

Design and Technology Medium Term Curriculum Map

Differentiation by input see the weekly planning sheet/ -Resources -see the weekly planning / <i>Minimum</i> Assessment for Learning strategies for all topics = Peer Talk; targeted questioning; mini white boards; and self and peer marking						
- Long term memory development strategies= Recapping pervious learning at the start of each new topic / Long term memory strategy linked to the objectives on this sheet for each week -Design and Technology Cultural Capital = Through a range of experiences the children develop their designing and making skills across cooking, sewing and construction						
Year A			Year B			
Autumn term		Spring Term	Summer term		Summer Term	
Ruby Class Reception/Nursery	<p>Choose the right resources to carry out their plans. Use one-handed tools and equipment, for example, making snips in paper with scissors. Explore how things work. Make imaginative and complex small worlds with blocks and construction kits, such as a city with different buildings and a park. Explore different materials freely, in order to develop their ideas about how to use them and what to make. Develop their own ideas and then decide which materials to use to express them. Create closed shapes with continuous lines, ad begin to use these shapes to represent objects.</p> <p>Develop their small motor skills so that they can use a range of tools competently, safely and confidently. Explore, use and refine a variety of artistic effects to express their ideas and feelings. Return to and build on their previous learning, refining their ideas and developing their ability to represent them. Create collaboratively, sharing ideas, resources and skills. Use a range of small tools, including scissors, paintbrushes and cutlery. Safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function. Share their creations, explaining the process they have used.</p>					
Sapphire Class Year 1/2	<p>Great fire of London-House Models</p> <p>LO 1: How are houses made? What structures and materials are used. Label the different features of a house and think about what real-life materials they can use to make different features. Annotate a diagram.</p> <p>LO 2: Think about how to make free-standing structures, how to stay strong. Have a go using a variety of resources, what works well, what doesn't and why.</p> <p>LO 3: The children plan and draw their house thinking about the different resources they will need. Write some simple instructions.</p> <p>LO 4/5: Make their house and decorate it following their instructions and thinking about ways to improve.</p> <p>LO 6: The children evaluate the process in terms of sturdiness, easy to stand how could they make it even better.</p>	<p>Fruit and Vegetables</p> <p>LO 1: Children are introduced to different types of fruit where do they grow, what do they look like, how do they taste, countries of origin</p> <p>LO 2: Children are introduced to different types of vegetables where do they grow, what do they look like, how do they taste, countries of origin</p> <p>LO 3: The children create an instructions text-recipe for a fruit salad. What is going to e in it and why</p> <p>LO 4: The children make their fruit salad and evaluate the process</p> <p>LO 5: The children create a design storyboard on how they are going to make their vegetable kebab. What ingredients are they going to use and why?</p> <p>LO 6 The children make their vegetable kebabs and evaluate the process.</p>	<p>Weaving</p> <p>LO 1: Understanding what weaving is, what weaving is around us, draw some different types of weaving thinking about the patterns.</p> <p>LO 2: Create their own weaving design and then have a go at practising how to weave using paper. Plan their design for next week's make.</p> <p>LO 3: Have a go at creating and making their own paper weaving and then if they have time using string to weave.</p> <p>LO 4: Create their design for circular weaving, try to think what colours match.</p> <p>LO 5: Make their circular weaving using a cardboard circle with lots of different coloured thread.</p> <p>LO 6: Evaluate the whole process and complete any other weaving activities.</p>	<p>Food Types</p> <p>LO 1: Go through the different food groups carbohydrates, dairy, protein, fruits and vegetables and fats. Identify what foods go into what specific groups.</p> <p>LO 2: Name, evaluate, taste and classify a range of food from a variety of different food groups. Create their own balanced meal.</p> <p>LO 3: Children to design and write a recipe for fairy cakes. What are the ingredients, instructions and how could they be designed?</p> <p>LO 4: Make their fairy cakes following the recipes and then evaluate the process especially the taste.</p> <p>LO 5: what are the ingredients in biscuits. Try some different types of biscuits and discuss what they are made of. Design their own festive biscuits. Create a recipe.</p> <p>LO 6 Make their own festive biscuits and evaluate the whole process.</p>	<p>Mechanisms</p> <p>LO 1: To look at a range of books where there is movement in terms of levers, wheels and sliders. Evaluate how they work and see if they can create any of the movement devices</p> <p>LO 2: To think about making a person that uses levers to move, split pins. Compete their design and then have a practice at making a moving joint.</p> <p>LO 3: Make their moving person design and put it all together using the split pins.</p> <p>LO 4: Look at different games/ideas that use sliders. Think about a design that they could and plan out a paper version and a design board so that they can make it the following lesson</p> <p>LO 5/6: Make the slider picture/game and decorate it. Evaluate the process and make any appropriate changes.</p>	<p>Sewing Animals</p> <p>LO 1: Look at creating their own animals using different pieces of materials from within a stencil and sticking it together using glue.</p> <p>LO 2/3: using the animal stencil sewing packs create their animals following the instructions and using the basic sewing stitches.</p> <p>LO 4: Design their own animal using examples from the sewing kits and then create a design board of step-by-step instructions.</p> <p>LO 5/6: Using their deign board make their specific animal design and evaluate the process on-going and at the end.</p>
Diamond Class Year 3/4	<p>Sandwiches</p> <p>Lo 1:To understand what makes a sandwich and the different types you can get e.g. Bread, panini, bagel, toastie. What food groups are involved in a sandwich.</p> <p>Lo 2: Try out a variety of different sandwich types and evaluate each one under a number of headings e.g. food groups, taste, texture, flavour, purpose</p> <p>Lo 3: Design their own sandwich and think about all the research they completed last week and justify why they have created what they have.</p> <p>Lo 4: Create their sandwich and evaluate the whole process in terms of the headings discussed earlier in the unit.</p> <p>Lo 5: In groups create their own tea party with a variety of food type, both sweet and savoury. Organise who will do what and the them of their tea party.</p> <p>Lo 6: Create their tea party and evaluate the whole process.</p>	<p>Moving Monsters</p> <p>LO 1: Show the children objects that use air to make the work e.g whistle, recorder, balloon, bicycle pump. Construct a simple pneumatic system by joining a balloon to tubing to a washing up liquid bottle. How does it work.</p> <p>LO 2: Make alternative pneumatic systems by joining plastic tubing and syringes. What happens? Compare similarities and differences between the two</p> <p>LO 3: Brainstorming ideas for a moving monster e.g. closing mouth, moving wings. Think about how they will make the monster using a design storyboard.</p> <p>LO 4/5: Making the monster using the pneumatic part decorating it and following all of the design instructions.</p> <p>LO 6: Evaluating the whole process.</p>	<p>Cushions</p> <p>LO 1: Look at a range of different cushions that we use around us, what they are made from and what shapes they are. Create a cushion photoboard.</p> <p>LO 2: From their research create their own cushion design and think about the various materials they will need.</p> <p>LO 3: Sewing- thinking about how they will sew the two materials together to form the cushion shape. Practice on material the different stitches they will require for their mini-cushion.</p> <p>LO 4/5/6: Creating their cushions using the sewing techniques they have learned and the design instructions they created. Think about their patterns and the durability of their cushion. Evaluate the whole process.</p>	<p>Snacks from other cultures</p> <p>Lo 1: Investigate different foods from cultures around the world and make associations between the country and the food.</p> <p>LO 2: Try out a variety of foods they investigate the previous week and think about the way they taste and what they could be used for.</p> <p>LO 3: Design and write recipes for their specific food they want to make from a specific culture.</p> <p>LO 4: Make their traditional snacks from other cultures and evaluate them.</p> <p>LO 5: Design an international snack festival with a range of different snacks from a variety of cultures.</p> <p>LO 6: Make the snacks and evaluate their food in terms of flavour, taste and appearance.</p>	<p>Photo Frames</p> <p>LO 1: Look at the different types of photograph frames, what they are made of shape and also decoration.</p> <p>LO 2: Investigate how to make a structure stronger using the strength test. (triangle is the strongest, how to make corners stronger.</p> <p>LO 3: Designing a photo frame. Create a design board of the resources required and the different steps to making the frame.</p> <p>LO 4/5: Following their instructions from their design board making their phot frame and decorating it to the final product.</p> <p>LO 6: Evaluating the process and thinking about what went well and what they could do better next time.</p>	<p>Money Containers</p> <p>LO 1: Look at the different types of money containers you can make, e.g. wallets and purses. Build up a mood board of different types and think what they are made from.</p> <p>LO 2: Design their own money container thinking about they will be using felt and what type of fastener they require button or velcro</p> <p>LO 3: Practice the different types of stitches they will be using to make their money container on Binca</p> <p>LO 4/5/6: Make their money container using the various stitches and following their design board instructions. Evaluate the process both on-going and at the end.</p>
Emerald class Year 5/6	<p>Bread and Biscuits</p> <p>LO:1 To understand how bread is made and what different types there are.</p> <p>LO 2: Be able to plan and design their own bread. Write a recipe</p> <p>LO 3: To make their own bread and evaluate the process.</p> <p>LO 4: To understand the full range of biscuits and the different ingredients that can be used.</p> <p>LO 5: Be able to plan and design their biscuit recipe and write it.</p> <p>To make their own biscuits and evaluate the process.</p>	<p>Shelters</p> <p>LO: What is a shelter and what different types are used around us in everyday life.</p> <p>LO 2: What materials are used on shelters and why.</p> <p>LO 3: Plan and design their shelter with a clear list of resources and a clear set of instructions.</p> <p>LO 4: Make their shelter following the step-by-step instructions</p> <p>LO 5: Make their shelter following the step-by-step instructions</p> <p>LO 6: Evaluate the whole process. What things worked well and what would they change next time.</p>	<p>Slippers</p> <p>LO 1: Review their knowledge of the different types of sewing stitches that they are required to use and practice them on scrap pieces of materials.</p> <p>LO 2: Look at a range of different slippers and think about the materials that have been used and how they have been made.</p> <p>LO 3: Design their own slippers and think about the resources that are needed and the different types of stitches that will be needed. Create a design board.</p> <p>LO 4/5/6: Following their design boards the children need to step-by step create their slipper using the appropriate stitches and making any relevant changes to the process.</p>	<p>Pizzas, Salads, Pasta</p> <p>Lo 1: How are pizzas made, what are the ingredients and what are the usual toppings. Design your pizza toppings in preparation for making.</p> <p>LO 2: Using their recipe and list of instructions make their pizzas and then evaluate the process.</p> <p>LO 3: Look at the different types of pasta that you can have. Try it, describe the shape and evaluate it. What sauces can you have with the pasta. Design a pasta sauce recipe.</p> <p>LO 4: Using their recipe and their list of resources make their pastas and then evaluate the process.</p> <p>LO 5: What makes a salad. Look at the different ingredients that could be used to make a salad. Design their own salad thinking about the combinations.</p> <p>LO 6: Following the recipes make their salads and the evaluate theirs and other members of the class.</p>	<p>Pencil cases</p> <p>LO 1: Look at the different types of stitches using binca including running, back, cross and blanket stitch.</p> <p>LO 2: Looking at a range of pencil cases and evaluate the way that they have been made.</p> <p>LO 3: Design their pencil cases and think about the types of stitches they are going to need and also the materials they will use to make it.</p> <p>LO4/5: Making the pencil cases using the different types of stitches and following the design instructions.</p> <p>LO 6: Evaluating the process of making the pencil cases and completing any last-minute alterations</p>	<p>Musical Instruments</p> <p>LO 1: To investigate how musical instruments work and what they are made from.</p> <p>LO 2: Think about designing an instrument, how will it work to produce a sound and what is it made from.</p> <p>LO 3: Design their instruments with a clear set of instructions, resources and an explanation as to how it will work.</p> <p>LO 4: Following on from their design start to make the instrument and evaluate the process as an on-going process.</p> <p>LO 5: Continue to make and then decorate their musical instrument.</p> <p>LO 6: Evaluate the making process and say what things have worked well and what they could improve next time.</p>