

YEAR 11 Construction & The Built Environment

Rationale: the course allows learners to study construction and the built environment, giving them the opportunity to gain a broad knowledge and understanding of the industry.

Intent	Implementation	Impact
<p>This course allows learners to study construction and the built environment, giving them the opportunity to gain a broad knowledge and understanding of the industry.</p> <p>Learners will develop skills such as interpreting and analysing information, identifying the infrastructure required for safe and efficient work and in understanding how client needs can shape building design.</p> <p>The qualification is 120 GLH, which is the same size and level as a GCSE, Guided learning directly involve tutors and assessors in teaching, supervising, and invigilating learners, such as lessons, tutorials, online instruction and supervised study.</p> <p>It gives learners the opportunity to learn about one of the most important sectors of the UK economy.</p> <p>Learners will study three mandatory units, covering the fundamental knowledge, skills and understanding required construction technology and design:</p> <ul style="list-style-type: none"> ● Construction technology ● Construction and design ● Scientific and mathematical application for construction. <p>Learners will build on the knowledge gained in the mandatory units within their chosen option unit. This will provide you with an opportunity to develop a wider understanding and appreciation of a specific aspect of the construction industry, depending on their interests.</p> <p>The areas covered are:</p> <ul style="list-style-type: none"> ● exploring carpentry and joinery principles and techniques ● exploring brickwork 	<p>Subject Knowledge All staff working within the construction department are fully qualified with site experience and close links within the industry, allowing staff to keep up to date with new developments, completing any training needed to support the understanding and delivery of any changes within the industry.</p> <p>[Component 1] learners will develop an understanding to the structural performance required for low-rise construction, exploring how sub-structures are constructed leading onto how the superstructures are constructed. Learners will take a mock exam to develop an understanding of how the exam will be constructed and how terminology needs to be applied to explain or justify their answers. Learners will sit their construction exam in Spring term 1.</p> <p>[Component 2] Introduce learners to the tools, materials and personal protective equipment (PPE) used in industry. Delivery about the potential health and safety hazards in construction and what is safe working practice in the use of common tools and equipment. Learners will also develop the knowledge, skills and techniques to carry out basic practical tasks linked to option.</p> <p>[Component 3] Introduction to what the construction industry undertakes in terms of the different types of buildings and structures it designs and builds. How client briefs can be developed by analysing the client's requirements for the building and considering the external constraints on development. You will also gain an understanding of the different types of construction activities.</p> <p>How will It be assessed? Learners will carry out tasks/assignments throughout the course. These will be marked, and feedback given as to how they are getting on. The assessment for Component 1: Construction Technology, is a written test which is sent away to be marked. The assessment for Component 2 will be the completion of presentation of tools, equipment and materials needed to carry out a practical assessment; a completed risk assessment for the workshop The assessment for Component 3: Construction and Design, learners will be able to draw on the knowledge, skills and understanding developed in the qualification as a whole.</p>	<p>This qualification has a core of underpinning knowledge, skills and understanding, and a range of options to reflect the breadth of pathways in a sector.</p> <ul style="list-style-type: none"> ● gain a broad understanding and knowledge of a vocational sector ● investigate areas of specific interest ● develop essential skills and attributes prized by employers, further education colleges and higher education institutions. ● provides opportunities for learners to progress to either academic or more specialised vocational pathways. ● give learners opportunities to link education and the world of work in engaging, relevant and practical ways ● enable learners to enhance their English and mathematical competence in relevant, applied scenarios ● support learners' development of transferable interpersonal skills, including working with others, problem solving, independent study and personal, learning and thinking skills ● give learners a route through education that has clear progression pathways to further study or an Apprenticeship. <p>Developing employability skills The vast majority of employers require learners to have certain technical skills, knowledge and understanding to work in a particular sector, but they are also looking for employability skills to ensure that employees are effective in the workplace. Throughout the BTEC Level 1/Level 2 First Award in Construction and the Built Environment, learners will develop a range of employability skills, engage and carry out work-related activities. This allows learners that are employment ready to train and develop a deeper understanding through the means of an apprenticeship.</p> <p>Apprenticeships This allowing learners to apply for apprenticeships within bricklaying, building, carpentry and joinery to gain a qualification recognised within the industry.</p> <p>Sixth form or college Learners will develop a range of practical skills and underpinning knowledge to progress onto a CSKILLS qualification in bench joinery or trowel occupations. The CSKILLS qualifications are recognised qualification within the construction industry, registered with the construction institute training board (CITB) and are the first steps to gain employment into a lifelong carrier with the opportunities to progress.</p>

Autumn Term 1	Spring Term 3	Summer Term 5
<p>Learners will be introduced to learning aim C: Explore how superstructures are constructed. Learners will cover Superstructures – walls, floors and roof all primary elements of a build, and understand what is used, where it is used, why it is used and how it is achieved. Learners will then revisit learning aim A: Understand the structural performance required for low-rise construction covered in term five of year 10. Learners will develop a deeper understanding of the underpinning knowledge for ● strength ● stability ● fire resistance ● thermal insulation ● sound insulation ● weather resistance ● sustainability.</p>	<p>Learners will sit their exam for unit one Construction Technology at the start of term three, where this will be externally marked. Learners will then be introduced to Learning aim: to understand the effects of forces and temperature changes on materials used in construction; learners will show they understand the effect of forces on construction materials, how changes in temperature affect construction materials. (Steel, concrete, brick, blocks, aluminium alloys, glass, plastics and wood). Practical tasks will be linked to complex practical tasks where they will continue to develop trowel/tool skills, and demonstrate compliance to health and safety within the workshop.</p>	<p>Learners will complete practical assessments and complete and resubmissions of work relevant to dates in accordance to the BTEC assessment plan and BTEC report form standardisation verification process. Learners needing to take a re-sit for the external exam will revisit learning aim A: Understand the structural performance required for low-rise construction, learning aim B: Explore how sub-structures are constructed and learning aim C: Explore how superstructures are constructed. This will involve new lesson content to underpin previous knowledge gained to date with additional revision/ intervention to best aid learners to prepare for exam.</p>
Autumn Term 2	Spring Term 4	Summer Term 6
<p>Learners will revisit learning aim B: Explore how sub-structures are constructed covered in Summer term 2 of year 10. This allows learners to develop a deeper understanding of preconstruction work activities that have to be completed before work can begin on site, understand why they are carried out, what has to be provided on a site, and how it is accomplished. Be able to identify Sub-structure groundworks, how sub-structures are constructed safely. Show an understanding of what is used, why it is used (including potential hazards), where it is used and how it is achieved. Learners will be able to apply this knowledge to help explain answers and justify the use linked to construction context. Learners will take part in mock exams and practice papers in preparation to the written exam to be taken in term three of year 11.</p>	<p>Learners will complete the assignment linked to component 3, with floor plans and elevations to produce initial sketches for a concept idea meeting the assignment scenario. This is linked to the delivered content from year 10 in summer term 5 including any application of maths, that meet the requirements of a client brief/assignment. Learners will continue developing trowel/tool skills, carrying out basic models/tasks meeting a specification and aiming to meet +/- 10mm tolerance.</p>	<p>Learners will finalise any paperwork to ensure its all signed and dated in accordance to BTEC assessment plan. Learners will sign any documentation required by BTEC in regards to verification process and attend any additional intervention linked to the course prior to study leave/ intervention and attend exams in accordance to GCSE timetables. Learners for re-sit will take their exam from mid- May.</p>