

## **EVPA Design and Technology Curriculum Plan**

At Ecton Village Primary Academy, Design and Technology units are taught as a block across the afternoons of one week, 3 times a year. This allows the children the time to design, make and evaluate a product. Products are evaluated based on what is currently available on the market and then designs are based on aspects of evaluating real products. Children are offered exciting and engaging practical tasks, which will give them the skills necessary to build on in their Design and Technology learning when they leave our school and start secondary education.

At EVPA we have mixed age classes, therefore, the curriculum is designed on a two year cycle; this cycle ensures that there is no repetition of coverage and that progression of skills and knowledge is carefully implemented. The skills progression documents and curriculum intent documents that accompany this long term planning document can be found in the 'Design and Technology' area of our school website.

Pupils' achievement in Design and Technology is measured as either 'Working Towards the Expected Standard' 'Working at the Expected Standard' or 'Exceeding the Expected Standard'. A teacher judgement is made at the end of each unit for Design and Technology.

Where appropriate, we link and apply our Science knowledge and learning within Design and Technology, for example our work on Electricity in Science is applied to make switches and games in Design and Technology and our work on food groups and nutrition in Science then helps us design our food when we are cooking in Design and Technology.

The EVPA IREACH values are embedded in all teaching and help our children to recognise when they have engaged with a group, cooperated with one another or shown resilience to evaluate a design and make improvements.

Our D&T learning is linked to our science where possible.

Cycle A	Autumn Term	Summer Term	
Year 1 & 2	<p><b>Mechanisms</b>  <b>Moving Christmas card</b>            Using sliders to move forwards and backwards and levers to move something, children to choose what will be moving</p>	<p><b>Structures (linked to food)</b>  <b>Design a picnic chair to hold teddy</b>            Start with construction toys: Lego, blocks etc. move onto paper/card and then try with everyday materials/junk modelling</p>	<p><b>Cooking and Nutrition</b>  <b>Healthy lunchbox</b>            Sandwiches, snacks and fruit kebabs</p>
Year 3 & 4	<p><b>Mechanisms</b>  <b>Moving Christmas card</b>            Using levers and linkages with a double movement</p>	<p><b>Structures (linked to food)</b>  <b>Pizza box</b>            Create a lunch box for pizza, use art straws, card and triangle shapes to strengthen</p>	<p><b>Cooking and Nutrition</b>  <b>Pizza</b>            Make dough, select toppings from each food group</p>
Year 5 & 6	<p><b>Mechanisms</b>  <b>Christmas decoration</b>            Using gears and pulleys, decoration must turn, build with construction kits first</p>	<p><b>Structures (linked to food)</b>  <b>Packaging for junk food</b>            Use wood or art straws, use triangle on joins, ensure container has separate sections for the different food (burger/chips), add a hinge for a lid</p>	<p><b>Cooking and Nutrition</b>  <b>Healthy junk food</b>            Make a burger and chips or other junk food healthy</p>

Cycle B	Autumn Term	Spring Term	Summer Term
Year 1 & 2	<p><b>Textiles</b>  <b>Stockings</b>            Cut out template, thread needle, running stitch</p>	<p><b>Mechanisms</b>  <b>Make a moving vehicle</b>            Test out using construction kits, create with kebab sticks and attach vehicle on top.</p>	<p><b>Cooking and Nutrition</b>  <b>Vegetables and Smoothies</b>            Exploring cutting skills and prepare fruit and vegetables, make cucumbers, carrots and pepper sticks, make dips (salsa &amp; mint yogurt), make fruit smoothies</p>
Year 3 & 4	<p><b>Textiles</b>  <b>Christmas tree decoration</b>            applique, sew on buttons</p>	<p><b>Electrical Systems (linked to science)</b>  <b>Explore switches</b>            Make switches with different materials, put the switches into a circuit, make a light bulb turn on and off</p>	<p><b>Cooking and Nutrition</b>  <b>Biscuits</b>            Make different doughs, add different flavours, decorate biscuits</p>
Year 5 & 6	<p><b>Textiles</b>  <b>Design a Christmas t-shirt</b>            Tie dye, applique, embroider, fasteners (zips/buttons)</p>	<p><b>Electrical Systems</b>  <b>Design and make a wire game</b>            Make a game using wire with a circuit underneath with a buzzer to go off when switch is closed (wire touched)</p>	<p><b>Cooking and Nutrition</b>  <b>Bread</b>            Try different dough recipes, evaluate, children to choose an additional ingredient to add to their dough (cheese, herbs, tomatoes, seeds etc.)</p>