

DT Progression Map: Technical Knowledge

Big Idea explained	Nursery	Reception	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
<p>Big Idea</p> <p>Technical knowledge</p> <p>What knowledge do children need to know before accomplishing the task.</p>	<p>COOKING</p> <p>To know that ingredients are combined to make a dish.</p>	<p>COOKING</p> <p>To know that ingredients are combined to make a dish.</p>	<p>COOKING</p> <p>To know the ingredients required to make a sandwich.</p> <p>SIMPLE MACHINES - levers To know that a lever is used to add force to an object. To know that a maze is a puzzle with a path to get from start to finish.</p>	<p>COOKING</p> <p>To know that dips and dippers can be savory and sweet.</p> <p>Textiles – paper weaving To know that weaving is made using an over under pattern.</p>	<p>COOKING</p> <p>To know the ingredients required to make a pizza.</p> <p>Textiles – loom weaving To know that a loom is the mechanism used to weave material and how it works.</p>	<p>ELECTRICITY To know that copper is a conductive material. To know that the components in a LED circuit need to be placed in a specific orientation. STRUCTURES To know that 3 dimensional shapes have different strengths. To know that adding reinforcement to a structure will strengthen it.</p>	<p>STRUCTURES - Bridges To know the different types of bridges and their purpose. To know that all bridges use reinforcement to strengthen them.</p>	<p>TEXTILES – cross stitching To know the running stitch, ½ cross stitch and full cross stitch. SIMPLE MECHANISMS - pulleys To know the components of a pulley.</p>

DT Progression Map: Practical Knowledge

Big Idea explained	Nursery	Reception	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
<p>Big Idea</p> <p>Practical knowledge</p> <p>What children need to be able to do before accomplishing a task.</p>	<p>COOKING To know how to combine ingredients.</p>	<p>COOKING To know how to combine ingredients.</p>	<p>COOKING To know how to prepare myself, the space and the ingredients for cooking. To know how to combine ingredients to make a sandwich.</p>	<p>COOKING To know how to prepare myself, the space and the ingredients for cooking. To know how to measure ingredients with teaspoons and tablespoons. To know how to combine ingredients to make a sweet or savory dip.</p>	<p>COOKING To know how to follow a recipe. To know how to write a recipe.</p>	<p>ELECTRICITY To know how to make a switch using copper wire, a LED bulb, a switch and a cell battery. To know how to draw a switch.</p>	<p>STRUCTURES - bridges To know how to read a set of instructions. To know how to build a bridge using K'NEX</p>	<p>SIMPLE STRUCTURES - pulleys To know how to incorporate a pulley into a variety of designs.</p>
			<p>SIMPLE STRUCTURES - levers To know how to use a variety of materials to create a maze. To know how to build a lever.</p>	<p>TEXTILES To know how to weave a variety of materials.</p>	<p>TEXTILES To know how to weave a design using yarn on a loom.</p>	<p>STRUCTURES To know how to strengthen a structure using reinforcement.</p>		<p>TEXTILES – embroidery To know how to use a variety of stitches to embroidery a design.</p>

DT Progression Map: Design Inspiration

Big Idea explained	Nursery	Reception	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
<p>Big Idea</p> <p>Design inspiration</p> <p>Children take inspiration from successful design that already exist.</p>	<p>COOKING To know that foods are combined based on likes and dislikes.</p>	<p>COOKING To know that foods are combined based on likes and dislikes.</p>	<p>COOKING To know how take inspiration from popular sandwich designs.</p>	<p>COOKING To know how take inspiration from popular dip and dipper combinations.</p>	<p>COOKING To know how to take inspiration from popular types of pizza.</p>	<p>ELECTRICITY To know how to incorporate a light up element in a design.</p>	<p>STRUCTURES - bridges To know how to take inspiration from existing bridge designs.</p>	<p>SIMPLE MACHINES - pulleys To know how to take inspiration from machines that use pulleys.</p>
			<p>SIMPLE MACHINES - levers To know how to take inspiration from existing marble maze designs.</p>	<p>TEXTILES – weaving To know how to take inspiration from existing placemat designs.</p>	<p>TEXTILES – weaving To know how to take inspiration from Ancient Egyptian doll designs.</p>	<p>STRUCTURES To know how to take inspiration from existing structures.</p>		<p>TEXTILES – embroidery To know how to take inspiration from pre-existing embroidery designs.</p>

DT Progression Map: Design Process

Big Idea explained	Nursery	Reception	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Big Idea Design process Make, break, recreate	COOKING To know how to combine foods in different ways.	COOKING To know how to combine foods in different ways.	COOKING To know how to make, reflect and improve the sandwich recipe.	COOKING To know how to make, reflect and improve the dip and dippers recipe.	COOKING To know how to make, reflect and improve the pizza recipe.	ELECTRICITY To know how to make, reflect and improve a circuit.	STRUCTURES - bridges To know how to make, break and recreate a bridge design.	TEXTILES - embroidery To know how to make, break and recreate a embroidery design.
			SIMPLE MECHANISMS - levers To know how to make choices when designing based on the success of previous marble maze designs.	TEXTILES – weaving To know how to make material choices when designing based on the success of previous woven designs.	TEXTILES – weaving To know how to make, reflect and improve a woven design.	STRUCTURES To know how to identify weaknesses and strengths in a design. To know how to reflect on the building process while following design instructions.		SIMPLE MECHANISM – pulley To know how to make, break and recreate the design of a pulley mechanism.