join textiles with an appropriate sewing technique; begin to select and use different and appropriate finishing techniques to improve the appearance of a product such as hemming, tie-dye, fabric paints and digital graphics.	aesthetic qualities; d create step-by-step plans as a guide to making; Practical skills and techniques e learn to use a range of tools and equipment safely and appropriately and learn to follow hygiene procedures; f independently take exact measurements and mark out, to within 1 millimetre; g use a full range of materials and components, including construction materials and kits, textiles, and mechanical components; h cut a range of materials with precision and accuracy; i shape and score materials with precision and accuracy; j assemble, join and combine materials and components with accuracy; k demonstrate how to measure, make a seam allowance, tape, pin, cut, shape and join fabric with precision to make a more complex product; l join textiles using a greater variety of stitches, such as backstitch, whip stitch, blanket stitch; refine the finish using techniques to improve the appearance of their product, such as sanding or a more precise scissor cut after roughly cutting out a shape.
EVALUATE	Through a variety of creative and practical activities, pupils should be taught the knowledge, understanding and skills needed to engage in an iterative process of designing and making. Children investigate and analyse a range of existing products. They evaluate their ideas and products against their own design criteria and consider the views of others to improve their work. They understand how key events and individuals in design	Through a variety of creative and practical activities, pupils should be taught the knowledge, understanding and skills needed to engage in an iterative process of designing and making. Children investigate and analyse a range of existing products. They evaluate their ideas and products against their own design criteria and consider the views of others to improve their work. They understand how key events and individuals in design

	and technology have helped shape the world. Children can: a explore and evaluate existing products, explaining the purpose of the product and whether it is designed well to meet the intended purpose; b explore what materials/ingredients products are made from and suggest reasons for this; c consider their design criteria as they make progress and are willing to alter their plans, sometimes considering the views of others if this helps them to improve their product; d evaluate their product against their original design criteria; evaluate the key events, including technological developments, and designs of individuals in design and technology that have helped shape the world.	and technology have helped shape the world. Children can: a complete detailed competitor analysis of other products on the market; b critically evaluate the quality of design, manufacture and fitness for purpose of products as they design and make; evaluate their ideas and products against the original design criteria, making changes as needed.
TECHNICAL KNOWLEDGE	Children apply their understanding of how to strengthen, stiffen and reinforce more complex structures. They understand and use electrical systems in their products [for example, series circuits incorporating switches, bulbs, buzzers and motors]. They apply their understanding of computing to program, monitor and control their products. Children can: a understand that materials have both functional properties and aesthetic qualities; b apply their understanding of how to strengthen, stiffen and reinforce more complex structures in order to create more useful characteristics of products; c understand and demonstrate how mechanical and electrical systems have an input and output process; d make and represent simple electrical circuits, such as a series and parallel, and components to create functional	Children apply their understanding of how to strengthen, stiffen and reinforce more complex structures. They understand and use mechanical systems in their products [for example, gears, pulleys, cams, levers and linkages]. They understand and use electrical systems in their products [for example, series circuits incorporating switches, bulbs, buzzers and motors]. They apply their understanding of computing to program, monitor and control their products. Children can: a apply their understanding of how to strengthen, stiffen and reinforce more complex structures in order to create more useful characteristics of products; b understand and demonstrate that mechanical and electrical systems have an input, process and output;

	products; e explain how mechanical systems such as levers and linkages create movement; use mechanical systems in their products. *TAUGHT THROUGH SCIENCE UNIT	c explain how mechanical systems, such as cams, create movement and use mechanical systems in their products; apply their understanding of computing to program, monitor and control a product.
COOKING & NUTRITION	Children understand and apply the principles of a healthy and varied diet. They prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques. They understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed. Children can: a start to know when, where and how food is grown (such as herbs, tomatoes and strawberries) in the UK, Europe and the wider world; b understand about seasonality, how this may affect the food availability and plan recipes according to seasonality; c understand how to prepare and cook a variety of predominantly savoury dishes safely and hygienically; d with support, use a heat source to cook ingredients showing awareness of the need to control the temperature of the hob and/or oven; e use a range of techniques such as mashing, whisking, crushing, grating, cutting, kneading and baking; f explain that a healthy diet is made up of a variety and balance of different food and drink, as represented in the Eatwell Guide and be able to apply these principles when planning and cooking dishes; g understand that to be active and healthy, nutritious food and drink are needed to provide energy for the	

	body; h explain that foods contain different substances, such as protein, that are needed for health and be able to apply these principles when planning and preparing dishes; i prepare ingredients using appropriate cooking utensils; j measure and weigh ingredients to the nearest gram and millilitre; k start to independently follow a recipe; start to understand seasonality.	
SCULPTURE	Children develop their sketching, shading, and layering techniques. They experiment with a range of pencils, paints, structural material including non-traditional resources. To improve their mastery of art and design techniques with a range of materials – pencil, paint, materials. a- research and describe how artists use assembled materials to create sculptures. b - Adjust and strengthen the sculpture's structure by securing joints and balancing weight. c -learn pencil shading techniques (depth, tone, shade, pattern) d -Using tools, paint, or additional materials to refine adds realism, texture, and character to a sculpture. e- Compare final sculptures to reflect on what worked well and what could be improved.	
TEXTILES		Children further develop their weaving, overlapping and layering techniques. They experiment with a range of fabrics including non-traditional fabrics. To improve their mastery of art and design techniques with a range of materials – textiles. Children can: a select appropriate materials, giving reasons; b use a variety of techniques, e.g. printing, dyeing,

		weaving and stitching to create different textural effects; c develop skills in stitching, cutting and joining; use key vocabulary to demonstrate knowledge and understanding in this strand: pattern, line, texture, colour, shape, stuffing, turn, thread, needle, textiles, decoration. d with a range of media by overlapping and layering in order to create texture, effect and colour; e add decoration to create effect; f use key vocabulary to demonstrate knowledge and understanding in this strand: colour, fabric, weave, pattern
ARTIST STUDY	Children continue to study the works of famous artists. They have more opportunity to offer opinion and to compare and contrast artists. Children will be exposed to a range of different artists through history, studying their techniques and processes. **KS2 Art and Design National Curriculum** To learn about great artists, architects and designers in history. Children can: a use inspiration from famous artists to replicate a piece of work; b reflect upon their work inspired by a famous notable artist and the development of their art skills; c express an opinion on the work of famous, notable artists and refer to techniques and effect; use key vocabulary to demonstrate knowledge and understanding in this strand: Anselm Kiefer, Salvador Dalí, Paula Rego, Gainsborough, Sonia Boyce, Lucian Freud, Howard Hodgkin, Anish Kapoor, Caravaggio, Le Corbusier,	Children continue to learn from the works of famous artists. They now expand their knowledge by looking at the range of more famous artists. Children comment on the work of famous artists and name their pieces of work. **KS2 Art and Design National Curriculum** To learn about great artists, architects and designers in history. Children can: a give detailed observations about notable artists', artisans' and designers' work; b offer facts about notable artists', artisans' and designers' lives; use key vocabulary to demonstrate knowledge and understanding in this strand: Henri Rousseau, India Flint, Alexander Calder, David Oliveira, David Hockney, Man Ray, Fernand Léger, Alfred Wallis, Hokusai, Frida Kahlo, Joaquín Torres-García, Leonora Carrington, Diego Rivera, Beatriz Milhazes, Carlos Páez Vilaró, John Singer Sargent, Ansel Adams, Helen Frankenthaler, Frank Lloyd Wright, Jean- Michel Basquiat, Mary Cassatt.

	Coco Chanel, Jackson Pollock, John Constable, Thomas Cole, Claude Monet, Henri Matisse, Paul Cézanne, Julian Opie, Henry Moore, Giacometti, Vivienne Westwood, Louise Bourgeois, Jennifer Angus, Braque, Claesz, Kalf, Carl Warner, Michael Brennand-Wood.	

Year 3/4 - Cycle A

Enquiry question – Cooking & Nutrition

Can you taste the rainbow?

	Learning Intention	Substantive knowledge	Key vocabulary
Lesson 1	L.I – To taste & evaluate a variety of food (fruit/veg) from around the world	Children create a colour guide of fruit & veg – note colour, texture & any features of fruit available. Understand that the food they are tasting has been 'grown'. Guess where it was grown. Discuss seasonality. Predict what it tastes like using vocab bank. Evaluate afterwards – star rating. Create a pic collage of children tasting food.	colour soft texture hard taste chewy bitter bland sour produce seasonal grow sweet climate fragrant tart
Lessons 2 and 3	L.I - Recall the world around them and sketch cross section of fruit. L.I use a wide range of drawing materials.	EXPLORE - Children to discuss where our food comes from. Quiz – match food to country. Look at apples – Vincent Van Gogh. PLAN - Take a photograph of fruit & print for book – children to use this. EXPLORE - Sketch cross section of a range of fruit using Year 3 knowledge of shading techniques. Be aware of proportion and scale while controlling line and shading techniques. Use real fruit & photographs for inspiration. PLAN & MAKE Children choose pencil, crayon, wax, chalk, etc to draw a cross section of a piece of fruit or veg. (NOT paint) EVALUATE - Children to evaluate techniques used at end of lesson.	colour veins lines texture smooth rough segment shading depth tone contrast light dark pitted image texture
Lesson 4	L.I _ to paint cross section of fruit	Children to use same photograph as last week, EXPLORE - using foreground, midground & depth of colour. PLAN – consider positioning on the page, lighting, depth of colour CREATE- using paint to create specific effects required EVALUATE - Compare to sketch using vocab bank provided.	angle depth contrast midground foreground light

			dark shade
Lesson 5	ARTIST STUDY L.I – To learn about Vincent van Gogh	Use iPad/books to research a famous artist. Children to create an information text to display findings.	
Lessons 6 and 7	L.I To plan a design to print	PLAN - Discuss idea/motif, using fruit or veg - children research patterns made using different fruit or veg - design 2 or 3 motifs, choose one MAKE - model outcome - allow children time to practise cutting, chopping, peeling - children use plan to make their designs EVALUATE – outcome/ effectiveness	repetitive motif design effect chop cut slice
Lesson 8	L.I To explain that a healthy diet is made up of a variety and balance of different food and drink, as represented in the Eatwell Guide	EXPLORE – different meals we have. - Learn about the Eatwell guide	protein balance carbohydrate fats moderation vitamins nutrition dairy
Lesson 9	L.I - Compare traditional meals from around the world – taste and identify nutritional values (Indian/Chinese/Thai/Japanese/British/Mexican/ Spanish/ French)	EXPLORE – meals from different cultures create a word bank & pic- collage evaluate Use Eatwell guide to rate nutritional values	taste sensation sour bitter sweet bland flavorsome spicy Nutritious

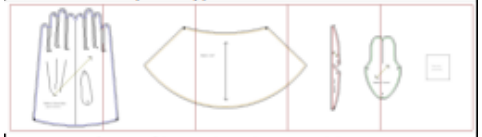
Lesson 10	ARTIST STUDY L.I To view work of Giuseppe Arcimboldo	Use iPad/books to research a famous artist. Children to create an information text to display findings. DESIGN own 'face'	
Lesson 11	L.I Learn to cut, chop & peel – fruit faces	Recap on last weeks work learn skills – cut, chop, peel, etc MAKE faces and take photographs. EVALUATE	chop blade peel edge cut knife
Lesson 12	L.I To plan a balanced, nutritional meal to make independently	PLAN	
Lesson 13	L.I To create a balanced meal	MAKE	
Lesson 14	L.I To evaluate	EVALUATE	nutritious balance nutritional make protein balance carbohydrate fats moderation vitamins nutrition dairy taste

Year 5/6 - Cycle A

Enquiry Question – Textiles

Is it fit for purpose?

	Learning intention	Substantive knowledge	Key words
Lessons 1 & 2	L.I To investigate and evaluate a range of accessories	EXPLORE & EVALUATE Children investigate and evaluate a range of existing textiles products and how they have been constructed using disassembly, and evaluate what the fabric shapes look like, how the parts have been joined, how the product has been strengthened and stiffened, what fastenings have been used and why. • Investigate work by designers and their impact on fabrics and products. Use questions to develop understanding e.g. Is the product functional or decorative? Who would use this product? What is its purpose? What design decisions have been made? Do the textiles used match the intended purpose? How has it been made? What has been used	Strength Durability Functional Function Purpose Constructed Joined Stitched Glued Fastened

		to enhance the appearance? Is the design innovative? • Children investigate properties of textiles through investigation e.g. exploring insulating properties, water resistance, wear and strength of textiles. •Develop an authentic and meaningful design brief together as a class after introducing the project to the children	Zip Press velcro
Lessons 3 & 4	L.I- To develop computer-aided design (CAD) skills by using pattern making software to generate, modify, scale, save and print pattern pieces.	EXPLORE & DESIGN Recognise that designs can be easily modified and repeated on the computer without the need for a physical product. Investigate using art packages on the computer to design prints that can be applied to textiles using iron transfer paper. https://www.wildginger.com/products/wil dthings.htm  (Choice of accessories… ensure children choose within their capability)  (E.g. of how the plan would print onto A4 in sections.)  Using Wild Things to create patterns Develop skills of 2-D paper pattern making using CAD and create a 3-D paper or Dipryl mock-up of a chosen product. Remind/teach how to pin a pattern on to fabric ensuring limited wastage, how to leave a seam allowance and use different cutting techniques	Design Motif Repeat Repetition Transfer Purpose Print Image Allowance Technique Spatial
Lesson 5	L.I - To use a range of stitches to join pieces of fabric	Develop skills of threading needles and joining textiles using a range of stitches, building upon children's earlier experiences of stitches e.g. improving appearance and consistency of stitches and introducing new stitches. If available, demonstrate and allow children to use sewing machines to join fabric with close adult supervision. • Develop skills of	Needle Thread Threading Machine Edge

		sewing textiles by joining right side together and making seams. Children should investigate how to sew and shape curved edges by snipping seams, how to tack or attach wadding or stiffening and learn how to start and finish off a row of stitches	Techniques Purpose outcome
Lesson 6	L.I – To decide on a product and purpose that will inform my design criteria.	DESIGN Children generate ideas by carrying out research using surveys, interviews, questionnaires and the internet. Develop a design specification for their product. Children Communicate ideas through detailed, annotated drawings from different perspectives.	outcome product design purpose technique select
Lesson 7	L.I - To produce a detailed plan for my product including steps explaining how I will make it and what I will need. L.I I can identify skills I will need to make my product.	Drawings should indicate the design decisions made, methods of strengthening, the type of fabrics to be used and the types of stitching that will be incorporated. • Produce step by-step plans, lists of tools equipment, fabrics and components needed. Allocate tasks within a team if appropriate.	Design Label Instructions Equipment Technique
Lessons 8 & 9	L.I - To follow a plan to make a high-quality product applying my knowledge, understanding and skills	MAKE Children to make their high-quality products, applying knowledge, understanding and skills from the unit. Children should use a range of decorative finishing techniques to ensure a well finished final product that matches the intended user and purpose. Remind children to follow their design brief carefully and to keep referring to their user and purpose throughout their task	outcome product design purpose technique select
Lesson 10	L.I – To evaluate a product I have made against the original	EVALUATE Collect feedback through designed evaluations and observations. Evaluate the work as it progresses and the final product against the intended	Evaluate Usefulness Purpose

	design specification.	purpose and user reflecting on the design specification previously agreed.	Reflect Strength durability
Lesson 11	LI – to plan a helmet for Auggie To pully system to lift weight	PLAN END PRODUCT	product design purpose technique select durability
Lesson 12	LI - to plan a helmet for Auggie To pully system to lift weight	Use skill learnt in unit to create product	product design purpose technique select durability
Lesson 13	L.I To study a know artist who uses textiles	1 page spread Use iPad/ books to research	product design purpose technique select durability

*13 due to Year 6 transition commitments

Year 3/4 - Cycle B

Enquiry question – Sculpture

What makes us stand out?

	Learning Intention	Substantive knowledge	Key vocabulary
Lesson 1	L.I To research and describe how artists use assembled materials to create sculptures.	EXPLORE Research purpose, design and build of a range of sculptures - could use sculptures around chesterfield - could use https://www.thenational.academy/teachers/programmes/art-primary-ks2/units/creature-construction-sculpture/lessons/sketchbook-research-artists-who-have-assembled-materials-to-make-sculpture?sid-64f8e3=tEJFzN17mw&sm=0&src=4#video	**Sculpture** **Structure** **Three-dimensional**
Lesson 2	LI: To reflect on Design Ideas stand out.	DESIGN, MAKE & EVALUATE Enquiry Hook lesson- Create 3D structure out of sweets and cocktail sticks Allow children to be creative with sweets and sticks, without too much teacher input. Following construction, children should evaluate their design using proforma sheet.	Strength Join Weight Size, height, width Structure Usage
Lesson 3 & 4	L.I To learn pencil shading techniques L.I To observe and sketch insect, animal,	EXPLORE Pencil techniques then share task 1. Using organic and geometric shapes for the basic structure creates a more accurate sketch.	Lines Shade Tone Texture Depth effect

	or bird features using pencil techniques.	2. Different line styles can be used to create interest in a drawing. 3. Applying tone and shading to make an observational drawing more realistic. 4. Using a photograph to draw from helps you to see details and shapes clearly, making it easier to draw accurately	
Lesson 5	L.I To plan a three-dimensional maquette of a chosen animal, bird, or insect.	EXPLORE & DESIGN Share task with the children https://www.thenational.academy/teachers/programmes/art-primary-ks2/units/creature-construction-sculpture/lessons/sculpture-make-a-maquette?sid-b7de26=rPSLOuhW2r&sm=0&src=4#slide-deck Model how to plan to create a Maquette – discuss materials available to the children Using a proforma, children carefully plan a step by step guide to making their Marquette	**Maquette** **Three-dimensional** **Armature**
Lesson 5 & 6	L.I To construct a three-dimensional maquette of a chosen animal, bird, or insect.	MAKE & EVALUATE Using plans from previous lesson, make their Marquettes Evaluate against plans	Evaluate reflection improve alter
Lesson 7	ARTIST STUDY	EXPLORE https://www.michelle-reader.co.uk/gallery/environmental-campaigns/bellyful-of-plastic.html	**Recyclable material** **Assemble** **Maquette** **Sculpture** **inspirational** **inspire**
Lesson 8	L.T To plan a three dimensional sculpture of chosen animal, bird or insect using recycled materials (and explain my choice of materials).	PLAN Choose recyclable materials based on their properties to create different features like a body, legs or a head. Consider techniques to connect different parts or materials to create a complete sculpture or object. Decide the size, shape, and balance of the sculpture.	**Recyclable material** **Assemble** **Maquette** **Sculpture**

Lesson 9, 10, 11	L.I To select and assemble a creature using recyclable materials	MAKE & EVALUATE	assemble structure materials strength join
Lesson 12	AREA STUDY – SCULPTURE WALK	Explore sculptures around Chesterfield.	represent material
Lesson 13	Plan end product	PLAN – create a clear plan of what they intent to create, why they are creating it and how they are going to make it	**Recyclable material** **Assemble** **Maquette** **Sculpture**
Lesson 14	End product	Share sculptures - Art show - brochure - in a venue (town hall, college, leisure centre)	share reflect evaluate

Year 5/6 - Cycle B

Enquiry question – mechanical

Can I create movement?

	Learning Intention	Substantive knowledge	Key vocabulary
Lesson 1	L.I To look at a range of existing fairground rides and investigate how they move	EXPLORE Children to explore and discuss different fairground rides they have been on. They will think about how they move, what are the components that join them together and the mechanisms that make them work by labelling different pictures of fairground rides. Can children identify the moving parts of a rotating ride/ object? • Are children able to create a detailed diagram of their chosen ride/object? • Can children go some way to explaining how they think a ride/object is powered and/or built?	Rotation Connect Mechanism
Lessons 2 & 3	L.I To investigate ways of using electrical motors to create rotating parts.	EXPLORE Children explore how pulleys and belts can create rotational movements using a motor. They will then investigate how the configuration of different-sized pulleys and the way the belt around them is placed can affect the movement created. The children can experiment with the different ways a motor can be programmed to create appropriate speeds, directions and even pulses of movement. • Do children understand how pulley and belt systems can be used to transfer movement? • Can children describe how an electrical circuit with a motor can be used to create rotating parts? • Can children manipulate their pulleys to create different movements?	circuit power rotate motor pull push force speed strength

Lesson 4	L.I To plan prototype models to investigate stable frameworks.	DESIGN Children to explore and investigate creating a framework for different fairground rides in preparation for designing and making their own fairground ride	Framework Prototype Strength Construction
Lesson 5	To create prototype models to investigate stable frameworks.	MAKE & EVALUATE Work through various challenges to learn different skills that will help with constructing their fairground ride. • Can children describe ways of strengthening and reinforcing structures? • Can children suggest ways in which ideas for frameworks could be developed to ideas for their own fairground ride designs? • Can children use a variety of materials and components accurately?	Framework Prototype Strength Construction structure
Lesson 6	L.I -To design a fairground ride with a rotating part.	DESIGN In this lesson the children will use their previous research and learning from the prototype lesson to inform their designs for a rotating fairground ride. They will need to think about the making process as well as the materials and tools they will need. Designs to be drawn & annotated in detail Can children make a decision about what kind of ride they will make? • Can children design an appropriate electrical circuit for their ride? • Can children describe the process they will need to go through to successfully complete their product?	circuit power rotate motor pull push force speed strength equipment resources mechanism
Lessons 7, 8 & 9	L.I -To make a fairground ride with a rotating part.	MAKE & EVALUATE	equipment resources evaluate reflect improve

			mechanism
Lesson 10	ARTIST STUDY	**Tei, Pete (Peter Ian), Born 1947 (Fairground Artist)** https://player.sheffield.ac.uk/events/pete-tei	skill mechanism
Lesson 11	Plan end product	Using skills and knowledge leant so far, plan to make a fairground ride that moves up or own, or rotates	pulley motor battery power circuit strength
Lesson 12	End product	Show case - **Exhibition (school, town hall leisure centre, secondary school, college, go to infants)**	share reflect evaluate

SEND in Art & Design

Cognition and Learning		Communication and Interaction	
Subject Concerns for SEND	Provision for SEND	Subject Concerns for SEND	Provision for SEND
- Tasks with cognitive overload and too much content for the children to process. - Children with dyslexia can struggle to read and process information. - Phonetic awareness and understanding of vocabulary. - Reading ability- struggles with reading, understanding and processing information that is read.	- Visual guide to the lesson (use of Widgit) - Provide word mats and vocabulary that are specific to the purpose for writing. - Opportunities to talk about texts they have read. (School readers, peers, staff) - Use of phonetically decodable resources. - Possibility to model action/ skill expected - now, then , next cards	- Understanding of vocabulary and ability to communicate effectively with others. - Understanding vocabulary used in Whole class texts. - Process sets of instructions	- Use of pictorial instructions (widget) - Use simple instructions - Now, then, Next cards
Physical and Sensory		**Social, Emotional and Mental Health**	
Subject Concerns for SEND	Provision for SEND	Subject Concerns for SEND	Provision for SEND
- Fine Motor skills and ability to hold a pencil, scissors, etc - Children with dyspraxia struggle to record. - Children with a visual impairment may struggle	- Opportunities to record work using photography - Pencil grips and a wider range tools to identify the child's most appropriate tool. - Ensure and visual aids are on the correct	- Cognitive overload when trying to remember certain parts of the design plan - Struggling to formulate ideas and opinions when evaluating	- Provide prompts and sentence openers to support. - Opportunities to discuss their thoughts, opinions and answers verbally with others.

to see the information on the board. - Children with a hearing impairment may struggle to hear the videos.	background colour and size of font - use of other stimulus (videos, sounds, etc)		- Use of sentence stems, visual, auditory aides. - Record using iPad and create a QR code as evidence

Assessment in Art & Design

Electronic copies can be found on the school network system

Year 3/4 Cycle A - Cooking & Nutrition

If using this document as an electronic record, entering '1' will turn the cell green (target met), '2' = orange (working towards), '3' = red (target not met) and 'e' = (exceeding). *delete this text when printing out!

Cycle A	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	% target met	% working towards	% target not met	% target exceeding
Pupils should be taught to:																																		
create sketch books to record their observations and use them to review and revisit ideas																															0%	0%	0%	0%
improve their mastery of art and design techniques, including drawing, painting and sculpture with a range of materials [for example, pencil, charcoal, paint, clay]																															0%	0%	0%	0%
know about great artists, architects and designers in history																															0%	0%	0%	0%

a- start to know when, where and how food is grown (such as herbs, tomatoes and strawberries) in the UK, Europe and the wider world;
b- understand about seasonality, how this may affect the food availability and plan recipes according to seasonality;
c - understand how to prepare and cook a variety of predominantly savoury dishes safely and hygienically;
d - with support, use a heat source to cook ingredients showing awareness of the need to control the temperature of the hob and/or oven;
e- use a range of techniques such as mashing, whisking, crushing, grating, cutting, kneading and baking;
f- explain that a healthy diet is made up of a variety and balance of different food and drink, as represented in the Eatwell Guide and be able to apply these principles when planning and cooking dishes;
g- understand that to be active and healthy, nutritious food and drink are needed to provide energy for the body;
h-explain that foods contain different substances, such as protein, that are needed for health and be able to apply these principles when planning and preparing dishes;
i- prepare ingredients using appropriate cooking utensils;
j- measure and weigh ingredients to the nearest gram and millilitre;
k-start to independently follow a recipe;

% target met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			
% working towards	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			
% target not met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			
% target exceeding	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			

Year 5/6 Cycle A - Textiles

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Year 5/6 Cycle A	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	% target met	% working towards	% target not met	% target exceeding
know about great artists, architects and designers in history																															0%	0%	0%	0%

a- select appropriate materials, giving reasons;
b- use a variety of techniques, e.g. printing, dyeing, weaving and stitching to create different textural effects;
c- develop skills in stitching, cutting and joining;
d - with a range of media by overlapping and layering in order to create texture,
e- add decoration to create effect;
f- use key vocabulary to demonstrate knowledge and understanding in this strand: colour, fabric, weave, pattern

% target met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			
% working towards	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			
% target not met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			
% target exceeding	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%			

Year 3/4 Cycle B - Sculpture

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Year 3/4 Cycle B - Sculpture	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	% target met	% working towards	% target not met	% target exceeding
improve their mastery of art and design techniques, including drawing, painting and sculpture with a range of materials [for example, pencil, charcoal, paint, clay]																														0%	0%	0%	0%
know about great artists, architects and designers in history																														0%	0%	0%	0%

a- research and describe how artists use assembled materials to create sculptures.
b - Adjust and strengthen the sculpture's structure by securing joints and balancing weight.
c -learn pencil shading techniques (depth, tone, shade, pattern)
d -Using tools, paint, or additional materials to refine adds realism, texture, and character to a sculpture.
e- Compare final sculpture to reflect on what worked well and what could be improved.

% target met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				
% working towards	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				
% target not met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				
% target exceeding	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				

Year 5/6 Cycle B - Mechanical

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Year 5/6 Cycle B - Mechanical	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	name	% target met	% working towards	% target not met	% target exceeding
Can I create Movement																																	
Pupils should be taught to:																																	
create sketch books to record their observations and use them to review and revisit ideas																														0%	0%	0%	0%
improve their mastery of art and design techniques, including drawing, painting and sculpture with a range of materials [for example, pencil, charcoal, paint, clay]																														0%	0%	0%	0%
know about great artists, architects and designers in history																														0%	0%	0%	0%

a- apply their understanding of how to strengthen, stiffen and reinforce more complex structures in order to create more useful characteristics of products;
b- understand and demonstrate that mechanical and electrical systems have an input, process and output;
c - make a high-quality product incorporating gears and a programmable electrical system
d- Assemble components make working models
e- explain how mechanical systems, such as cams, create movement and use mechanical systems in their products;
f- evaluate their ideas against an original design specification

% target met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				
% working towards	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				
% target not met	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				
% target exceeding	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%				