

## WELLESBOURNE PRIMARY AND NURSERY SCHOOL

### *Living to Learn, Learning to Live*

RESPECT	EFFORT	ATTEND	COOPERATE	HONEST
As emotionally intelligent young people we will listen to and value other opinions. We will create a safe and supportive environment where we will feel confident to investigate without fear of being wrong. To consider social and moral dilemmas, reflect on experience, explore reasoned views and moral and ethical issues.	We will learn to take risks in our learning and challenge ourselves and each other. We will be able to explain clearly our investigations and discoveries. We will develop our thinking skills and resilience so that we become motivated and independent learners.	We will learn the importance of concentration, listening and participating during all of our lessons. We value being on time and getting the most from all of our time at school. We will develop an understanding that by being in school and joining in we will get more from our school and support our friends and fellow learners.	As co-operators we will work together and support each other in developing and listening to our ideas. In doing so we will challenge and explore new learning. We will work together being kind, helpful and gentle to all our school community and valuing its diversity.	We will learn that being honest means being true to ourselves. That by being honest with ourselves we learn more and support our friends more. We will learn the importance of honest self evaluation to help us improve and become independent learners. We will learn that honest support of our friends will help them to be better learners.

### DESIGN TECHNOLOGY CURRICULUM

	AUTUMN	SPRING	SUMMER
YEAR 1	VICTORIAN TOYS	TIE-DYE T-SHIRTS	BEACH HUTS
YEAR 2	SEWING AND TEXTILES	FOOD TECHNOLOGY 3D MODELS	WEAVING
YEAR 3	FOOD TECHNOLOGY	3D MODELS	3D MODELS TEXTILES
YEAR 4	MODELLING – ROMAN STATUES	FOOD TECHNOLOGY TEXTILES	MOVING VEHICLES
YEAR 5	3D MODELS - VOLCANOES	3D MODELS – AIR RAID SHELTERS	FOOD TECHNOLOGY – ANGLO SAXON
YEAR 6	TEXTILES - MAYA HEAD DRESSES	3D MODELS – VIKING LONGSHIPS	

# YEAR 1

## As designers we will ....

AUTUMN	SPRING	SUMMER
<b>Know and understand:</b> Make and design a Victorian toy out of card.	<b>Know and understand:</b> Create a tie-dye t-shirt	<b>Know and understand:</b> Explore, design, make and evaluate a beach hut.
<ul style="list-style-type: none"> <li>draw on our own experience to help generate idea</li> <li>make our design using appropriate techniques</li> <li>with help, measure, mark out, cut and shape a range of material</li> <li>suggest ideas and explain what they are going to do</li> <li>identify a target group for what they are going to design and make</li> <li>model their ideas in card and paper</li> </ul> <p><b><i>This topic links with <b>mathematics</b>.</i></b></p>	<ul style="list-style-type: none"> <li>draw in their own experience to help generate ideas</li> <li>know basic food hygienic practices</li> <li>make our design using appropriate techniques</li> <li>with help, measure, mark out, cut and shape a range of materials</li> <li>evaluate our product by discussing how well it works in relation to 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 they have gone about it</li> </ul> <p><b><i>This topic links with <b>mathematics</b>.</i></b></p>	<ul style="list-style-type: none"> <li>draw in our own experiences to help generate ideas</li> <li>research our designs and apply our findings</li> <li>measure, mark out and cut a range of materials</li> <li>use a range of tools to assemble and combine materials and components</li> <li>evaluate our product by discussing how well it works in relation to purpose</li> <li>select and use appropriately fruit and vegetables, processes and tools</li> <li>use simple finishing techniques to improve the appearance of their product</li> <li>begin to understand that all food comes from plants and animals</li> <li>know how to name and sort foods into five food groups in the Eatwell Plate</li> <li>know basic food handling, hygienic practices and personal hygiene</li> </ul> <p><b><i>This topic links with <b>mathematics</b>.</i></b></p>

## YEAR 2

### As designers we will ....

AUTUMN	SPRING	SUMMER
<b>Know and understand:</b> <ul style="list-style-type: none"> <li>Which materials are best suited to which roles.</li> </ul>	<b>Know and understand:</b> <ul style="list-style-type: none"> <li>What Tudor architecture is like</li> <li>The purpose of an item and how this affects its design</li> <li>Experience will help us to understand how best to design and build something</li> </ul>	<b>Know and understand:</b> <ul style="list-style-type: none"> <li>What weaving is like and where and when it is used</li> </ul>
<ul style="list-style-type: none"> <li>identify simple design criteria and make simple drawings and label parts</li> <li>generate ideas by drawing on our own and others experiences</li> <li>identify a purpose for what we intend to make</li> <li>begin to select tools and materials; use vocabulary to name and describe them</li> <li>use hand tools safely and appropriately</li> <li>cut, shape and join fabric to make a simple garment. Use basic sewing techniques</li> <li>talk about our ideas saying what we like and dislike about them</li> </ul> <p><b><i>This topic links with science and English.</i></b></p>	<ul style="list-style-type: none"> <li>make a Tudor House</li> <li>design purposeful, functional, appealing product for ourselves based on a design</li> <li>select and use a range of tools and equipment and materials</li> <li>evaluate our ideas and products against a design criteria</li> <li>prepare simple dishes safely and hygienically, without using a heat source</li> <li>use techniques for cutting, peeling and grating</li> </ul> <p><b><i>This topic links with English, mathematics, science, history and geography.</i></b></p>	<ul style="list-style-type: none"> <li>to measure, cut and score with some accuracy.</li> <li>develop our design ideas through discussion, observation, drawing and modelling</li> <li>use hand tools safely and appropriately</li> <li>assemble, join and combine materials in order to make a product</li> <li>choose and use appropriate finishing techniques</li> <li>evaluate against their design criteria.</li> <li>evaluate our products as they are developed, identify strengths and possible changes we might make</li> <li>talk about our ideas saying what we like and dislike about them</li> <li>know that food has to be farmed, grown elsewhere or caught</li> </ul> <p><b><i>This topic links with English, mathematics and geography.</i></b></p>

## YEAR 3

### As designers we will ....

AUTUMN	SPRING	SUMMER
<b>Know and understand:</b> How to plan, adapt and evaluate designs.	<b>Know and understand:</b> What a Cornyx is and how it was built. To plan, build and evaluate based on this knowledge.	<b>Know and understand:</b>
<ul style="list-style-type: none"> <li>• use a stimuli to create simple 2D images using a variety of tools and materials</li> <li>• demonstrate hygienic food preparation and storage</li> <li>• know that a healthy diet is made up from a variety and balance of different food and drink, as depicted in the Eatwell Plate</li> </ul> <p><i><b>This topic links with science.</b></i></p>	<ul style="list-style-type: none"> <li>• use a stimuli to create simple 2D images using a variety of tools and materials</li> <li>• identify a purpose and establish criteria for a successful product</li> <li>• explore, develop and communicate design proposals by modelling ideas</li> <li>• make drawings with labels when designing</li> <li>• measure, tape or pin, cut and join fabric with some accuracy</li> <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>• generate ideas for an item, considering its purpose and the user.</li> <li>• plan the order of our work before starting.</li> <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 the make progress and be willing to change if this helps them to improve their work</li> <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>

## YEAR 4

### As designers we will ....

AUTUMN	SPRING	SUMMER
<b>Know and understand:</b> <ul style="list-style-type: none"> <li>How and why sculpture was used to represent Romans</li> </ul>	<b>Know and understand:</b> <ul style="list-style-type: none"> <li>The Tudor Rose</li> </ul>	<b>Know and understand:</b> <ul style="list-style-type: none"> <li>Moving vehicles</li> </ul>
<ul style="list-style-type: none"> <li>make labelled drawings of a product.</li> <li>generate ideas, considering the purposes of the design.</li> <li>develop a clear idea of what has to be done, planning how to use equipment and processes.</li> <li>measure, mark out, cut and shape a range of materials</li> <li>use simple graphical communication techniques</li> </ul>	<ul style="list-style-type: none"> <li>to generate ideas, considering the purpose for which they are designing</li> <li>to develop a clear idea of what has to be done, planning how to use materials, equipment and processes, and suggesting alternatives methods of making, if the first attempt fails</li> <li>to use a variety of technique e.g. printing, dyeing, weaving and stitching to create different textural effects</li> <li>sew using a range of different stitches, to weave and knit</li> <li>measure, tape or pin, cut and join fabric with some accuracy</li> <li>evaluate our work both during and at the end of the assignment</li> </ul>	<ul style="list-style-type: none"> <li>to use software to model 3d objects made up of cuboids</li> <li>understand that ICT allows for situations to be modelled which it would be impractical to try out in real life and investigate the effect of changing variables in these simulations.</li> <li>to find out about the sports Americans play and to create a website explaining this to an English audience</li> <li>evaluate products and identify criteria that can be used for their own designs</li> <li>select appropriate tools and techniques for making our product</li> <li>join and combine materials and components accurately in temporary and permanent ways</li> <li>sew using a range of different stitches, to weave and knit</li> <li>evaluate our work both during and at the end of the assignment</li> <li>evaluate our products carrying out appropriate tests</li> <li>know when and where products were designed and made</li> <li>know whether products can be recycled or reused</li> <li>begin to look at inventors and our work</li> <li>that to be active and healthy, food and drink are needed to provide energy for the body</li> </ul>

## YEAR 5

### As designers we will ....

AUTUMN	SPRING	SUMMER
<p><b>Know and understand:</b> How to use our science knowledge to enhance our volcano models – creating an erupting volcano and understanding about reversible and irreversible changes.</p>	<p><b>Know and understand:</b> What an Anderson shelter look like and how its structure supported its purpose. How to recreate a model Anderson shelter using this understanding of form.</p>	<p><b>Know and understand:</b> How to use our understanding of food hygiene and our cookery skills to create a tasty South American treat.</p>
<ul style="list-style-type: none"> <li>• use a wider range of appropriate material, tools and techniques e.g. kits, textiles, food ingredients, mechanical.</li> <li>• use skills in using different tools and equipment safely and accurately.</li> <li>• evaluate how learning from science and Mathematics can help design and make products that work.</li> </ul> <p><b><i>This topic links to science and mathematics and geography.</i></b></p>	<ul style="list-style-type: none"> <li>• generate different ideas through brainstorming and identify a purpose for their products. Draw up a design specification</li> <li>• evaluate a product against original specification. Evaluate and seek evaluation from others</li> <li>• develop a clear idea of what has to be done, planning how to use materials</li> <li>• model ideas using prototype and pattern pieces</li> <li>• use results of investigations, information sources, including ICT when developing design ideas</li> <li>• draw up a specification for their design</li> <li>• measure and mark out accurately.</li> <li>• use tools and equipment safely and appropriately.</li> <li>• cut and join with accuracy</li> <li>• generate innovative ideas</li> </ul>	<ul style="list-style-type: none"> <li>• investigate how much products cost to make, how sustainable and how what impact they have beyond their intended use.</li> <li>• have a basic understanding of how food is grown, reared or caught in the UK.</li> <li>• measure and mark out accurately</li> <li>• apply the rules of basic food hygiene and learn safe practise. We will weigh and measure dry and liquid food accurately</li> <li>• know how to prepare and cook a range of predominantly savoury dishes.</li> <li>• use a range of techniques when such as peeling and chopping</li> </ul> <p><b><i>This topic links to mathematics.</i></b></p>

## YEAR 6

### As designers we will ....

AUTUMN	SPRING	SUMMER
<b>Know and understand:</b> About traditional Maya headdresses	<b>Know and understand:</b> About how Viking boats were designed to meet their purpose. How to design, make and evaluate a replica boat.	<b>Know and understand:</b> Cookery
<ul style="list-style-type: none"> <li>communicate their ideas through detailed labelled drawings to develop a design specification</li> <li>select tools, materials, components and techniques appropriate to the task</li> <li>make modifications as they go along</li> <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> </ul>	<ul style="list-style-type: none"> <li>communicate ideas through detailed drawings to develop a specific design specification</li> <li>plan order of work choosing appropriate tools and materials</li> <li>assemble components. Construct product using permanent joining techniques</li> <li>evaluate product. Critically evaluate product and its fitness for purpose</li> <li>pin, sew and stitch materials together to make a product</li> <li>demonstrate resourcefulness when tackling practical problems</li> <li>critically evaluate the quality of their design, manufacture and fitness for purpose of their products as they design and make</li> <li>show an awareness of how much products cost to make, how innovative and sustainable they are</li> <li>use science and mathematical knowledge to help plan and make products</li> <li>know that materials have both functional properties and aesthetic properties</li> </ul> <p><i>This topic is linked to history, <b>mathematics</b> and <b>English</b>.</i></p>	<ul style="list-style-type: none"> <li>understand that different food and drink contain different substances – nutrients, water and fibre – that are needed for health</li> <li>know that seasons may affect the food available</li> <li>know that food is processed into ingredients that can be eaten or used in cooking</li> <li>use a range of techniques such as peeling, chopping, slicing, grating, mixing, spreading, kneading and bakery</li> </ul> <p><i>This topic is linked to <b>English</b> and <b>mathematics</b>.</i></p>