

Design and Technology progression of skills

EYFS

Design									
Birth-Three . Notice patterns with strong contrasts and be attracted by patterns resembling the human face. . Start to make marks intentionally. . Express ideas and feelings through making marks, and sometimes give a meaning to the marks they make. . Explore different materials, using all their senses to investigate them. Manipulate and play with different materials. • Use their imagination as they consider what they can do with different materials. • Make simple models which express their ideas.			Three- Four Years • Make imaginative and complex ‘small worlds’ with blocks and construction kits, such as a city with different buildings and a park. . Explore different materials freely, in order to develop their ideas about how to use them and what to make. • Develop their own ideas and then decide which materials to use to express them. • Join different materials and explore different textures. . Create closed shapes with continuous lines and begin to use these shapes to represent objects. . Explore colour and colour-mixing.			Reception Explore, use and refine a variety of artistic effects to express their ideas and feelings. . Return to and build on their previous learning, refining ideas and developing their ability to represent them. . Create collaboratively sharing ideas, resources and skills.		Creating with materials- ELG . . Safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function. CWM. ELG . Share their creations, explaining the process they have used. CWM. ELG . Make use of props and materials when role playing characters in narratives and stories. CWM. ELG	
DT Progression for planning my ideas	I can respond to an adults question about my ideas when using construction equipment		I can develop and share my ideas through talk with support from my peers or an adult e.g. box modelling, construction with a focus. E.g. Can you build....		I work with my friend, and we copy, share, and develop ideas together. I can work independently to develop my ideas .E.g. Building with Lego		I can plan and create collaboratively, sharing my ideas with my peers and developing my ideas further. As part of enhanced provision and focused adult led learning.		I can carefully develop and share my ideas, experiences, and imagination independently or collaboratively. E.g. Talking about a finished product or talking about the process.
DT Progression for constructing my ideas.	I can build by stacking vertically.	I can join construction components by pushing, clicking, twisting, and snapping.	I can make enclosed spaces and shapes such as walls, tunnels, and houses. I build horizontally. I can tessellate basic shapes.		I can develop my constructions by adding towers, roofs, bridges, and more detailed features. I can balance items. I can explore and add moving parts to my constructions.		I can adapt and improve my models with added features. I add improvements to ensure stability, scale and that it fits the purpose.		I can design, build, review and adapt my constructions to ensure they fit the purpose. I combine materials, shapes, and textures to add details and complexity. I can work on a large and small scale.
DT Progression for sculpting.	I can explore the Playdough.	I can make marks in the Playdough.	I can manipulate the clay/ dough by squashing, rolling, pinching, twisting and cutting.	With support I can use Plastercine to make simple models and representations	I can make something and give meaning to it.	I can make something with clear intentions from start to finish.	I use a variety of techniques, shapes and shapes to sculpt. I can carefully select additional materials to incorporate and enhance my model.		

DT Progression for using scissors.	I can hold the scissors with two hands, and I am learning how the blades close and open	I can hold the scissors and open and close the blades	I can make small snips into the paper.	I can snip the paper and move the scissors forward.	I am beginning to cut along the paper with support from a helping hand holding the paper.	I can cut along a straight line, and I am improving in accuracy.	I can cut a curved line.	I can cut a circle shape, cutting around the shape with round edges. I can cut out a square shape.	I can cut around complex shapes such as people.
DT Progression for joining techniques.	Uses glue sticks to join pieces.	Uses glue spatulas and pva glue to join pieces. I know that this is stronger than using the glue stick.		Joins items using tapes - masking and Sellotape - cutting lengths needed.		Joins items in a variety of ways, sellotape, hole punches, string, glue, masking tape and ribbon with support.		Joins items in a variety of ways, including being cut, torn and glued. Uses techniques such as flanges (joining tabs), slots, braces (e.g. strengthening with extra pieces in Lego) tabs and ties, with some support.	
DT Progression for making.	Create my own piece of art - picture or model.	Create my own piece of art and gives meaning.	Create my own piece of art with some details.	Create my own piece of art with some details, and I begin to self-correct any mistakes.	I return to my piece of artwork on another occasion to self-correct, edit and improve my model. I add details and features to enhance my model.			I review my own work. I discuss strengths and areas for improvement. I make considered improvements.	
DT Progression for cooking.	I can begin to develop a food vocabulary using taste, smell, texture and feel.		I can stir, spread, knead and shape a range of food and ingredients with adult support.		I can begin to work safely and show basic hygiene awareness, e.g., washing hands with adult support.			I can measure and weigh food items, non-standard measures, e.g., spoons, cups with adult support.	

Key Stage 1

DT strands	Year 1	Year 2
Design	• Use pictures and words to convey what they want to design/make. • Propose more than one idea for their product. • Use kits/reclaimed materials to develop more than one idea. • Model ideas/make mock-ups with kits, reclaimed materials. • Select appropriate technique explaining: First... Next... Last.... • Explore ideas by rearranging materials/ingredients. • Select pictures to help develop ideas. • Use drawings to record ideas as they are developed. • Add notes to drawings to help explanations. • Use ICT to communicate their ideas. • Describe their models and drawings of ideas and intentions.	• Use pictures and words to convey what they want to design/make. • Propose more than one idea for their product. • Use kits/reclaimed materials to develop more than one idea. • Model ideas/make mock-ups with kits, reclaimed materials. • Select appropriate technique explaining: First... Next... Last.... • Explore ideas by rearranging materials/ingredients. • Select pictures to help develop ideas. • Use drawings to record ideas as they are developed. • Add notes to drawings to help explanations. • Use ICT to communicate their ideas. • Describe their models and drawings of ideas and intentions.
Make	• Discuss their work as it progresses. • Select materials/ingredients from a limited range that will meet the design criteria. • Select and name the tools needed to work the materials/ingredients. • Explain what they are making. • Explain which materials/ingredients they are using and why. • Name the tools they are using. • Describe what they need to do next. • Use simple finishing techniques suitable for the product they are creating.	• Discuss their work as it progresses. • Select materials/ingredients from a limited range that will meet the design criteria. • Select and name the tools needed to work the materials/ingredients. • Explain what they are making. • Explain which materials/ingredients they are using and why. • Name the tools they are using. • Describe what they need to do next. • Use simple finishing techniques suitable for the product they are creating.
Evaluate	• Explore existing products and investigate how they have been made. • Decide how existing products do/do not achieve their purpose. • Talk about their design as they develop and identify strengths and possible changes. • Note changes made during the making process as annotation to plans/drawings. • Say what they like and do not like about items they have made and attempt to say why. • Discuss how closely their finished product meets their design criteria and how well it meets the needs of the user.	• Explore existing products and investigate how they have been made. • Decide how existing products do/do not achieve their purpose. • Talk about their design as they develop and identify strengths and possible changes. • Note changes made during the making process as annotation to plans/drawings. • Say what they like and do not like about items they have made and attempt to say why. • Discuss how closely their finished product meets their design criteria and how well it meets the needs of the user.

Technical knowledge	Food	• Develop a food vocabulary using taste, smell, texture and feel. • Group familiar food products e.g. fruit and vegetables. • Explain where food comes from. • Cut, peel, grate and chop a range of ingredients. • Use the bridge hold to cut harder foods using a serrated vegetable knife e.g. apple. • Use the claw grip to cut soft foods using a serrated vegetable knife e.g. tomato. • Use a small table knife to spread e.g. soft spreads on to bread. • Use hands to shape dough in to small balls or shapes • Work safely and hygienically. • Understand the need for a variety of foods in a diet. • Measure and weigh food items, non-statutory measures e.g. spoons, cups.	• Develop a food vocabulary using taste, smell, texture and feel. • Group familiar food products e.g. fruit and vegetables. • Explain where food comes from. • Cut, peel, grate and chop a range of ingredients. • Use the bridge hold to cut harder foods using a serrated vegetable knife e.g. apple. • Use the claw grip to cut soft foods using a serrated vegetable knife e.g. tomato. • Use a small table knife to spread e.g. soft spreads on to bread. • Use hands to plait dough. • Work safely and hygienically. • Understand the need for a variety of foods in a diet. • Measure and weigh food items, non-statutory measures e.g. spoons, cups.
	Textiles	• Start to use the appropriate vocabulary to refer to fabrics and tools. • Cut out shapes which have been created by drawing round a template onto the fabric. • Join fabrics by using e.g. running stitch, glue, staples, tape. • Decorate fabrics with attached items e.g. buttons, beads, sequins, braids, ribbons. • Colour fabrics using a range of techniques e.g. fabric paints, printing, painting.	• Start to use the appropriate vocabulary to refer to fabrics and tools. • Cut out shapes which have been created by drawing round a template onto the fabric. • Join fabrics by using e.g. running stitch, glue, staples, over sewing, tape. • Decorate fabrics with attached items e.g. buttons, beads, sequins, braids, ribbons. • Use a fastener to close a bag e.g. zips, buttons, press studs, laces, hook and loop (Velcro). • Colour fabrics using a range of techniques e.g. fabric paints, printing, painting.
	Structures		• Refer to materials tools and techniques using appropriate vocabulary. • Know that freestanding structures stand on their own foundation or base without attachment to anything else. • Explore how to make structures stronger. • Investigate different techniques for stiffening a variety of materials. • Test different methods of enabling structures to remain stable. • Join appropriately for different materials and situations e.g. glue, tape. • Mark out materials to be cut using a template. • Use a glue gun with close supervision.
	Mechanisms	• Make a sliding mechanism out of card. • Understand and use a pivot and lever mechanism using card and a split pin. • Make a wheel mechanism using card and a split pin. • Match a mechanism to the type of movement it makes.	• Use technical vocabulary when describing mechanisms, tools and materials they use. • Join appropriately for different materials and situations e.g. glue, tape. • Try out different axle fixings and their strengths and weaknesses. • Make vehicles with construction kits which contain free running wheels. • Use a range of materials to create models with wheels and axles e.g. tubes, dowel, cotton reels. • Cut dowel using hacksaw and bench hook. • Attach wheels to a chassis using an axle. • Use a hole punch and insert paper fasteners for card.