



**National curriculum aims:**

The national curriculum for design and technology aims to ensure that all pupils:

- develop the creative, technical and practical expertise needed to perform everyday tasks confidently and to participate successfully in an increasingly technological world
- build and apply a repertoire of knowledge, understanding and skills in order to design and make high-quality prototypes and products for a wide range of users
- critique, evaluate and test their ideas and products and the work of others
- understand and apply the principles of nutrition and learn how to cook.

	Reception	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
<b>Developing, planning and communicating ideas.</b>	<ul style="list-style-type: none"> <li>*Construct with a purpose in mind.</li> <li>*Observe closely and replicate things.</li> <li>*Adapt ideas to make them better.</li> <li>*Start to record their experiences appropriately.</li> </ul>	<ul style="list-style-type: none"> <li>*Draw on their own experience to help generate ideas.</li> <li>*Suggest ideas and explain what they are going to do.</li> <li>*Identify a target group for what they intend to design and make.</li> <li>*Model their ideas in card and paper.</li> <li>*Develop their design ideas applying findings from their earlier research</li> </ul>	<ul style="list-style-type: none"> <li>*Generate ideas by drawing on their own and other people's experiences.</li> <li>*Develop their design ideas through discussion, observation, drawing and modelling.</li> <li>*Identify a purpose or target group for what they intend to design and make.</li> <li>*Identify simple design criteria.</li> <li>*Make simple drawings and label</li> </ul>	<ul style="list-style-type: none"> <li>*Generate ideas for an item, considering its purpose and the user/s.</li> <li>*Identify a purpose and establish criteria for a successful product.</li> <li>*Plan the order of their work before starting.</li> <li>*Explore, develop and communicate design proposals by modelling ideas.</li> <li>*Make drawings with labels when designing.</li> </ul>	<ul style="list-style-type: none"> <li>*Generate ideas, considering the purposes for which they are designing.</li> <li>*Make labelled drawings from different views showing specific features.</li> <li>*Develop a clear idea of what has to be done, planning how to use materials, equipment and processes, and suggesting alternative methods of making, if the</li> </ul>	<ul style="list-style-type: none"> <li>*Generate ideas through brainstorming and identify a purpose for their product.</li> <li>*Generate ideas, considering the purposes for which they are designing</li> <li>*Draw up a specification for their design.</li> <li>*Develop a clear idea of what has to be done, planning how to use materials, equipment and processes, and</li> </ul>	<ul style="list-style-type: none"> <li>*Communicate their ideas through detailed labelled drawings.</li> <li>*Develop a design specification.</li> <li>*Explore, develop and communicate aspects of their design proposals by modelling their ideas in a variety of ways.</li> <li>*Plan the order of their work, choosing appropriate materials, tools and techniques.</li> </ul>



			parts.		first attempts fail. *Evaluate products and identify criteria that can be used for their own designs.	suggesting alternative methods of making if the first attempts fail. *Use results of investigations, information sources, including ICT when developing design ideas.	
<b>Working with tools, equipment, materials and components to make quality products (inc-food)</b>	<ul style="list-style-type: none"> <li>*Use a range of tools safely.</li> <li>*Begin to understand the tools, techniques and processes involved in food preparation.</li> <li>*Dismantle objects and look closely at their components.</li> <li>*Observe and discuss materials around them.</li> <li>*Discuss appropriate use of senses.</li> </ul>	<ul style="list-style-type: none"> <li>*Make their design using appropriate techniques.</li> <li>*With help measure, mark out, cut and shape a range of materials.</li> <li>*Use tools e.g. scissors and a hole-punch safely.</li> <li>*Assemble, join and combine materials and components together using a variety of temporary methods e.g. glues or masking tape.</li> <li>*Select and use appropriate fruit and vegetables, processes and tools.</li> </ul>	<ul style="list-style-type: none"> <li>*Begin to select tools and materials; use vocab' to name and describe them.</li> <li>*Measure, cut and score with some accuracy.</li> <li>*Use hand tools safely and appropriately.</li> <li>*Assemble, join and combine materials in order to make a product.</li> <li>*Cut, shape and join fabric to make a simple garment.</li> <li>*Use basic sewing techniques.</li> <li>*Follow safe procedures for food safety and</li> </ul>	<ul style="list-style-type: none"> <li>*Select tools and techniques for making their product.</li> <li>*Measure, mark out, cut, score and assemble components with more accuracy.</li> <li>*Work safely and accurately with a range of simple tools.</li> <li>*Think about their ideas as they make progress and be willing to change things if this helps them improve their work.</li> <li>*Measure, tape or pin, cut and join fabric with some accuracy.</li> <li>*Develop basic sewing skills.</li> <li>*Demonstrate hygienic food preparation and storage.</li> </ul>	<ul style="list-style-type: none"> <li>*Select appropriate tools and techniques for making their product.</li> <li>*Measure, mark out, cut and shape a range of materials, using appropriate tools, equipment and techniques.</li> <li>*Join and combine materials and components accurately in temporary and permanent ways.</li> <li>*Sew using a range of different stitches, weave and knit.</li> <li>*Measure, tape or</li> </ul>	<ul style="list-style-type: none"> <li>*Select appropriate materials, tools and techniques.</li> <li>*Measure and mark out accurately.</li> <li>*Use skills in using different tools and equipment safely and accurately.</li> <li>*Develop the skills of using a range of different stitches, weave and knit.</li> <li>*Weigh and measure accurately (time, dry ingredients, liquids).</li> <li>*Apply the rules for basic food hygiene and other safe practices e.g. hazards relating to</li> </ul>	<ul style="list-style-type: none"> <li>*Select appropriate tools, materials, components and techniques.</li> <li>*Assemble components make working models.</li> <li>*Use tools safely and accurately.</li> <li>*Construct products using permanent joining techniques.</li> <li>*Make modifications as they go along.</li> <li>*Pin, sew and stitch materials together to create a product.</li> <li>*Achieve a quality product.</li> </ul>



		<ul style="list-style-type: none"> <li>*Use basic food handling, hygienic practices and personal hygiene.</li> <li>*Use simple finishing techniques to improve the appearance of their product.</li> </ul>	<ul style="list-style-type: none"> <li>hygiene.</li> <li>*Choose and use appropriate finishing techniques.</li> </ul>	<ul style="list-style-type: none"> <li>*Use finishing techniques to strengthen and improve the appearance of their product using a range of equipment including ICT.</li> </ul>	<ul style="list-style-type: none"> <li>pin, cut and join fabric with some accuracy.</li> <li>*Use simple graphical communication techniques.</li> </ul>	<ul style="list-style-type: none"> <li>the use of ovens.</li> <li>*Cut and join with accuracy to ensure a good-quality finish to the product</li> </ul>	
<b>Evaluating processes and products</b>	<ul style="list-style-type: none"> <li>Discuss reasons that make activities safe or unsafe.</li> <li>Use of correct vocab.*Explain what they are constructing.</li> <li>*With support begin to measure and cut a range of materials.</li> <li>*With support begin to use simple tools.</li> <li>*Begin to join materials together in a</li> </ul>	<ul style="list-style-type: none"> <li>*Evaluate their product by discussing how well it works in relation to the purpose.</li> <li>*Evaluate their products as they are developed, identifying strengths and possible changes they might make.</li> <li>*Evaluate their product by asking questions about what they have made and how</li> </ul>	<ul style="list-style-type: none"> <li>*Evaluate against their design criteria.</li> <li>*Evaluate their products as they are developed, identifying strengths and possible changes they might make.</li> <li>*Talk about their ideas, saying what they like and dislike about them.</li> </ul>	<ul style="list-style-type: none"> <li>*Evaluate their product against original design criteria e.g. how well it meets its intended purpose.</li> <li>*Disassemble and evaluate familiar products.</li> </ul>	<ul style="list-style-type: none"> <li>*Evaluate their work both during and at the end of the assignment.</li> <li>*Evaluate their products carrying out appropriate tests.</li> </ul>	<ul style="list-style-type: none"> <li>*Evaluate a product against the original design specification.</li> <li>*Evaluate it personally and seek evaluation from others.</li> </ul>	<ul style="list-style-type: none"> <li>*Evaluate their products, identifying strengths and areas for development, and carrying out appropriate tests.</li> <li>*Record their evaluations using drawings with labels.</li> <li>*Evaluate against their original criteria and suggest ways that their product could be</li> </ul>



	variety of ways.	they have gone about it.						improved.
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