



Design Technology and
Catering/Food Curriculum Map KS3

Engineering Curriculum Map KS4

2022/23

Curriculum Map: 2022/23 AMA – Design Technology, Catering/Food & Engineering

Year	Term 1, Term 2, Term 3	Term 4, Term 5, Term 6				
7 Design Technology and Catering / Food	7 DT1 - Woodworking and aerodynamics in our environment- Making an aerodynamic vehicle in response to a brief following engineering drawing instructions. Health and safety, working with tools and equipment, considering environmental issues and solutions. IT including using emails and looking at websites.	7 Catering / Food – Healthy food and nutrition – Working in kitchen environments, health and safety, safe food preparation, subject specific vocabulary, making food dishes and evaluating. Measurements. Cleaning and clearing up, following safe practices. Aesthetics, evaluating, food presentation and styling (career).				
8 Design Technology and Catering / Food	8 DT -Woodworking tMaking a Tealight (candle) holder Designing and creating a slotted tealight holder with introduction to tools, measuring and marking, designing and using wood stain as a finish, half lap joint pencil box building on previous skills. 2023-24 CAD/CAM including e-safety and developing skills with software, acrylic and client types.	8 Catering / Food – Kitchen hygiene and food preparation – Healthy food choices, understanding nutrition, evaluating, making and preparing food dishes and kitchen safety. Measurements and increased subject specific vocabulary / terminology. Building on previous experience and skills. Aesthetics, evaluating, food presentation, styling and catering careers.				
9 Design Technology and Catering / Food	9 DT – Engineering Processes - Making a toy train from raw materials, soft woods and manmade boards, following an engineering drawing, health and safety, using tools and equipment, measuring and marking out and working independently. Finishing including wood stain, wax and oils. 2023-24 IT including using CAD and building up skills in CAD design and ICT including emails and CAM equipment.	9 Catering / Food – Making Healthy Choices - The four C's of food safety, food and the life stages, sensory analysis, food labelling, food poisoning, food preparation and evaluation, subject specific vocabulary, technical language and understanding.				
Year	Term 1	Term 2	Term 3	Term 4	Term 5	Term 6
10 Engineering	Introduction to Engineering and the careers it can lead to. Making a drill gauge and steel trowel developing workshop skills with an emphasis on health and safety, machine processes and finishing skills.	Research into materials types and manufacturing processes including Smart materials, composite materials and general engineering materials. Continuation of workshop activities and skills building.	Introduction of technical drawing using pencils and drawing equipment. Development of using CAD skills to produce engineering drawings and models. Responding to a brief and designing an engineering product.	Responding to a brief and designing an engineering product continuation. Using ACCESS FM to analyse products and consider design requirements.	Electronics skills development, producing a product with circuit components. Woodwork skills development improving accuracy and evaluation.	Using CAD skills, electronic knowledge, health and safety skills and workshop knowledge to complete a product and evaluate it.
11 Engineering	Further introduction to engineering careers, and related health and safety careers. Exam board assessment following engineering drawings to produce a final prototype, and producing a portfolio that evidences the skills used with an evaluation of the overall product and components.	Completion of the exam board required prototype workshop build. Recording processes, evidencing the use of engineering drawings with symbols and conventions. Planning and quality control points and checks.	Developing an engineered product responding to a brief. Development of ideas based on researching engineering solutions. Exam topics and revision.	Producing engineering 3 rd angle (orthographic) and isometric drawings of design ideas responding to the brief. Evaluating designs and making improvements and modifications.	Exam revision covering the key components set by the exam board.	
National Curriculum	Develop the creative, technical and practical expertise needed to perform everyday tasks confidently and to participate successfully in an increasingly technological world.	Build and apply a repertoire of knowledge, understanding and skills in order to design and make high-quality prototypes and products for a wide range of users.	Develop and communicate design ideas using annotated sketches, detailed plans, 3-D and mathematical modelling, oral and digital presentations.	Select from and use specialist tools, techniques, processes, equipment and machinery precisely, including computer-aided design and manufacture.	Critique, evaluate and test their ideas and products and the work of others	Test, evaluate and refine their ideas and products against a specification, taking into account the views of intended users and other interested groups

