| Year 1 Year 2 | Year 3 | Year 4 | Year 5 | Year 6 |
| :---: | :---: | :---: | :---: | :---: |
| KS1 National Curriculum <br> design purposeful, functional, appealing products for themselves and other users based on design criteria <br> generate, develop, model and communicate their ideas through talking, drawing, templates, mock-ups and, where appropriate, information and communication technology <br> select from and use a range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing] <br> select from and use a wide range of materials and components, including construction materials, textiles and ingredients, according to their characteristics <br> explore and evaluate a range of existing products | KS2 National Curriculum <br> use research and develop design criteria to inform the design of innovative, functional, appealing products that are fit for purpose, aimed at particular individuals or groups <br> generate, develop, model and communicate their ideas through discussion, annotated sketches, cross-sectional and exploded diagrams, prototypes, pattern pieces and computer-aided design <br> select from and use a wider range of tools and equipment to perform practical tasks [for example, cutting, shaping, joining and finishing], accurately <br> 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 <br> investigate and analyse a range of existing products <br> evaluate their ideas and products against their own design criteria and consider the views of others to improve their work <br> understand how key events and individuals in design and technology have helped shape the world <br> apply their understanding of how to strengthen, stiffen and reinforce more complex structures understand and use mechanical systems in their products [for example, gears, pulleys, cams, levers and linkages] <br> understand and use electrical systems in their products [for example, series circuits incorporating switches, bulbs, buzzers and motors] |  |  |  |


| evaluate their ideas and products <br> against design criteria | apply their understanding of computing to program, monitor and control their products. |
| :--- | :--- | :--- |
| build structures, exploring how they <br> can be made stronger, stiffer and more <br> stable <br> explore and use mechanisms [for <br> example, levers, sliders, wheels and <br> axles], in their products. <br> use the basic principles of a healthy <br> and varied diet to prepare dishes <br> understand where food comes from | prepare and cook a variety of predominantly savoury dishes using a range of cooking techniques |
| understand seasonality and know where and how a variety of ingredients are grown, reared, caught and processed |  |

## The Federation of <br> Stoke Hill Schools



| M |  |  | explaining their choices | explaining their choices; |  | wide range of tools and equipment, explaining their choices; |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| A | begin to select from a range of | begin to select from a range of |  |  | with growing confidence, select |  |
|  | hand tools and | hand tools and | select from | select from | from a wide range | select from a range of materials |
| K | equipment, such | equipment, such | a range of | a range of | of tools and | and components according to |
|  | as scissors, | as scissors, | materials | materials | equipment, | their functional properties and |
| E | graters, zesters, | graters, zesters, | and | and | explaining their | aesthetic qualities; |
|  | safe knives, juicer; | safe knives, juicer; | components according to | components according to | choices; |  |
|  | select from a range of materials, textiles | select from a range of materials, textiles | their functional properties | their functional properties | select from <br> a range of | making; |
|  | and components | and components | and | and | and | Practical skills and techniques |
|  | according to their characteristics | according to their characteristics | aesthetic qualities; | aesthetic qualities; | component s according to their | learn to use a range of tools and equipment safely and appropriately and learn to follow hygiene |
|  | Practical skills and techniques | Practical skills and techniques | place the main stages of making in a systematic order; | place the main stages of making in a systematic order; | functional properties and | procedures; |
|  | learn to use hand tools and kitchen | learn to use hand tools and kitchen | systematic order; | systematic order; | aesthetic qualities; | independently take exact measurements and mark out, to within 1 millimetre; |
|  | equipment safely and appropriately | equipment safely and appropriately | Practical skills and techniques | Practical skills and techniques |  | use a full range of materials and |
|  | and learn to follow hygiene procedures; | and learn to follow hygiene procedures; | learn to use a range of tools and equipment | learn to use a range of tools and equipment | create step-by-step plans as a guide to making; | components, including construction materials and kits, textiles, and mechanical components; |
|  | use a range of materials and | use a range of materials and | safely, <br> appropriately and | safely, <br> appropriately <br> and | Practical skills and techniques <br> learn to use a | cut a range of materials with precision and accuracy; |
|  | components | components | accurately | accurately | range of tools | shape and score materials with precision |
|  | , including <br> textiles and | , including <br> textiles and | and learn to follow | and learn to follow | and equipment | shape and score materials with precision and accuracy; |
|  | food | food | hygiene | hygiene | safely and appropriately |  |
|  | ingredients; | ingredients; | procedures; | procedures; | and learn to | assemble, join and combine materials |



| measuring and weighing ingredients using measuring cups; <br> begin to use simple finishing techniques to improve the appearance of their product, such as adding simple decorations. | measuring and weighing ingredients using measuring cups; <br> begin to use simple finishing techniques to improve the appearance of their product, such as adding simple decorations. | to measure, cut, shape and join fabric with some accuracy to make a simple product; <br> join textiles with an appropriate sewing technique; <br> begin to select and use different and appropriate finishing techniques to improve the appearance of a product such as hemming, tie-dye, fabric paints and digital graphics. | to measure, cut, shape and join fabric with some accuracy to make a simple product; <br> join textiles with an appropriate sewing technique; <br> begin to select and use different and appropriate finishing techniques to improve the appearance of a product such as hemming, tie-dye, fabric paints and digital graphics. | demonstrate how to measure, make a seam allowance, tape, pin, cut, shape and join fabric with precision to make a more complex product; <br> join textiles using a greater variety of stitches, such as backstitch, whip stitch, blanket stitch; <br> refine the finish using techniques to improve the appearance of their product, such as sanding or a more precise scissor cut after roughly cutting out a shape. |
| :---: | :---: | :---: | :---: | :---: |


|  | Year 1 | Year 2 | Year 3 | Year 4 | Year 5 | Year 6 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| E V A L U A T E | Children can: explore and evaluate existing products mainly through discussions, comparisons and simple written evaluations; <br> explain <br> positives <br> and things <br> to improve <br> for existing <br> products; <br> explore what materials products are made from; <br> talk about their design ideas and what they are making; <br> as they work, start to identify strengths and possible changes they might make to refine their existing design; | Children can: <br> explore and evaluate existing products mainly through discussions, comparisons and simple written evaluations; <br> explain <br> positives <br> and things <br> to improve <br> for existing <br> products; <br> explore what materials products are made from; <br> talk about their design ideas and what they are making; <br> as they work, start to identify strengths and possible changes they might make to refine their existing design; | Children can: <br> explore and evaluate existing products, explaining the purpose of the product and whether it is designed well to meet the intended purpose; <br> explore what materials/ingredients products are made from and suggest reasons for this; <br> consider their design criteria as they make progress and are willing to alter their plans, sometimes considering the views of others if this helps them to improve their product; <br> evaluate their product against their original design criteria; | Children can: <br> explore and evaluate existing products, explaining the purpose of the product and whether it is designed well to meet the intended purpose; <br> explore what materials/ingredients products are made from and suggest reasons for this; <br> consider their design criteria as they make progress and are willing to alter their plans, sometimes considering the views of others if this helps them to improve their product; <br> evaluate their product against their original design criteria; | Children can: <br> complete detailed competitor analysis of other products on the market; <br> critically evaluate the quality of design, manufacture and fitness for purpose of products as they design and make; <br> evaluate their ideas and products against the original design criteria, making changes as needed. | Children can: <br> complete detailed competitor analysis of other products on the market; <br> critically evaluate the quality of design, manufacture and fitness for purpose of products as they design and make; <br> evaluate their ideas and products against the original design criteria, making changes as needed. |

$\left.\begin{array}{|l|l|l|l|l|l|}\hline & & & \begin{array}{l}\text { evaluate their } \\ \text { products and ideas } \\ \text { against their simple } \\ \text { design criteria; }\end{array} & \begin{array}{l}\text { evaluate their } \\ \text { products and ideas } \\ \text { against their simple } \\ \text { design criteria; } \\ \text { including technological } \\ \text { developments, and designs } \\ \text { of individuals in design and } \\ \text { technology that have helped } \\ \text { shape the world. } \\ \text { sometimes ingolves } \\ \text { repeating different stages } \\ \text { of the process. }\end{array} & \begin{array}{l}\text { start to understand that } \\ \text { the iterative process } \\ \text { sometimes involves } \\ \text { repeating different stages } \\ \text { of the process. }\end{array}\end{array} \begin{array}{l}\text { evaluate the key events, } \\ \text { including technological } \\ \text { developments, and designs } \\ \text { of individuals in design and } \\ \text { technology that have helped } \\ \text { shape the world. }\end{array}\right\}$


|  |  |  | monitor and control a <br> product. <br> explain how <br> mechanical systems <br> such as levers and <br> linkages create <br> movement <br> explain how <br> mechanical <br> systems such as <br> levers and linkages <br> create movement <br> their products. systems in <br> use mechanical systems in <br> their products. |  |  |
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## The Federation of Stoke Hill School

|  | Year 1 | Year 2 | Year 3 | Year 4 | Year 5 | Year 6 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| C O O K I N G U U T | Children can: <br> explain where in the world different foods originate from <br> understand that all food comes from plants or animals <br> understand that food has to be farmed, grown elsewhere (e.g. home) or caught <br> name and sort foods into the five groups in the Eatwell Guide <br> understand that everyone should eat at least five portions | Children can: explain where in the world different foods originate from <br> understand that all food comes from plants or animals <br> understand that food has to be farmed, grown elsewhere (e.g. home) or caught <br> name and sort foods into the five groups in the Eatwell Guide <br> understand that everyone should eat at least five | Children can: <br> start to know when, where and how food is grown (such as herbs, tomatoes and strawberries) in the UK, Europe and the wider world <br> understand how to prepare and cook a variety of predominantly savoury dishes safely and hygienically <br> with support, use a heat source to cook ingredients showing awareness of the need to control the temperature of the hob and/or oven <br> use a range of techniques such as mashing, whisking, crushing, grating, cutting, kneading and baking | Children can: <br> start to know when, where and how food is grown (such as herbs, tomatoes and strawberries) in the UK, Europe and the wider world <br> understand how to prepare and cook a variety of predominantly savoury dishes safely and hygienically <br> with support, use a heat source to cook ingredients showing awareness of the need to control the temperature of the hob and/or oven <br> use a range of techniques such as mashing, whisking, crushing, grating, cutting, kneading and baking | Children can: know, explain and give examples of food that is grown (such as pears, wheat and potatoes), reared (such as poultry and cattle) and caught (such as fish) in the UK, Europe and the wider world <br> understand about seasonality, how this may affect the food availability and plan recipes according to seasonality <br> understand that food is processed into ingredients that can be eaten or used in cooking demonstrate how to prepare and cook a variety of predominantly | Children can: <br> know, explain and give examples of food that is grown (such as pears, wheat and potatoes), reared (such as poultry and cattle) and caught (such as fish) in the UK, Europe and the wider world <br> understand about seasonality, how this may affect the food availability and plan recipes according to seasonality <br> understand that food is processed into ingredients that can be eaten or used in cooking <br> demonstrate how to prepare and cook a variety of predominantly |




