Spalding Grammar School Sixth Form

Subject Information

Design and Technology

Entry Requirement:

Grade 6 in GCSE Product Design, GCSE Resistant Materials or GCSE Engineering ***or*** *Grade 6 in GCSE Mathematics.*

Students who have studied GCSE Textiles or GCSE Graphic Design should speak to the Head of Design Technology before applying.

Awarding body: AQA

About the subject:

The course has been designed to encourage students to take a broad view of design and technology, to develop their capacity to design and make products whilst appreciating the complex relations between design, materials, manufacture and marketing. Students will be given opportunities to develop their creativity, capability and entrepreneurial skills, to apply knowledge and understanding to a range of technological activities, to develop critical thinking and collaborative skills. The course enables students to enhance their design capability by developing their practical skills in ICT SpaceClaim CAD and CAM including modern Laser cutting and 3D printing techniques, along with other industrial processes.

Students who have studied Product Design at A Level have gone on to study a variety of degree subjects including Industrial Design and Technology, Engineering, Product Design, Architecture, Law and Accountancy. A number of former students have also moved directly into employment with companies using CAD and CAM, based on the skills they have developed over the duration of the course.

Assessment:

The Product Design course offered is AQA A Level Product Design which allows students to pursue a range of design and manufacturing activities. A major focus of the course is towards Resistant Materials where a sound working knowledge of design, materials, manufacture and marketing of the prototype are all key features throughout the course.

The course consists of two main assessments criteria, firstly external examinations and secondly a single design and make task all completed in the final year. The examinations cover materials, components and applications and design and manufacture. Each examination is equally weighted contributing towards half of the course assessment. The design and manufacture is a single design and make prototype project.