DESIGN and TECHNOLOGY: PRODUCT DESIGN (3D)

Examination Board: OCR   **Syllabus:** H406

WHY STUDY PRODUCT DESIGN?

This creative and thought-provoking qualification will give students the practical skills, theoretical knowledge and confidence to succeed in a number of careers - especially those in the creative industries.

You will investigate historical, social, cultural, environmental and economic influences on design and technology, whilst enjoying opportunities to put your learning in to practice by producing products of your choice. You will gain a real understanding of what it means to be a designer, alongside the knowledge and skills sought by higher education institutions and employers.

THE A LEVEL PROGRAMME OF STUDY

CONTENT OVERVIEW	ASSESSMENT
This paper is set out through four sets of questions that predominantly covers technical principles. Learners will be required to: • Analyse existing products • Demonstrate applied mathematical skills • Demonstrate their technical knowledge of materials, product functionality, manufacturing processes and techniques	**Principles of …** **Written Paper** 26.7% of total A Level
This component has a series of longer answer questions that require learners to demonstrate their problem solving and critical evaluation skills. Learners will be required to: • Apply their knowledge, understanding and skills of designing and manufacturing prototypes and products • Demonstrate their higher thinking skills to solve problems and evaluate situations and suitability of design solutions	**Problem solving** Written Paper 23.3% of total A Level
The 'Iterative Design Project' requires learners to undertake a substantial design, make and evaluate project centred on the iterative process of explore, create and evaluate. Learners identify a design opportunity or a design problem from a context of their own choice and create a portfolio of evidence in real time through the project to demonstrate their competence.	**Iterative Design** NEA (coursework) 50% of total A Level

HIGHER EDUCATION AND CAREER OPPORTUNITIES

Studying product design at A Level can contribute to entry into creative industries through further and higher education, or through modern apprenticeships with a wide variety of employers in the manufacturing, engineering and design sectors.

A STUDENT'S PERSPECTIVE

"Design and technology has given me an advanced understanding of the manufacturing and materials of commercial products, which can be applied in other subjects and lessons are a mix of practical and theory. The Teachers have taught us invaluable knowledge and given us many opportunities such as a 6 month Engineering Scheme, of which our team graduated as Industrial cadets at gold level. Work experience with the company came about due to this industry link. The subject has given me increased confidence, independence and freedom to be creative."   - Sophie, Year 13

SUBJECT SPECIFIC ENTRY REQUIREMENTS

Students wishing to pursue this course need to have achieved a grade 4 or higher in GCSE English and mathematics. No previous experience in Design and Technology is required.

FOR FURTHER INFORMATION *please contact Mrs Angela Williams-awm@sandon.essex.sch.uk*