Pearson
Higher Nationals in
Construction and the Built Environment

PEARSON-SET THEME & TOPIC RELEASE

UNIT: 1 Individual Project - Theme and Topic Release 2018

For use with the Higher National Certificate and Higher National Diploma in Construction and the Built Environment
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Applies to the delivery of the unit: 1st September 2018 - 31st August 2019

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1.1 Introduction to theme

The Pearson-set theme for use with Unit 1: Individual Project is

**Changing Technologies in the Construction Industry**

With the construction industry representing one of the largest producers of carbon emissions, there are increasing demands for those working in construction to understand and seek to address issues of environmental sustainability.

But, the environment is not the only area where sustainability is desirable. Economic, social and cultural sustainability are also increasingly recognised as part of a larger whole; where many different forms of sustainability are intertwined. In addressing environmental sustainability, we may see improvements in social well-being. Often, seeking to achieve economic sustainability can bring environmental solutions to the fore. In modern construction practice, sustainability has become both a necessity and an opportunity.

This unit will enable students to examine the different factors that influence the potential for sustainable construction. Through engagement with the theme and topics, students will have the opportunity to research and apply skills and knowledge in support of developing sustainable solutions for construction problems.

1.2 Topic Selection

Tutors must choose one topic from the list provided below and decide which type of project is most suitable for research-based assignment. All students must complete the same topic and project chosen by the tutor. However, if delivering to different cohorts of students then tutors may select a different topic and design a different project for each cohort.

The Pearson-set Assignment Guidance document for Unit 1: Individual Project, provides additional support and guidance for both tutors and students

**Theme: Changing Technologies in the Construction Industry**

**Topics:**

1. Digital technologies in project management
2. The influence of Building Information Modelling
3. Technologies in off-site construction
4. Emerging technologies in construction

1.3 Choosing a project type
You will need to devise a project brief for the student to follow in completion of the assignment for this unit. The type of project chosen for the selected topic should allow for a sufficient degree of research through the existence of adequate background materials and allow for the depth and breadth of study suitable for a level 4 qualification.

Guidance for tutors is available in the Pearson-set Assignment Guidance for Unit 1: Individual Project. This provides a range of project types and examples that could be utilised for a project. The project types provided are not exhaustive or mandatory and we do encourage tutors to be innovative with their ideas.

Please note that if reasonable adjustments are necessary to meet a specific individual student’s needs, you are able to adjust internal assessments to take this into account. Any adjustments must be considered with regard to the centre’s policies on equality & diversity and student support.

1.4 Project Evidence / Outcomes

It is important to recognise that project work is reliant on gathering information/data that can be analysed. The scale of the project means that there must be time for both primary and secondary research. An advised model would be to use secondary research to provide to a context for conducting and interpreting primary data collection. The project could then yield data/information which could be compared with the findings of secondary research. Where the project may lead to design propositions or forms of graphical evidence (e.g. construction information, technical drawings, etc.), the students’ graphical evidence should be clearly based on the outcomes of primary and secondary research.

In assessing the project, the assessor should be able to see:

- how project objectives have been met;
- how students have explored the research material relevant to the project objective;
- how students have developed and formulated their outcomes;
- answers to the central questions posed by the objectives;
- what the student has learned in carrying out their project.

An important part of the conclusion must be an awareness of the significance of results. Well edited, focused writing and presentation; where the key decisions, developments, lines of argument and salient research are explained succinctly, is preferable to unstructured writing and presentation where little attempt to select or edit material has been made.

It is important to recognise that there are many different presentation formats and it is important that students think carefully about the suitability of any presentations for their target audience. Their presentations should be appropriate to the audience, both in terms of the nature and level of material they use and in terms of length. Students should be guided to produce presentations that give a succinct account of the main arguments or developments from their project. The question and answer session should address issues raised by the presentation, but also give students an opportunity to review their work.

While Pearson encourages centres to devise an assignment that is specifically related to the subject of the
qualification; being as creative as possible with the forms of evidence that students may produce, there is also a need to ensure that students are planning and monitoring their own progress. To facilitate this, Pearson encourages centres to require the following, as part of the assignment:

- **A Project Plan**, undertaken at the start of the assignment, provides a format for students to record their aims and goals for the assignment. Tutors may use the Project Management Plan as a means of supporting the student to identify the specific resources, timelines, and stages required for the project.

- **A Log Book** offers a means to evidence the project development process and ongoing reflection. It should provide evidence that the student has thought about the direction of their project, what challenges they may have encountered and steps taken to address them.

- **A Performance Review**, completed at the end of the project, allows students to record the reflection and evaluation of their own learning through the project and to consider their individual performance.

Depending on the qualification, some of the above may be required within the assessment criteria for the unit. Centres must ensure that their assignment brief for the Pearson-set unit makes clear whether any of the above are required forms of submission evidence. However, centres may use their discretion to define the specific format in whatever way they deem appropriate.

Within the Pearson-set Guidance for Unit 1, there are example templates for the above. However, centres are encouraged to consider other approaches to the evidence that is included in Project Plan, Log Book and Performance Review. For example, rather than produce written reports for the above, a centre may seek to integrate these bodies of evidence with presentations, videos, blogs or other forms of communication.

### 1.5 Employer engagement

It is advisable that centres look at the Pearson-set Assignment as an appropriate unit to embed employer engagement, although this is not a mandatory requirement. Developing and establishing links with employers enhances the teaching and learning experience and improves students’ employability. Where possible, identifying links with employers as part of the delivery of the Pearson-set Assignment could lead to enhancing and supporting student learning. Real-life projects provide students with the opportunity to develop and acquire appropriate skills, knowledge and expertise required by employers.
1.6 Sharing of good practice

An appointed External Examiner (EE) for the centre will ask to sample the Pearson-set assignment briefs for review as part of the remote sampling request. Although this is not a mandatory requirement for centres we strongly advise that centres seek guidance and support from their EE on the Pearson-set assignment. The EE may also include the Pearson-set units in the centre visit sample of student work.

The EE will review and identify exemplars in all aspects of good practice. Good practice will focus on current themes that align to QAA Higher Education Reviews:

- Innovation
- Digital literacy
- Student employability and entrepreneurial skills
- Employer engagement
- Quality of assessment feedback

1.7 Resources and useful links

Suggested resources and links that centres may find useful are shown below. Centres should choose those resources that are relevant for localised use and complement those with additional resources to support independent research in the chosen topic and project type.

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<tr>
<th>Type of Resource</th>
<th>Resource Titles</th>
<th>Links</th>
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The Pearson-set Assignment Guidance for Unit 1: Individual Project should be read in conjunction with the theme and topic release. It provides advice and guidance for both tutors and students.

For any further additional support or queries regarding this document, please email btecdelivery@pearson.com.