

### **Composite: Engineering disciplines**

Year 7

Why do we deliver this?

We deliver this composite to ensure all students **belong** within the world of engineering by developing an understanding of the wide range of engineering disciplines, including civil, biomedical and aerospace engineering. Students engage in practical STEM projects that build confidence and curiosity while making learning meaningful and relevant to real life.

The curriculum is designed so that all learners, including **SEND, PP and vulnerable students**, can **achieve** through scaffolded tasks, structured problem-solving and clear modelling of processes. Engineering is presented as accessible to all, breaking down stereotypes and widening participation.

Through hands-on learning and purposeful challenge, students develop resilience, teamwork and independence, enabling them to **thrive** both academically and personally while recognising the impact engineering has on society and future careers.

### **Composite: Food and hygiene core skills**

Year 7

Why do we deliver this?

This composite ensures students **belong** in a kitchen environment by learning fundamental food preparation skills alongside hygiene and safety routines. Students develop confidence in cooking through structured practical lessons.

The curriculum enables all learners to **achieve**, including **SEND and PP students**, through clearly modelled techniques, step-by-step guidance and consistent routines. Nutritional knowledge is taught in an accessible way to support healthy choices.

Students **thrive** by gaining independence, life skills and a positive relationship with food, which supports wellbeing and long-term health.

## **Composite: Elements of Photography**

Year 7

Why do we deliver this?

This composite allows students to **belong** within the creative curriculum by learning how to use DSLR cameras and understand composition.

Students are supported to **achieve** through step-by-step instruction, modelling and visual examples, particularly benefiting **SEND and vulnerable learners** who require structured approaches.

Students **thrive** by expressing ideas visually and developing confidence through creative success.

## **Composite: Clay:**

Year 7

Why do we deliver this?

This composite enables students to **belong** in 3D design by learning the properties of clay and understanding drying and firing processes.

Students **achieve** through practical, tactile learning that is particularly supportive of **SEND and vulnerable learners**. Skills such as joining are explicitly taught and practised.

Students **thrive** by gaining confidence in making and understanding material processes.

## **Composite: CAD 2D design**

Year 7,8,9

Why do we deliver this?

This composite enables students to **belong** within modern design and manufacturing by introducing them to Computer Aided Design (CAD) using 2D Design software. Students learn that digital tools are an essential part of contemporary design practice and are used across engineering, graphics and product design industries.

The curriculum is carefully sequenced so that all learners, including **SEND, PP and vulnerable students**, can **achieve** through structured, progressive skill development. Students begin by learning the basic functions of the software and working off the grid to explore simple tools and commands. They then develop accuracy and control by using grid tools to create pixel art and introduce colour into their designs. Through repeated practice, students learn to use shape tools, line tool options and delete functions to construct and refine images with increasing confidence and independence.

These skills are then applied in a purposeful design task where students design a functional product in the form of a **coaster**, using the knowledge and techniques developed over the previous lessons. This allows students to make connections between digital design and real-world outcomes.

Students **thrive** by building confidence in digital creativity, problem-solving and precision. The final assessed coaster design enables them to demonstrate their understanding of CAD tools while developing pride in their work. This composite prepares students for further study in CAD, Graphics and Engineering, while supporting all learners to succeed through clear modelling, scaffolded tasks and accessible digital learning.