**Year 4 DT Curriculum (MTP)**

**Science LTP**

**Holy Trinity C of E Primary School**

**Science LTP**



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| **Designing and Evaluating** | **Food Awareness - Healthy and varied diet** | **Mechanisms - Levers and Linkages** | **Electrical Systems - Simple programming and control** |
| D: Can make a relevant plan of their ideaD/E: Can investigate and analyse a range of existing products, discussing their features, construction, purpose and intended usersD: Can use their research to develop some of their own design criteriaD: Can produce a detailed step-by-step planD: Can come up with their own design criteria about their productD: Gather information about users’ needs and wants, and develop design criteria to inform the design of products that are fit for purpose.D: Generate, develop, model and communicate realistic ideas through discussion and annotated sketches.E: Can explain what they like about their product and what they could change to improve itE: Can investigate a range of existing productsE: Can evaluate their product against a design criteria | D: Can produce a detailed step-by-step planD: Can come up with their own design criteria about their productM: Can use a range of tools, equipment and techniquesE: Can investigate a range of existing productsE: Can evaluate their product against a design criteria FA: Can understand, use and explain different techniques and methods when cookingFA: Can cook their product in the oven, ensuring it is fully cookedFA: To know about one key chef and their contribution to healthy eating | D: Can take into account the ideas of others when designingD: Can produce a plan and explain it to othersM: Can continue to work at their product, even though their original idea may not have workedE: Can suggest some improvements and say what was good and what was not so good about their original designsE: Can begin to explain how they can improve their original designsE: Can evaluate a product thinking about both appearance and the way it workM: Can use mechanical systems such as levers and linkages to create movement | D: Gather information about users’ needs and wants, and develop design criteria to inform the design of products that are fit for purpose.D: Generate, develop, model and communicate realistic ideas through discussion and annotated sketches. M: Select from and use tools and equipment to cut, shape, join and finish with some accuracyM: Connect simple electrical components and a battery in a series circuit to achieve a functional outcome.M: Program a standalone control box, microcontroller or interface box to enhance the way the product works.El: Understand and use computing to program and control products containing electrical systems, such as series circuits incorporating switches, bulbs and buzzers.El: Know and use technical vocabulary relevant to the project.E: Investigate and analyse a range of existing battery-powered products, including pre-programmed and programmable products.E: Evaluate their ideas and products against their own design criteria and identify the strengths and areas for improvement in their work. |

**NB**

**Designing and Evaluation runs through all of the strands taught. Within lessons, consider including work on designers, chefs and inventors/inventions (e.g. George Stephenson, Nigella Lawson)**