



# Castleside Primary School

## Design and Technology Long Term Planning



### Rationale for DT Planning:

EYFS planning is based on the Early Years Foundation Stage curriculum and is repeated annually. In EYFS, DT is covered with Expressive Arts and Design. The DT curriculum is planned for single age classes across KS1 and on a four-year cycle across KS2 to ensure full coverage of the National Curriculum. In 2019/2020, all classes are studying Cycle C.

Golden Threads running through the DT curriculum include designing, making, evaluating and technical vocabulary and knowledge.

	<b>Autumn Term</b>	<b>Spring Term</b>	<b>Summer Term</b>
<b>EYFS</b>	<ul style="list-style-type: none"> <li>Provide a place where work in progress can be kept safely.</li> <li>Talk with children about where they can see models and plans in the environment, such as at the local planning office, in the town square.</li> <li>Understands that they can use lines to enclose a space, and then begin to use these shapes to represent objects.</li> <li>Support children in thinking about what they want to make, the processes that may be involved and the materials and resources they might need, such as a photograph to remind them what the climbing frame is like.</li> </ul>	<ul style="list-style-type: none"> <li>Provide children with opportunities to use their skills and explore concepts and ideas through their representations.</li> <li>Have a 'holding bay' where models and works can be retained for a period for children to enjoy, develop, or refer to.</li> <li>Plan imaginative, active experiences, such as 'Going on a bear hunt'. Help them remember the actions of the story (We're Going on a Bear Hunt by Michael Rosen and Helen Oxenbury) and think about the different ways of moving.</li> </ul>	<ul style="list-style-type: none"> <li>Safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function.</li> </ul>
<b>Year 1</b>	<p><b>Animal masks</b> Select from and use a range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing]</p>	<p><b>Making a house</b> Build structures, exploring how they can be made stronger, stiffer and more stable.</p> <ul style="list-style-type: none"> <li>Cardboard modelling</li> </ul> <p><i>Link to history: Great Fire of London</i></p>	<p><b>Making a lighthouse</b> Build structures, exploring how they can be made stronger, stiffer and more stable.</p> <ul style="list-style-type: none"> <li>Junk modelling</li> </ul> <p><i>Link to history: Grace Darling</i> <i>Link to geography: coast</i></p>
<b>Year 2</b>	<p><b>Puppets</b> Select from and use a wide range of materials and</p>	<p><b>Bread</b> Use the basic principles of a healthy and varied</p>	<p><b>Making a lighthouse</b> Build structures, exploring how they can be made</p>

	<p>components, including construction materials, textiles and ingredients, according to their characteristics</p>	<p>diet to prepare dishes. Understand where food comes from.</p> <ul style="list-style-type: none"> <li>• Testing and evaluating</li> </ul> <p><i>Link to history: Great Fire of London</i></p>	<p>stronger, stiffer and more stable.</p> <ul style="list-style-type: none"> <li>• Incorporating a lightbulb</li> </ul> <p><i>Link to history: Grace Darling</i> <i>Link to geography: coast</i></p>
<p><b>KS2 Cycle A</b></p>	<p><b>Food from the Land</b></p> <ul style="list-style-type: none"> <li>• Understand and apply the principles of a healthy and varied diet.</li> <li>• Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques.</li> <li>• Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed.</li> </ul> <p><i>Link to history: Anglo-Saxons</i></p>	<p><b>Pizza</b></p> <ul style="list-style-type: none"> <li>• Understand and apply the principles of a healthy and varied diet.</li> <li>• Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques.</li> <li>• Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed.</li> </ul> <p><i>Link to geography: Italy</i></p>	<p><b>Moving Monsters</b></p> <p>Understand and use mechanical systems in their products [for example, gears, pulleys, cams, levers and linkages]</p> <p>Apply their understanding of computing to program, monitor and control their products.</p> <ul style="list-style-type: none"> <li>• Mechanical systems</li> <li>• LKS2: Computing – programming</li> <li>• UKS2: Cams</li> </ul>
<p><b>KS2 Cycle B</b></p>	<p><b>Mayan Food</b></p> <ul style="list-style-type: none"> <li>• Understand and apply the principles of a healthy and varied diet.</li> <li>• Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques.</li> <li>• Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed</li> </ul> <p><i>Link to history: Mayans</i></p>	<p><b>Light</b></p> <p>Understand and use electrical systems in their products [for example, series circuits incorporating switches, bulbs, buzzers and motors]</p> <ul style="list-style-type: none"> <li>• Building torches with simple circuits</li> <li>• Making periscopes</li> </ul> <p><i>Link to science: light and sound</i></p>	<p><b>Pulleys</b></p> <p>Understand and use mechanical systems in their products [for example, gears, pulleys, cams, levers and linkages]</p> <ul style="list-style-type: none"> <li>• Design something to life a load – pulleys</li> </ul> <p><i>Link to geography: Alaska</i> <i>Link to history: local study - mining</i></p>
<p><b>KS2 Cycle C</b></p>	<p><b>Vases and Sculptures</b></p> <p>Select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately.</p> <p>Select from and use a wider range of materials</p>	<p><b>Vehicles</b></p> <ul style="list-style-type: none"> <li>• Understand how key events and individuals in design and technology have helped shape the world</li> </ul> <p><i>Link to science: forces</i></p>	<p><b>Silk Painting</b></p> <p>Select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately.</p> <p>Select from and use a wider range of materials</p>

	<p>and components, including construction materials, textiles and ingredients, according to their functional properties and aesthetic qualities.</p> <ul style="list-style-type: none"> <li>• LKS2: Junk modelling Mount Olympus</li> <li>• UKS2: Greek pottery</li> </ul> <p><i>Link to history: Ancient Greece</i></p>	<p><b>Burglar alarms (Year 6 only)</b></p> <ul style="list-style-type: none"> <li>• Understand and use electrical systems in their products [for example, series circuits incorporating switches, bulbs, buzzers and motors]</li> </ul> <p><i>Link to science: electricity</i></p>	<p>and components, including construction materials, textiles and ingredients, according to their functional properties and aesthetic qualities.</p> <ul style="list-style-type: none"> <li>• Paisley pattern (exploring textiles)</li> </ul> <p><i>Link to geography: India</i></p>
<p><b>KS2 Cycle D</b></p>	<p><b>Bag challenge</b></p> <ul style="list-style-type: none"> <li>• Investigate and analyse a range of existing products.</li> <li>• 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.</li> <li>• Select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately.</li> </ul>	<p><b>Bridges</b></p> <ul style="list-style-type: none"> <li>• Select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately.</li> <li>• 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.</li> <li>• Apply their understanding of how to strengthen, stiffen and reinforce more complex structures.</li> </ul>	<p><b>Smoothies</b></p> <ul style="list-style-type: none"> <li>• Understand and apply the principles of a healthy and varied diet.</li> <li>• Prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques.</li> <li>• Understand seasonality, and know where and how a variety of ingredients are grown, reared, caught and processed.</li> </ul> <p><i>Link to geography: Amazon Rainforest</i></p>