

Unit Title	Building Information Modelling in Civil Engineering
Ofqual unit reference number (code)	R/507/3828
Organisation Reference	QU038769
Unit Level	Level 3
Unit Sub Level	None
GLH	60
Unit Credit Value	10
Sector Subject Areas	5.2 Building and Construction
Unit Grading Structure	Pass
Availability	Restricted
Restricted Organisations	N/A
Assessment Guidance	N/A

LEARNING OUTCOMES	ASSESSMENT CRITERIA
The learner will:	The learner can:
1. Understand the basic concepts of Building Information Modelling (BIM).	1.1. Explain the basic concepts of BIM. 1.2. Explain the terminology used with BIM. 1.3. Explain the Construction Operations Building Information Exchange (COBie). 1.4. Explain how COBie is used in civil engineering.
2. Understand the relationship between BIM and civil engineering project stages.	2.1. Describe the relationship between BIM and the different stages of a civil engineering project.
3. Understand management, organisational and legal issues in relation to BIM.	3.1. Explain how the following are affected by BIM: (a) copyright

	<ul style="list-style-type: none"> (b) ownership (c) management and responsibility (d) security (e) shared liability (f) insurances. <p>3.2. Explain the role of the BIM manager.</p>
<p>4. Understand how BIM supports the lifecycle management of a building.</p>	<p>4.1. Explain how BIM supports the following stages in the life cycle of a civil engineering project:</p> <ul style="list-style-type: none"> (a) design (b) construction (c) alterations (d) management (e) demolition (f) environmental clean up.
<p>5. Understand how BIM is implemented within an organisation.</p>	<p>5.1. Produce a plan to implement BIM within an organisation.</p> <p>5.2. Explain the training and skills requirements for using BIM.</p> <p>5.3. Explain the effect of BIM on contract procurement and risk management.</p>
<p>Equivalences</p>	<p>N/A</p>