

GCSE Design & Technology KS4

The DT Department have selected the AQA specification for GCSE DT (8552) 50% coursework (NEA) and 50% Examination
<https://www.aqa.org.uk/subjects/design-and-technology/gcse/design-and-technology-8552>

Students will learn:	
Years 9/10	<ul style="list-style-type: none"> • New and emerging technologies • Energy generation and storage • Systems approach to designing • Mechanical devices • Developments in new materials • Materials and their working properties • Selection of materials or components • Using and working with materials • Ecological and social footprint • The work of others • Investigation, primary & secondary data • Design strategies • Communication of ideas  <p>**TRIP TO DESIGN MUSEUM LONDON -DESIGNS OF THE YEAR AWARDS**</p>
Year 11	<ul style="list-style-type: none"> • Specialist techniques and processes • Specialist tools and equipment • Material management • Stock forms, types & sizes • Tolerances • Forces and stresses • Prototype development • Surface treatments and finishes • Scales of production 

Paper 1
<p>What's assessed</p> <ul style="list-style-type: none"> • Core technical principles • Specialist technical principles • Designing and making principles <p>In addition:</p> <ul style="list-style-type: none"> • at least 15% of the exam will assess maths • at least 10% of the exam will assess science.
<p>How it's assessed</p> <ul style="list-style-type: none"> • Written exam: 2 hours • 100 marks • 50% of GCSE
<p>Questions</p> <p>Section A – Core technical principles (20 marks) A mixture of multiple choice and short answer questions assessing a breadth of technical knowledge and understanding.</p> <p>Section B – Specialist technical principles (30 marks) Several short answer questions (2–5 marks) and one extended response to assess a more in depth knowledge of technical principles.</p> <p>Section C – Designing and making principles (50 marks) A mixture of short answer and extended response questions.</p>
Non-exam assessment (NEA)
<p>What's assessed</p> <p>Practical application of:</p> <ul style="list-style-type: none"> • Core technical principles • Specialist technical principles • Designing and making principles
<p>How it's assessed</p> <ul style="list-style-type: none"> • Non-exam assessment (NEA): 30–35 hours approx • 100 marks • 50% of GCSE
<p>Task(s)</p> <ul style="list-style-type: none"> • Substantial design and make task • Assessment criteria: <ul style="list-style-type: none"> • Identifying and investigating design possibilities • Producing a design brief and specification • Generating design ideas • Developing design ideas • Realising design ideas • Analysing & evaluating • In the spirit of the iterative design process, the above should be awarded holistically where they take place and not in a linear manner • Contextual challenges to be released annually by AQA on 1 June in the year prior to the submission of the NEA • Students will produce a prototype and a portfolio of evidence • Work will be marked by teachers and moderated by AQA