

Introduction to teaching and assessing the BTEC RQF Higher Nationals in Engineering



Agenda

1. HN Global demo – centre support resources

2. Qualification – structures/pathways/rules of combination

3. Pearson-set units – principles and support

4. Planning – unit sequencing and delivery strategies

5. Holistic Assessment – concept and application

Break

6. Assignment Brief – assessment strategies

7 QA processes – features and processes

Session Objectives:

Demo HN Global to signpost support materials

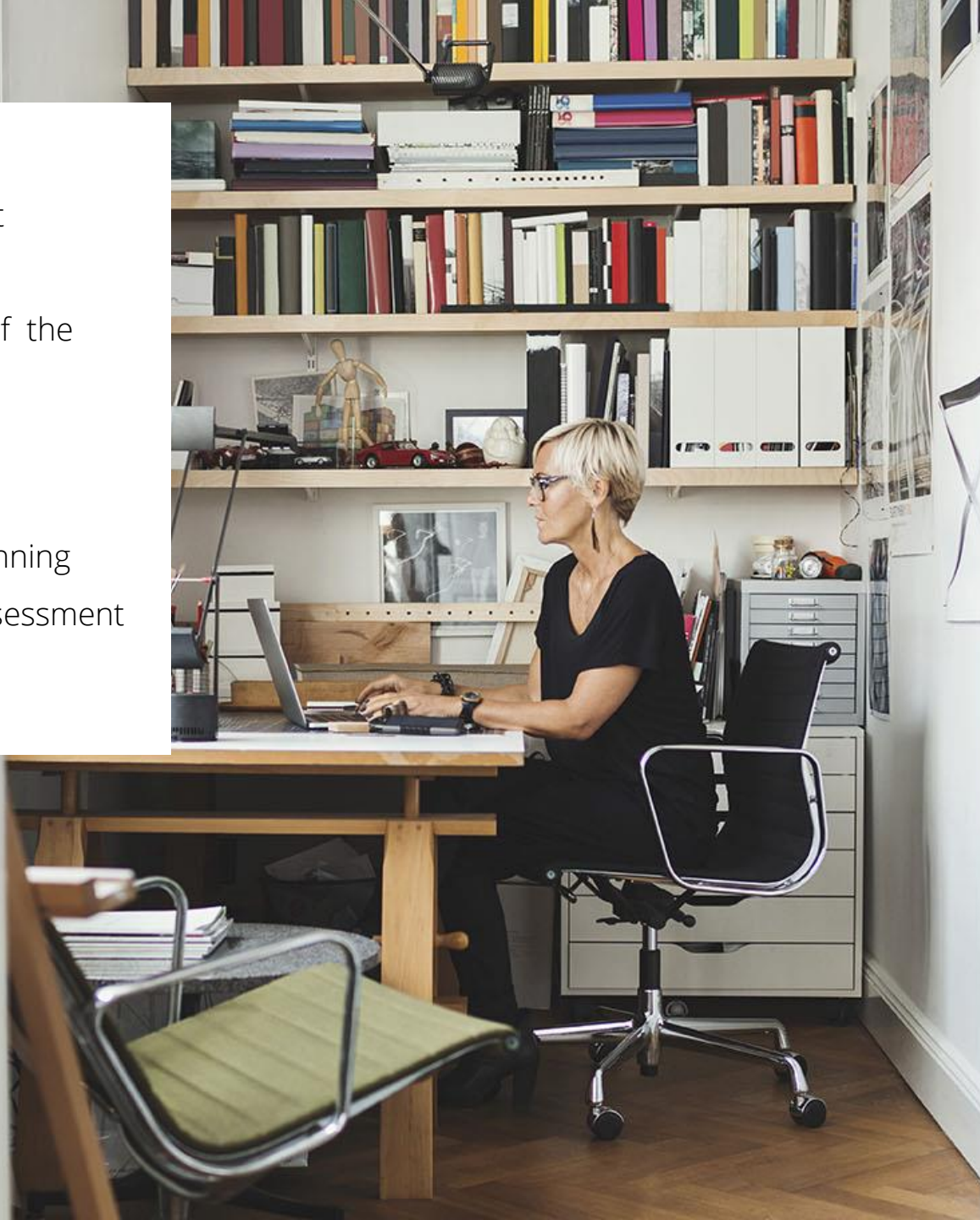
Explore the content and structures of the Pearson BTEC Higher Nationals in Engineering

Introduce the Pearson-set units

Discuss delivery and assessment planning

Consider the holistic approach to assessment and assignment writing

Explore the QA Model



Poll Questions

Do you have an account with HN Global?

Are your students registered on the HN Global platform?

How often do you access HN Global?



HN Global Content and Support

Resources available across the platform for all users:

- **Short Courses** - includes study skills modules and digital literacy learning paths.
- **Forum** - discuss common themes and share good practice with colleagues/peers globally.
- **Blog** - includes posts from industry, HE/FE experts and students.

The *Learning Zone created for students:

- My Subject Page
- Subject Resource Libraries
- Student Video Channel
- General Resources
- Ambassador initiative
- Upcoming Events
- Progression Hub

The Tutor Resources created for centre staff:

- Access to All Subject Pages and Delivery Materials
- Centre Admin: QA Hub
- Tutor Video Channel
- Professional Development
- Educator Services
- Blended Learning resources

*Tutors can also access the Learning Zone to guide students and support delivery.

Subject Page – Delivery Materials

◀

FILTER BY SECTORS

Business Subjects >

Construction Subjects >

Creative Subjects >

Digital Subjects >

Engineering Subjects

Hospitality Subjects >

Land-based Subjects >

Public-care Subjects >

Science Subjects >

Sports Subjects >

All Subjects: Delivery Materials

You can view a list of our qualifications, and information related to them below:



Aeronautical Engineering

[READ MORE](#) [OPEN](#)



Rail Engineering

[READ MORE](#) [OPEN](#)



Engineering (General)

[READ MORE](#) [OPEN](#)



Resource Library



Introduction to Cyber Security

[READ MORE](#) [OPEN](#)



Four techniques for developing your leadership 'muscle'

[READ MORE](#) [OPEN](#)



Clients Say, "How much is it?" And You Say, "..."

[READ MORE](#) [OPEN](#)



How Companies are using big data and analytics

[READ MORE](#) [OPEN](#)



General Engineering Reading List

[READ MORE](#) [OPEN](#)



How to break bad management habits before they reach the next generation of leaders

[READ MORE](#) [OPEN](#)

Centre Admin: QA Hub

Centre admin:
QA Hub
Templates, QA services and policies



Welcome to Centre admin: QA Hub

This resource has been developed to support centre staff with the delivery of BTEC Higher Nationals, regardless of the subject area. Below, you'll find a number of support areas, ranging from centre guidance - created to help quality nominees, to templates - created to support tutors with planning.

Covid-19 information:

We continue to monitor the situation daily, following the guidance from local authorities and governments for those areas that are impacted, and ensure plans are in place to minimise possible business disruption. For more information, visit our [dedicated website](#) for all the latest updates.

Edit Box

Pearson HE Innovate Awards 2021



Training



Centre Guidance Documents



Visit the Progression Hub

Welcome to HN Global

JOIN TODAY!

HN GLOBAL MAP



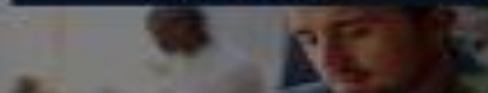
SHARE YOUR STORY



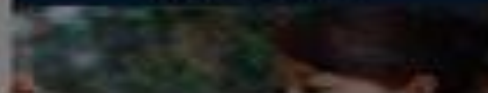
RENT TEXTBOOKS



READING LISTS



CORE TEXTBOOKS



Play the promo video



HN Global registering

Signing up is simple, you just need to complete a short self-registration form, which will grant you access to the resources available.

<https://hnglobal.highernationals.com/>

We understand that you might be considering a BTEC Higher National programme and would like to know what support is available. Guests can get access to these resources for a period of time. If you do decide to onboard, we can update your account for you later.

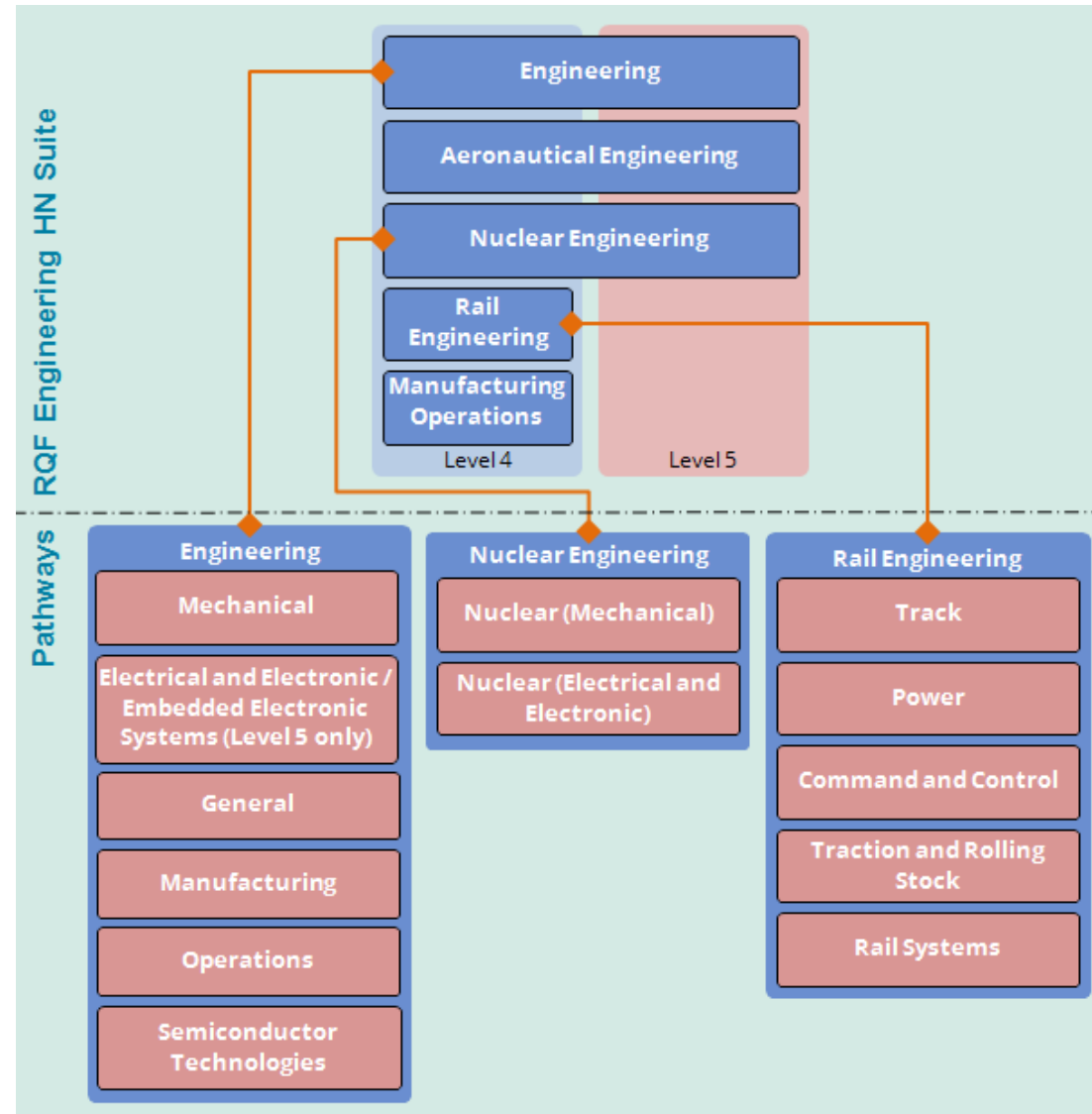
You can sign-up at any time independently. If you feel you do not have the correct account type you can contact hnglobal@pearson.com to get this changed.

Structures, Pathways and Units

RQF Higher Nationals in Engineering



Structure and pathways



Examples of Level 4 pathways

Pearson BTEC Level 4 Higher National Certificate in Engineering (Electrical and Electronic Engineering) (120 credits)		Unit credit	Level
Core unit <i>Mandatory</i>	1 Engineering Design	15	4
Core unit <i>Mandatory</i>	2 Engineering Maths	15	4
Core unit <i>Mandatory</i>	3 Engineering Science	15	4
Core unit <i>Mandatory</i>	4 Managing a Professional Engineering Project (Pearson-set)	15	4
Specialist <i>Mandatory</i>	19 Electrical and Electronic Principles*	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4

Pearson BTEC Level 4 Higher National Certificate in Engineering (General Engineering) (120 credits)		Unit credit	Level
Core unit <i>Mandatory</i>	1 Engineering Design	15	4
Core unit <i>Mandatory</i>	2 Engineering Maths	15	4
Core unit <i>Mandatory</i>	3 Engineering Science	15	4
Core unit <i>Mandatory</i>	4 Managing a Professional Engineering Project (Pearson-set)	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4

Pearson BTEC Level 4 Higher National Certificate in Engineering (Mechanical Engineering) (120 credits)		Unit credit	Level
Core unit <i>Mandatory</i>	1 Engineering Design	15	4
Core unit <i>Mandatory</i>	2 Engineering Maths	15	4
Core unit <i>Mandatory</i>	3 Engineering Science	15	4
Core unit <i>Mandatory</i>	4 Managing a Professional Engineering Project (Pearson-set)	15	4
Specialist unit <i>Mandatory</i>	8 Mechanical Principles*	15	4
Specialist unit <i>Mandatory</i>	13 Fundamentals of Thermodynamics and Heat Engines*	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below) <i>Note: If the student has no prior practical experience then it is recommended that Unit 10 Mechanical Workshop Practices is the selected optional unit.</i>	15	4
Optional unit	Plus one optional unit from General Optional Bank Level 4 (see below)	15	4

Note: The Electrical and Electronic Engineering pathway at Level 4 is the prerequisite pathway for students who wish to progress to study the Embedded Electronic Systems pathway at Level 5.

*specialist unit also available as an optional unit

Examples of Level 4 Optional units

Units 5 to 32 are still available as Level 4 Optional units

Optional	73 Materials Engineering with Polymers	15	4
Optional	74 Polymer Manufacturing Processes	15	4
Optional	75 Industry 4.0	15	4
Optional	76 Introduction to Professional Engineering Management	15	4
Optional	77 Industrial Robots	15	4
Optional	78 Programmable Logic Controllers	15	4
Optional	79 Computer Aided Design (CAD) for Engineering	15	4
Optional	80 Welding Technologies	15	4
Optional	81 Welding Inspection	15	4
Optional	82 Statistical Process Control	15	4
Optional	83 Telecommunication Principles	15	4
Optional	84 Semiconductor Manufacture*	15	4
Optional	85 Semiconductor Production Environments*	15	4

*optional unit also available as a specialist unit

Examples of Level 5 pathways

Level 5 units			
Core unit <i>Mandatory</i>	34 Research Project	30	5
Core unit <i>Mandatory</i>	35 Professional Engineering Management (Pearson-set)	15	5
Specialist unit <i>Mandatory</i>	39 Further Mathematics*	15	5
Specialist unit <i>Mandatory</i>	44 Industrial Power, Electronics and Storage*	15	5
Specialist unit <i>Mandatory</i>	45 Industrial Systems*	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5

*specialist units also available as optional units

Level 5 units			
Core unit <i>Mandatory</i>	34 Research Project	30	5
Core unit <i>Mandatory</i>	35 Professional Engineering Management (Pearson-set)	15	5
Specialist unit <i>Mandatory</i>	39 Further Mathematics*	15	5
Specialist unit <i>Mandatory</i>	49 Lean Manufacturing*	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5

*specialist units also available as optional units

Level 5 units			
Core unit <i>Mandatory</i>	34 Research Project	30	5
Core unit <i>Mandatory</i>	35 Professional Engineering Management (Pearson-set)	15	5
Specialist unit <i>Mandatory</i>	36 Advanced Mechanical Principles	15	5
Specialist unit <i>Mandatory</i>	37 Virtual Engineering*	15	5
Specialist unit <i>Mandatory</i>	39 Further Mathematics*	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5
Optional unit	Plus one optional unit from Level 5 Optional Bank (see below)	15	5

*specialist units also available as optional units

Electrical and Electronic pathway

General pathway

Mechanical pathway

Level 5 Optional units

Optional	36 Advanced Mechanical Principles	15	5
Optional	37 Virtual Engineering*	15	5
Optional	38 Further Thermodynamics	15	5
Optional	39 Further Mathematics*	15	5
Optional	40 Commercial Programming Software	15	5
Optional	41 Distributed Control Systems	15	5
Optional	42 Further PLCs	15	5
Optional	43 Further Electrical Machines and Drives	15	5
Optional	44 Industrial Power, Electronics and Storage*	15	5
Optional	45 Industrial Systems*	15	5
Optional	46 Embedded Systems	15	5
Optional	47 Analogue Electronic Systems	15	5
Optional	48 Manufacturing Systems Engineering*	15	5
Optional	49 Lean Manufacturing*	15	5
Optional	50 Advanced Manufacturing Technology*	15	5
Optional	51 Sustainability	15	5
Optional	52 Further Electrical, Electronic and Digital Principles	15	5

Optional	53 Utilisation of Electrical Power	15	5
Optional	54 Further Control Systems Engineering	15	5
Optional	62 Heating, Ventilation, Air Conditioning (HVAC)*	15	5
Optional	63 Industrial Services*	15	5
Optional	64 Thermofluids*	15	5
Optional	86 Emerging Semiconductor Technologies*	15	5
Optional	87 Semiconductor Integrated Electronics*	15	5

*Optional units are also denoted as a specialist unit in particular pathways

Example of Professional Body Recognition



RAeS recognises the following Pearson BTEC Higher Nationals prepare students for roles within the sector, highlighting that the qualifications are valued by industry within the field. Furthermore, they confirm that the qualifications meet the academic requirements for EngTech.

- Pearson BTEC Higher Nationals in Engineering at Levels 4 and 5
- Pearson BTEC Higher Nationals in Aeronautical Engineering at Levels 4 and 5

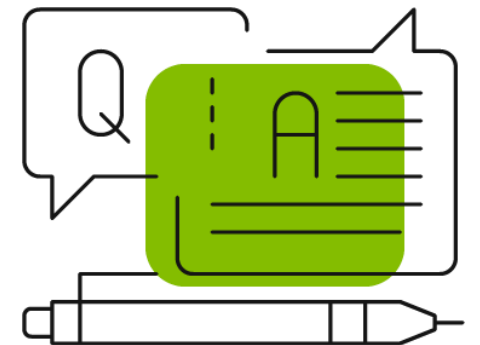
Quiz Time

Q1. How many units do you deliver at Level 4?

Q2. How many units do you deliver at Level 5?

Q3. How many Core units are there in total?

Q4. Can you name the only unit that has 30 credits?



Pearson-set Units



Pearson-set units

A theme is provided by Pearson annually covering both Level 4 and 5.

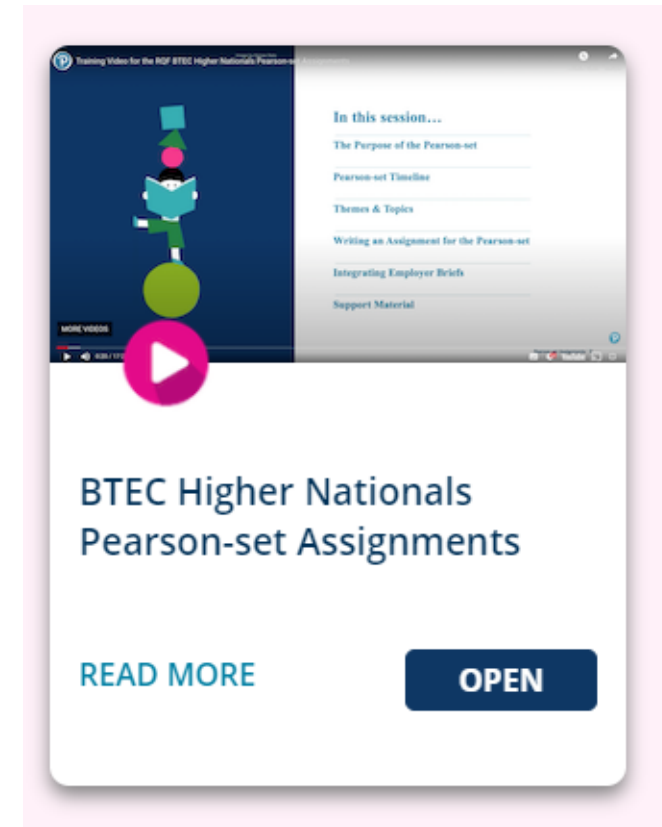
Unit 4: Managing a Professional Engineering Project (Level 4)

- Tutors choose/agree with the student the topic for the project at Level 4.

Unit 35: Professional Engineering Management (Level 5)

- Students are expected to develop their own research topic (through research and analysis) related to the overall theme at Level 5.

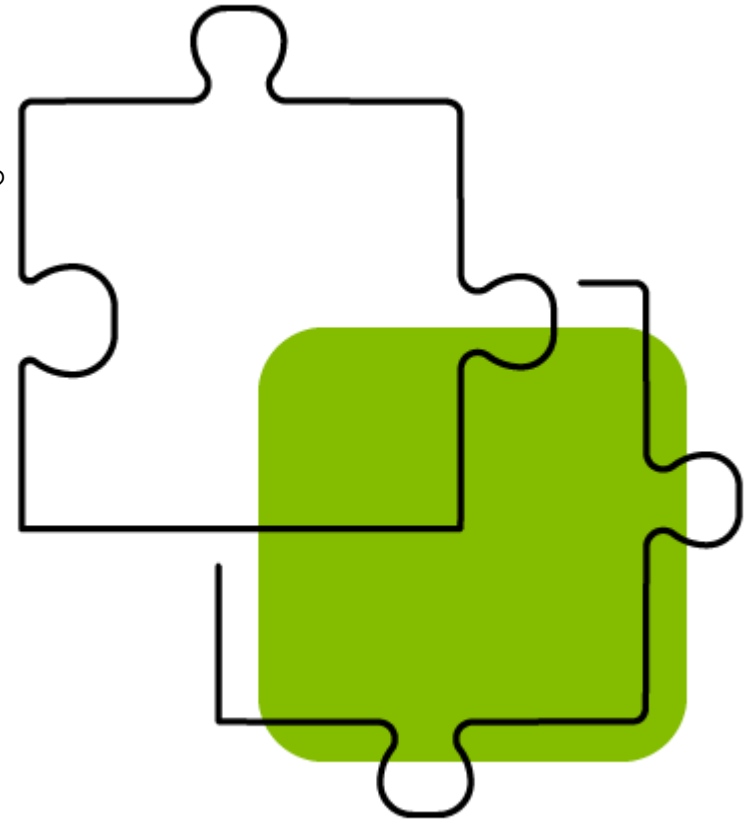
Did you know? we have a **Pearson-set video** to support you (on HN Global)



..... that we also publish annually a **Pearson-set Report** to support effective assignment design (on HN Global).

Theme - Topic - Unit

- What are the Unit's Learning Outcomes and Assessment Criteria? What does the student need to evidence at the end of the unit?
- What is the **Theme** for the year? What topic are you selecting/has been chosen?
- What is the vocational scenario that you can **define** in relation to the Theme/topic?
- What are you requiring the student to submit for assessment?
- How will the Theme and topic, combined with the vocational scenario, allow students to achieve the unit 's Learning Outcomes?



HN Global – Delivery Materials

There is also the following support for the Pearson-set units in the Engineering delivery materials that include:

- Level 4 Pearson-set assignment guidance
- Level 5 Pearson-set assignment guidance

At

<https://hnglobal.highernationals.com/delivery-materials/engineering>

- Resources in the library to help deliver input on the theme

Pearson BTEC Higher National qualifications in Engineering / Aeronautical Engineering / Nuclear Engineering / Rail Engineering / Manufacturing Operations

**Pearson-Set Theme Release
1st September 2021 to 31st August 2022**

Unit 4: Managing a Professional Engineering Project

First Teaching from September 2018

First Certification from September 2019

For us with the following qualifications:

Pearson BTEC Level 4 Higher National Certificate in Engineering / Aeronautical Engineering / Nuclear Engineering / Rail Engineering / Manufacturing Operations

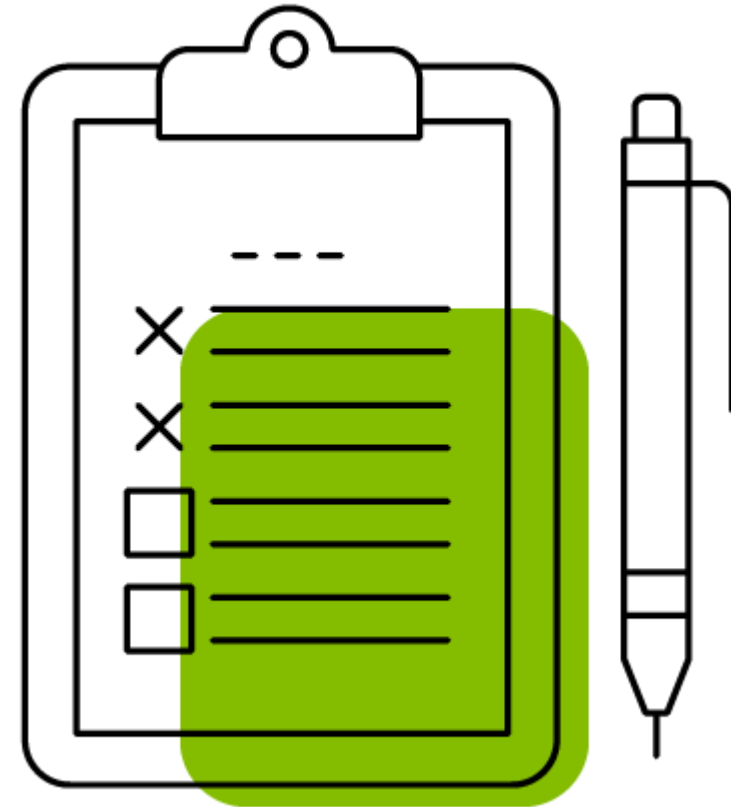
Pearson BTEC Level 5 Higher National Diploma in Engineering / Aeronautical Engineering / Nuclear Engineering / Rail Engineering / Manufacturing Operations

Planning Delivery



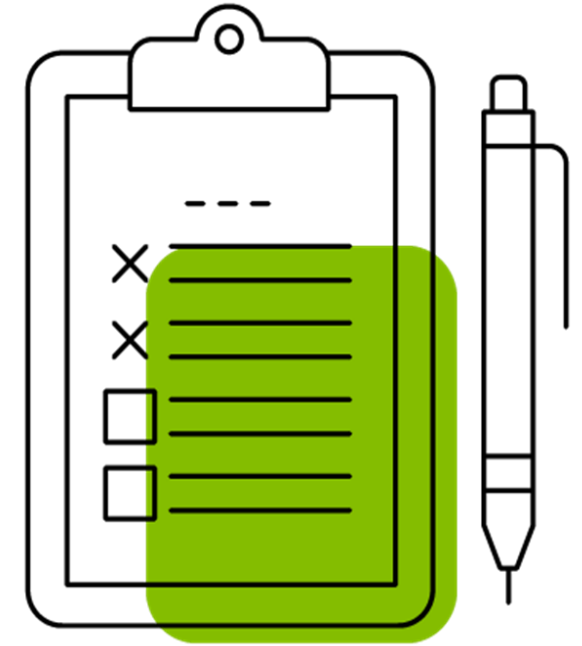
Delivery order of units

- A centre-based decision
- Supports your learning & teaching strategy
- Will influence your approach to assignments
- Will influence the timing of assessments
- Needs to be clear for tutors and students
- Must not overload the students



Planning the sequence of delivery

- Consider the relationship between the units & the unit content
- It may be better to deliver some units in a sequence
- Students will achieve better on some units if they have already acquired certain knowledge/skills
- Explore the possibilities in relation to learning & teaching and assessment
- Keep in mind the Guided Learning Hours (GLH)



Types of assessment – How many?

Staged unit assessment

Learning Outcomes and associated Assessment Criteria covered through *two or more assignments*, each targeting selected Learning Outcomes

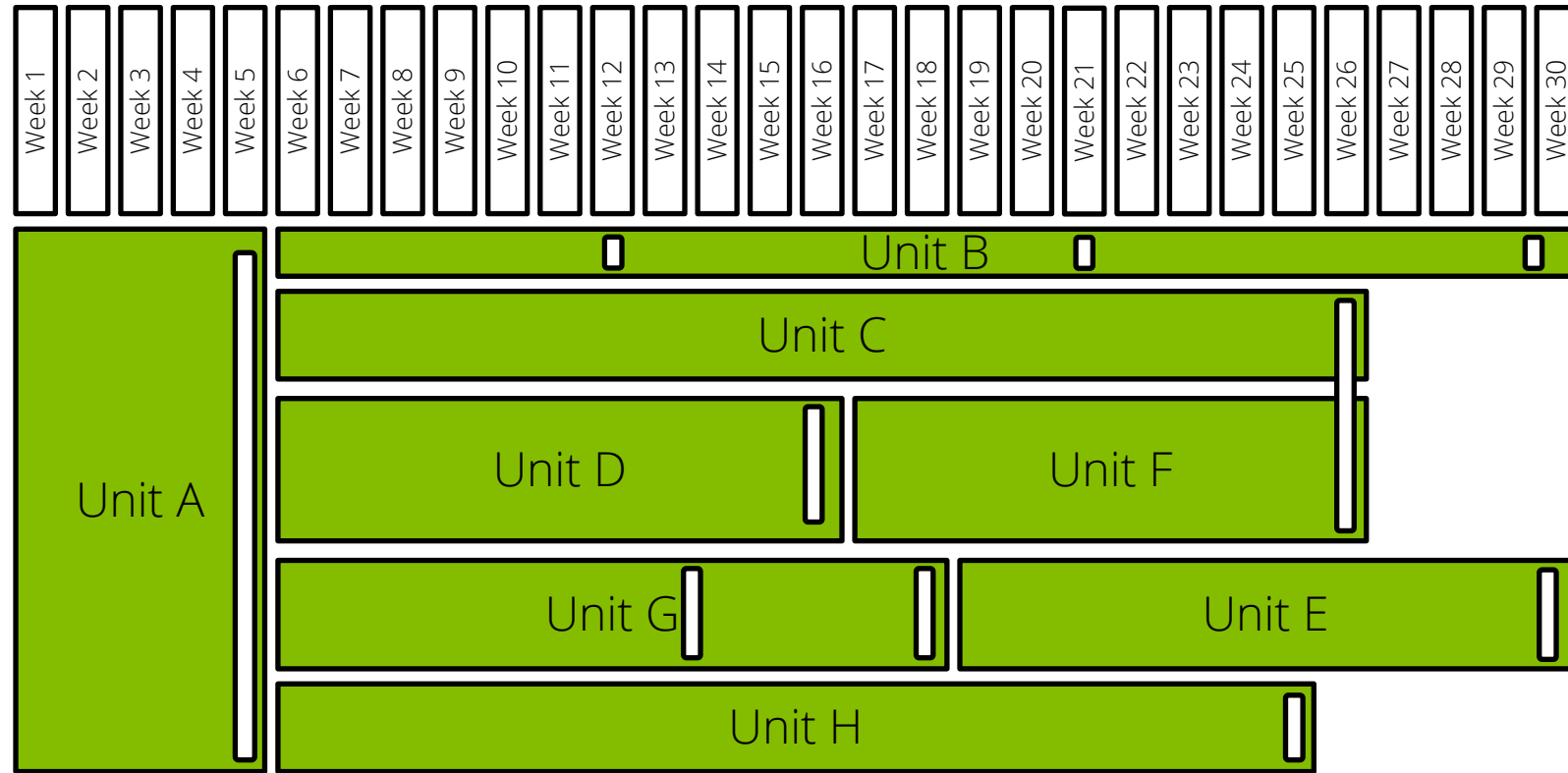
Single unit assessment

Addresses *all* unit Learning Outcomes and associated Assessment Criteria in *one assignment*

Integrated unit assessment

Learning Outcomes and Assessment Criteria from *more than one unit* addressed through a *common assignment*

Short & Fat -v- Long & Thin



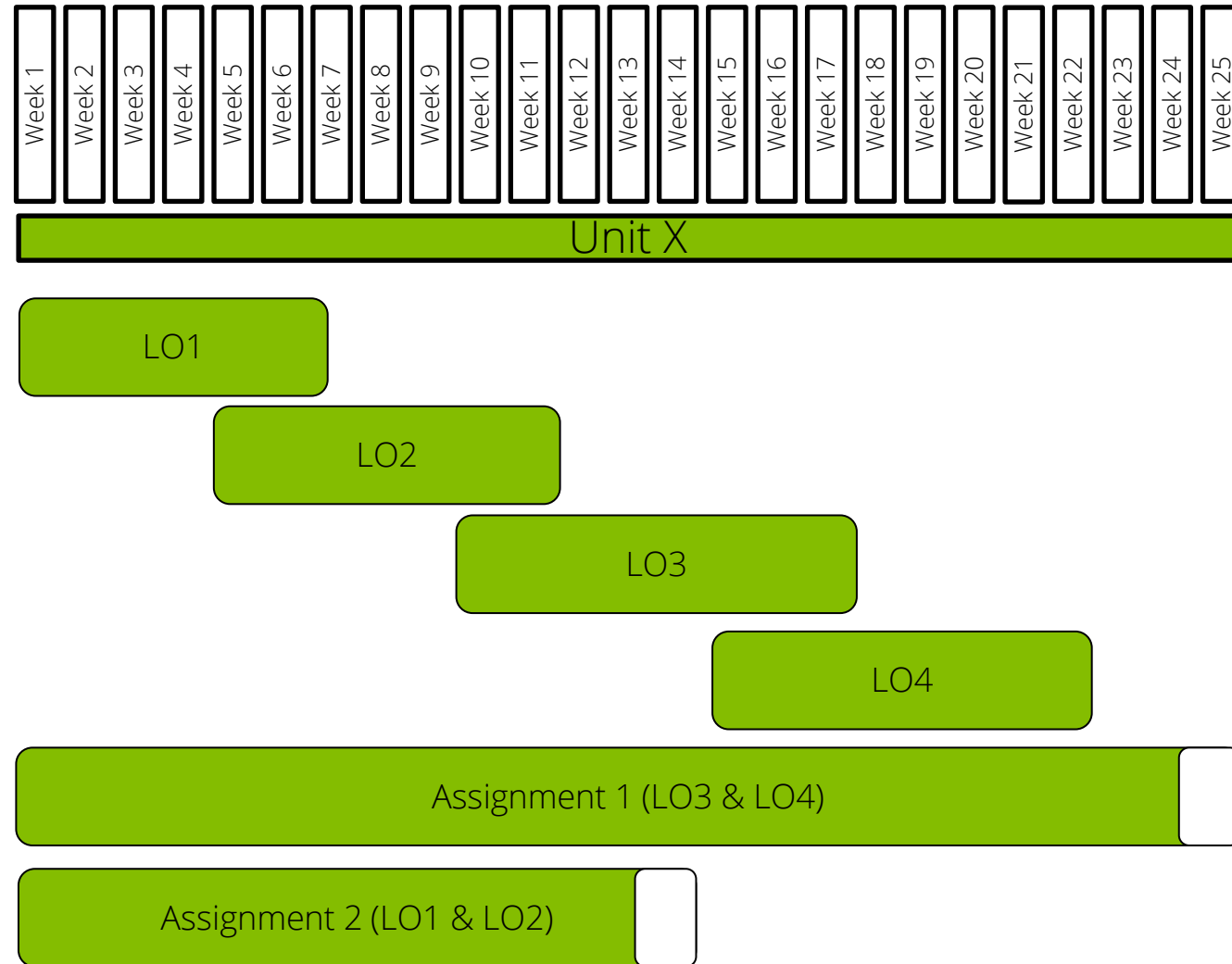
When and how would you conduct formative feedback?



Delivery order -v- Assessment order

- LO1 - Theoretical content
 - LO2 - Practical content
 - LO3 - Theoretical content
 - LO4 - Practical content
-
- Teach LO1, then LO3, then LO2, then LO4
 - Assess LO1 & LO2, then introduce assessment for LO3 & LO4

Delivery Order -v- Assessment Order



Poll Questions

How will/do you deliver the units?

How will/do you deliver the assessments?

How do you schedule unit delivery?



Unit Descriptor



Unit Descriptor

- The teaching, learning and assessment strategy reflects an appropriate balance between broadening and deepening academic knowledge and developing practical employability skills.
- Cognitive, affective and psychomotor (CAP) skills are built into the unit Learning Outcomes.

Unit 6:

Mechatronics

Unit code	T/615/1480
Unit level	4
Credit value	15

Introduction

Auto-focus cameras, car cruise control and automated airport baggage handling systems are examples of mechatronic systems. Mechatronics is the combination of mechanical, electrical and computer/controlled engineering working together in automated systems and 'smart' product design.

Among the topics included in this unit are: consideration of component compatibility, constraints on size and cost, control devices used, British and/or European standards relevant to application, sensor types and interfacing, simulation and modelling software functions, system function and operation, advantages and disadvantages of software simulation, component data sheets, systems drawings, flowcharts, wiring and schematic diagrams.

On successful completion of this unit students will be able to explain the basic mechatronic system components and functions, design a simple mechatronic system specification for a given application, use appropriate simulation and modelling software to examine its operation and function, and solve faults on mechatronic systems using a range of techniques and methods.

Learning Outcomes

By the end of this unit students will be able to:

1. Explain the design and operational characteristics of a mechatronic system.
2. Design a mechatronic system specification for a given application.
3. Examine the operation and function of a mechatronics system using simulation and modelling software.
4. Identify and correct faults in a mechatronic system.

Essential Content

LO1 Examine the design and operational characteristics of a mechatronic system

Origins and evolution:

History and early development, evolution

Practical examples and extent of use

Current operational abilities and anticipated improvements

Systems characteristics:

Design of systems in an integrated way

Sensor and transducer types used

Consideration of component compatibility

Constraints on size and cost

Control device requirements and examples of applications

LO2 Design a mechatronic system specification for a given application

Systems specifications:

British and/or European standards relevant to application

Sensor types and interfacing

Actuator technology availability and selection

Selection and use of appropriate control software/devices.

Consideration of the interaction of system variables

System commissioning parameters

LO3 Examine the operation and function of a mechatronics system using simulation and modelling software

Operation and functions:

Simulation and modelling software functions

System function and operation

Modes of operation simulation, loading and surges

Advantages and disadvantage of software simulation

LO4 Identify and correct faults in a mechatronic system

Locating and correcting system faults:

Component data sheets, systems drawings, flowcharts, wiring and schematic diagrams

Original system correct function and operation

Inspection and testing using methodical fault location techniques and methods, use of control software to aid fault location

Identification, evaluation and verification of faults and their causes, rectification, final system testing and return to service

- Essential content must be delivered but not all content has to be assessed
- Essential content is not weighted or hierarchical – it is up to the tutor to determine how the content should be delivered
- Essential content is not a limit – centres may add to the content to be delivered
- Did you know?.....there is a Curriculum Planning module on HN Global developed to support tutors with teaching delivery, plus example Schemes of Work

Learning Outcomes and Assessment Criteria

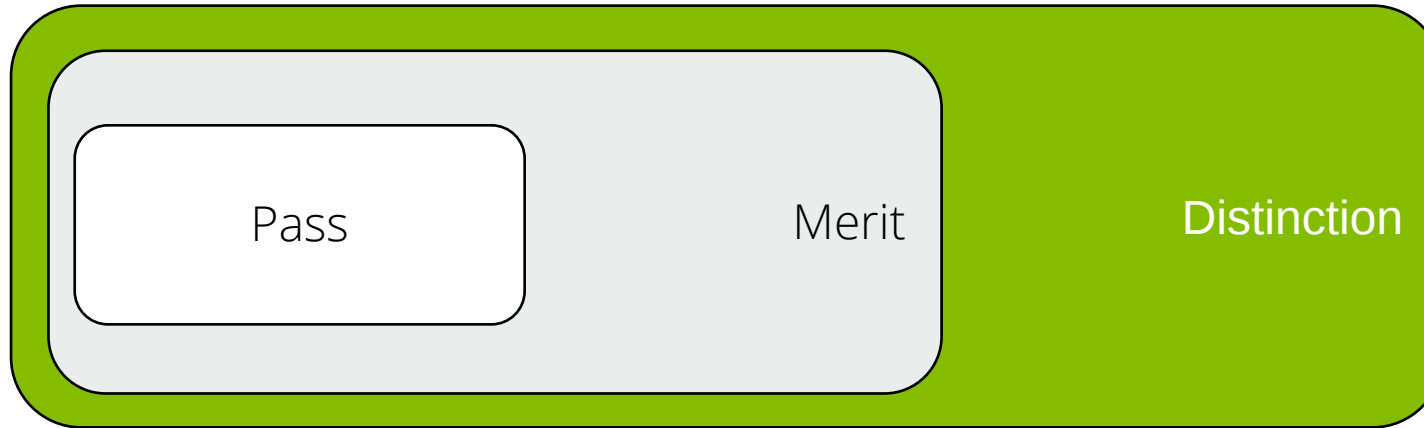
- Pass sets clear threshold
- Merit/Distinction define depth/breadth of understanding and learning
- Scaffolding principles
- Supports holistic assessment

Learning Outcomes and Assessment Criteria

Pass	Merit	Distinction
LO1 Examine the design and operational characteristics of a mechatronic system		D1 Investigate an actual mechatronics system specification to propose alternative solutions
P1 Describe the key components of a given mechatronics system	M1 Explore how the mechatronics components operate as part of an integrated system	
P2 Identify the types of actuators, sensors and transducers used in the mechatronics system	M2 Investigate the methods of control used by mechatronics systems	
LO2 Design a mechatronic system specification for a given application		D2 Evaluate the operational capabilities and limitations of the mechatronics system design specification produced
P3 Select the relevant sensor and the appropriate actuator technologies and produce a design specification suitable for these selections	M3 Justify the sensor and actuator technologies selected with reference to available alternatives	
LO3 Examine the operation and function of a mechatronics system using simulation and modelling software		D3 Explain the function and operation of a simulated mechatronics system
P4 Demonstrate industry standard mechatronics simulation/modelling software	M4 Describe the advantages and disadvantages of the software simulation	

Pass	Merit	Distinction
LO4 Identify and correct faults in a mechatronic system		D4 Investigate the causes of faults on a mechatronics system and suggest alternatives to the design specification to improve reliability
P5 Explain the safe use of fault finding test equipment	M5 Apply and document the correct use of fault finding techniques/ methods	
P6 Locate and rectify faults on a mechatronic system		

Command Verbs and Assessment Methodology

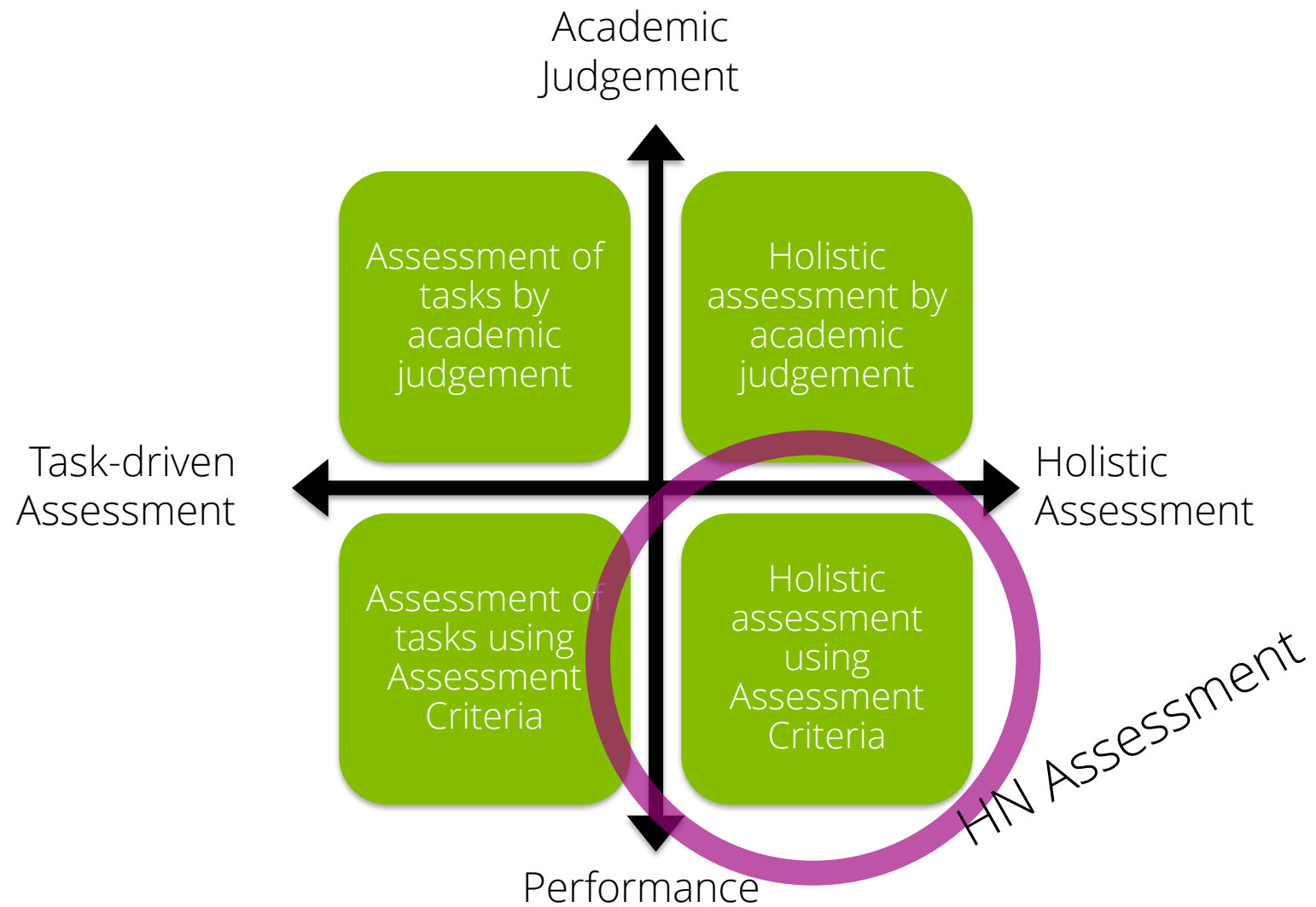


- The command verbs in Assessment Criteria are **contextual**
- The requirement to Analyse a simple concept may be less challenging than the requirement to Explain a complex concept
- The requirement to Describe the advantages and disadvantages in a technical situation may be more challenging than the requirement to Explain how to use a piece of equipment

Holistic Assessment

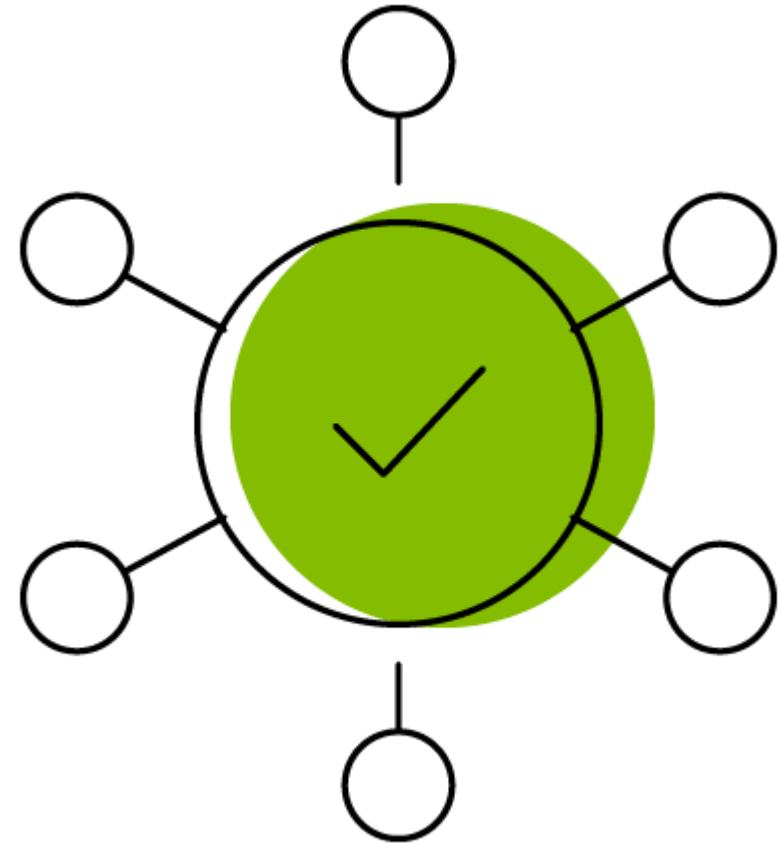


Decision making through Assessment



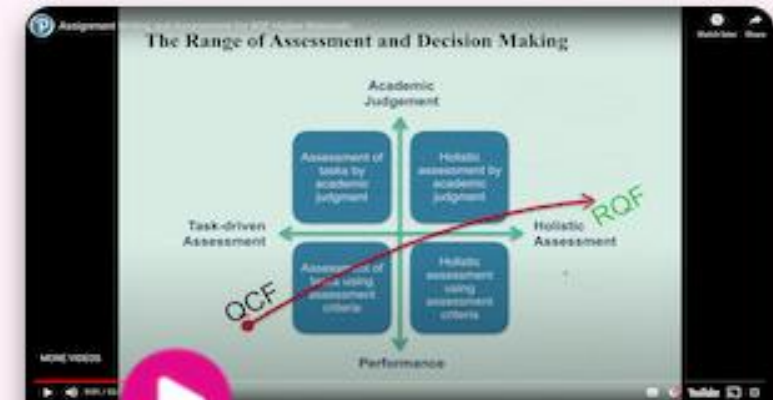
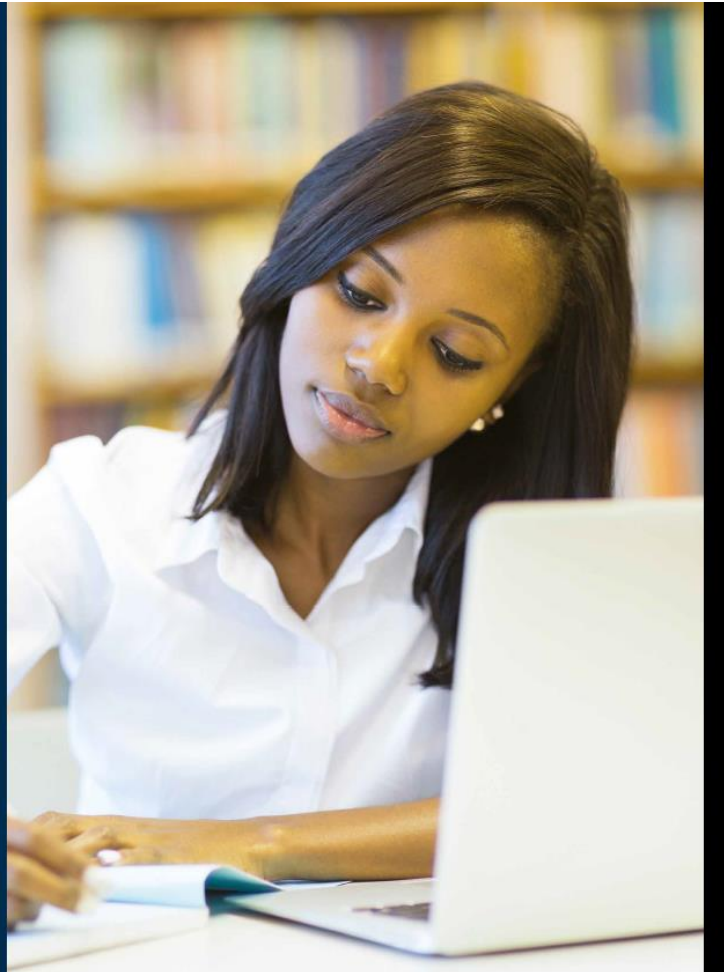
Holistic Assessment Process

- The tutor exercises academic and analytic judgement of the student's achievement based on the **assignment as a whole**.
- Assessment Criteria allow the evaluation of the **quality of the overall**, rather than individual parts.
- Assessment criteria are **not** used to grade the achievement of individual tasks/criteria (you do not award P1, M1 etc).
- Assessment Criteria are holistic in context but may also contain reference to specific content matter to provide guidance for the student.
- Students achieve a Pass, Merit or Distinction grade for each assignment.



Did you know...?

BTEC Higher Nationals - (RQF) Assessment & Feedback Guidance for Centres/Tutors



Assignment Writing and Assessment

[READ MORE](#)

[OPEN](#)

Any
Questions?
Break...



Assignment Brief



The Assignment Brief

An assignment brief should have the following:

- **Appropriate assessment method** for collecting the required evidence.
- **A vocational scenario** that motivates the student to apply their learning through the assignment.
- **Clear instructions** to the student about what they are required to do, normally set out through an **activity** or series of **activities**.
- **An audience or purpose** for which the evidence is being provided.
- **Guidance** that maximises opportunity not only for students to achieve Pass but also the higher grades.



Example Assignment Brief

Student Name/ID Number	
Unit Number and Title	Unit 1: Engineering Design
Academic Year	
Unit Tutor	
Assignment Title	The Design of A Printed Circuit Board (PCB) Inspection Jig
Issue Date	
Submission Date	
IV Name & Date	
Submission Format	
This assignment is in four parts: Formal report (around 1000 word) Written evaluation (around 600 words) Industry standard design report (around 1200 words) Formal presentation (maximum 8 slides)	
Unit Learning Outcomes	
LO1 Plan a design solution and prepare an engineering design specification in response to a stakeholder's design brief and requirements	
LO2 Formulate possible technical solutions to address the student-prepared design specification	
LO3 Prepare an industry-standard engineering technical design report	
LO4 Present to an audience a design solution based on the design report and evaluate the solution/presentation	

Example Assignment Brief

Assignment Brief and Guidance

You work as a **design engineer** for a **small manufacturing company** and have been asked to meet with a **potential customer**. The company **mass-produces** Printed Circuit Boards (PCBs) for laptop computers, in factories across Asia, the Far East and South America. Currently **PCBs are being inspected by hand**, but errors and damage have occurred on some production lines.

They require an **adjustable jig** that can be used in all the manufacturing facilities, on each of the production lines, and can hold a variety of different PCBs. The jig is to be attached to a workbench and it should rotate and swivel to allow **inspection of the PCB from any angle and both sides**.

With reference to the customer brief above you should **produce** a design specification, using a standard template, which meets all the customer requirements. In addition, you should **present** a project schedule for the design of the product. You should **consider** the importance, sequence and timing of each activity within your plan and provide illustrations of these.

To determine whether your brief is appropriate you should **compare and contrast** it with the **relevant** supplied industry standard specification.

Having completed your design specification, you have been asked to **present** a suggested design solution, based upon your design specification. Your presentation should include an **written evaluation** of at least three different solutions and **explain** the case for your proposed final choice.

Your manager likes your design proposal and would like you to **formally report** on this technical solution. You should **produce** an **industry standard design report**, and part of this report should incorporate an **evaluation** of the **effectiveness** of this report in terms of whether it will allow the production of a finished product that meets the manufacturer's and customer's requirements.

Your manager has reviewed your design report and would now like you to **prepare and deliver** a **presentation** to a wider audience of production managers and design engineers. It is likely that the audience may suggest changes/improvements to the given design solution and you should be prepared for this. Your manager wants a de-brief afterwards and will expect a **justification** of any further potential **improvements** following **feedback** and/or **review** of the presented design solution.

Your manager will also expect you to **explain** the possible communication strategies and presentation methods you might have used and reflect on the **effectiveness** of the **communication strategy** chosen.

Creating engaging and diverse assessment

What forms of evidence do you ask your students to produce?



Creating Engaging and Diverse Assessment Evidence



Forms of Assessment

Skills Domain (‘CAP’ Skills)	Possible assessment methods
Cognitive (knowledge)	• Q+A (written/oral) • Tests/Exams • Reports/Essays • Presentation • Debate
Affective (attitudes, behaviours)	• Evaluation of subject/knowledge through: • Witness statement • Review of evidence • Reflective Statements • Student Reflective journal • Observation • Performance review (self review, peer review etc.)
Psychomotor (application)	• Demonstration/Presentation • Project outcomes • Case studies • Role Plays • Work-based Learning • Producing documentation (e.g. design specification, CAD drawing)

Did you know....? We have an Assignment Checking Service

<https://qualifications.pearson.com/en/support/Services/assignment-checking-service.html>

Contact: acs@pearson.com

BTEC (QCF/NQF/RQF) Level 4/5 Higher Nationals



What is the BTEC assignment checking service?

The assignment checking service is a free support service for BTEC centres that's designed to help you ensure that your assignments enable learners to demonstrate appropriate evidence across the required criteria.

The service has been especially useful for programme teams who are relatively new to BTEC and who want to check that their assignments – particularly for new specifications – are fully meeting the requirements of the specification.

Who can use it?

The assignment checking service is available to all approved BTEC centres. You can submit assignments for a maximum of two units per BTEC programme.

How do I submit my assignment?

To submit your assignments, you will need to complete the Assignment Checking Submission form at the top of the page.

- Be careful to include all the information required and fill out the submission form correctly, as we cannot accept assignments for checking unless all details are complete.
- Please ensure you read the terms and conditions of this service before submitting the form.



Did you know....? We offer the following training support for assessment

- Assessment Planning and Assignment Writing RQF BTEC Higher Nationals
(Available as generic and subject specific training)
- Workshop for Developing Assignments in BTEC RQF Higher Nationals
(Available as centre-based only)
- Grading Standardisation Workshop for BTEC Higher Nationals in Engineering (RQF)

<https://qualifications.pearson.com/en/support/training-from-pearson-uk.html>



Assessment Grading Decisions

The Mastery Model of Assessment

		Assessment Criteria		
		Pass	Merit	Distinction
Grade	Pass	X		
	Merit	X	X	
	Distinction	X	X	X

To achieve at a grade the student must achieve *everything at that grade and below*.

Quiz

A student achieves the following grades for the Learning Outcomes of a unit...

- LO1 – Pass
- LO2 – Merit
- LO3 – Distinction
- LO4 – Distinction

What is the overall grade?

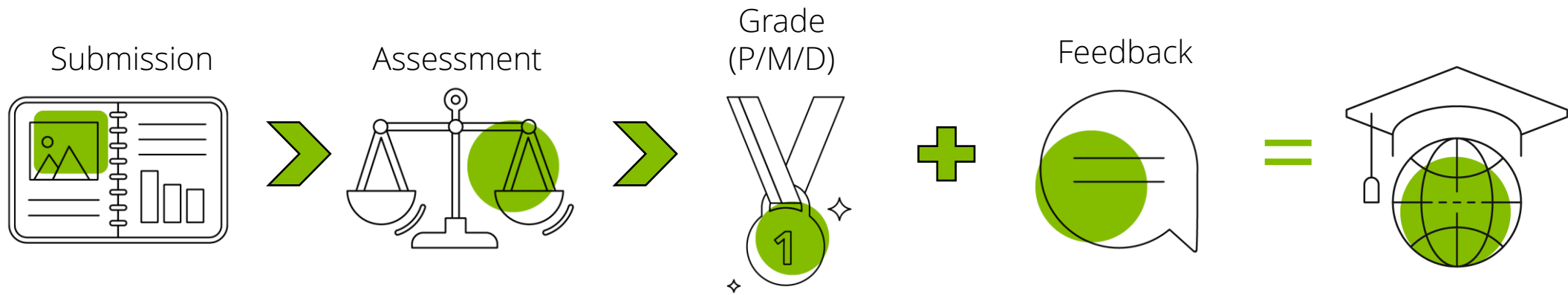


Resubmission

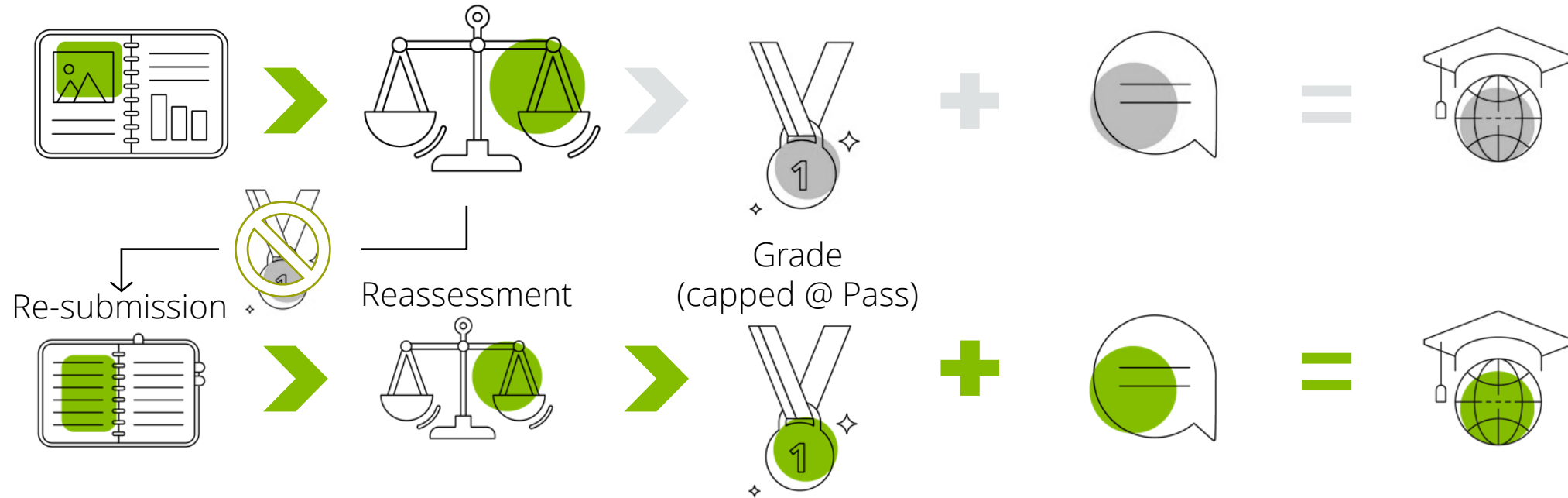
- A student who does not achieve a Pass grade at the first assignment attempt will have **one resubmission opportunity**.
- A resubmission for a project or portfolio based assessment will normally involve the reworking of the original task.
- For examinations, a resubmission will involve the completion of a new task.
- A student who undertakes a resubmission for an assignment will have their **grade** capped at a Pass **for that unit**.
- Decisions and results must be ratified and recorded at **the Assessment Board**.



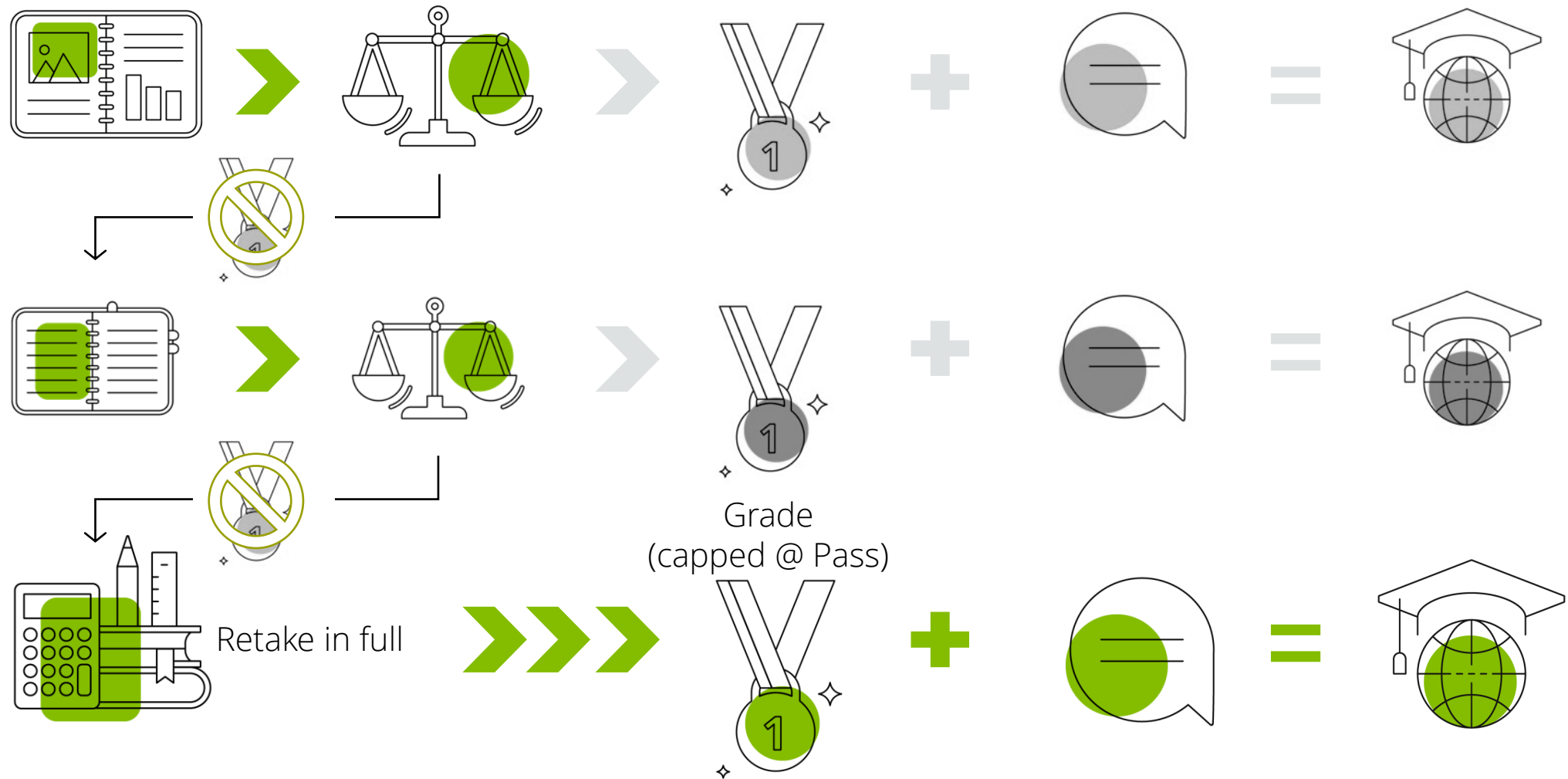
Assessment Process

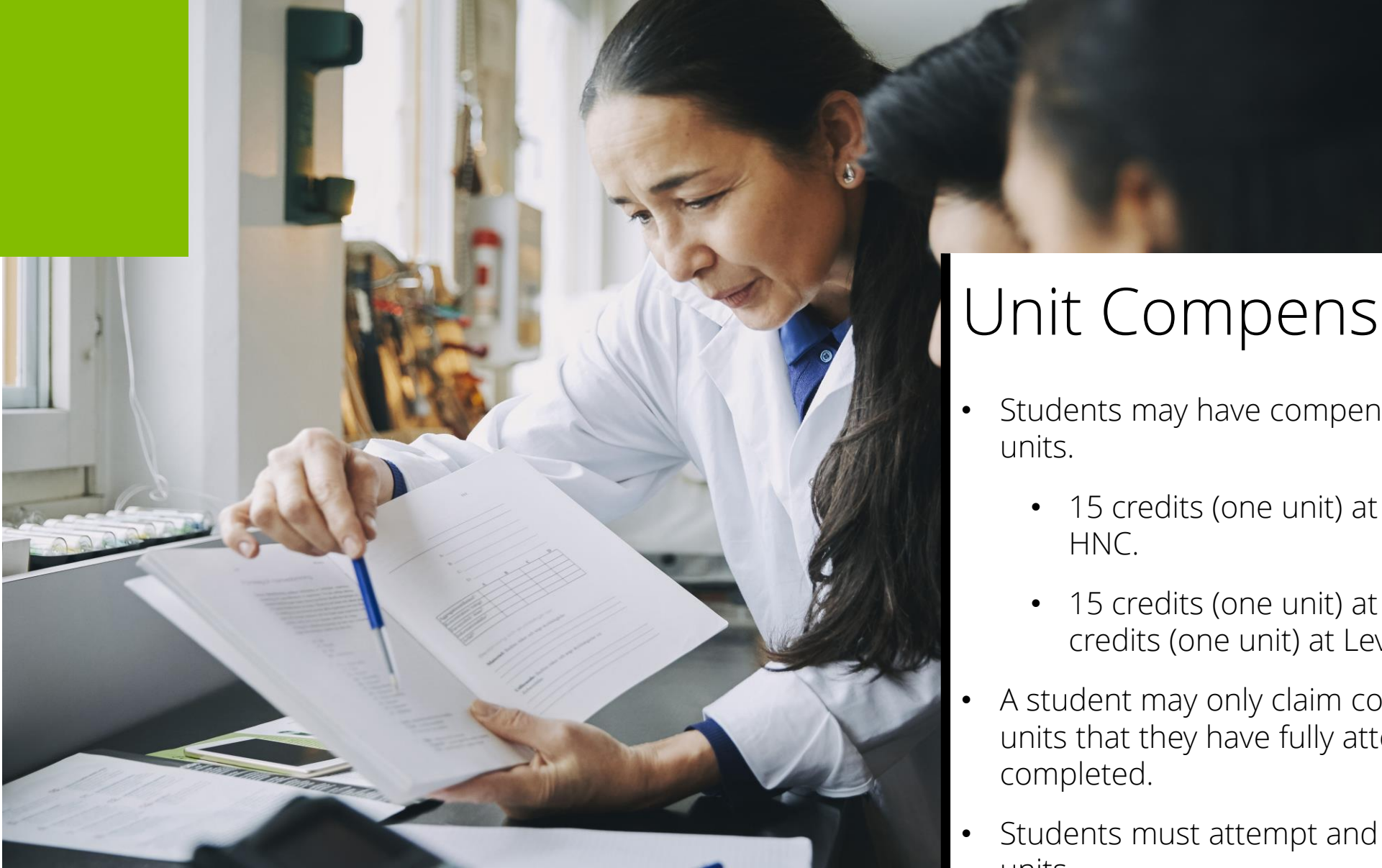


Assessment Process



Assessment Process





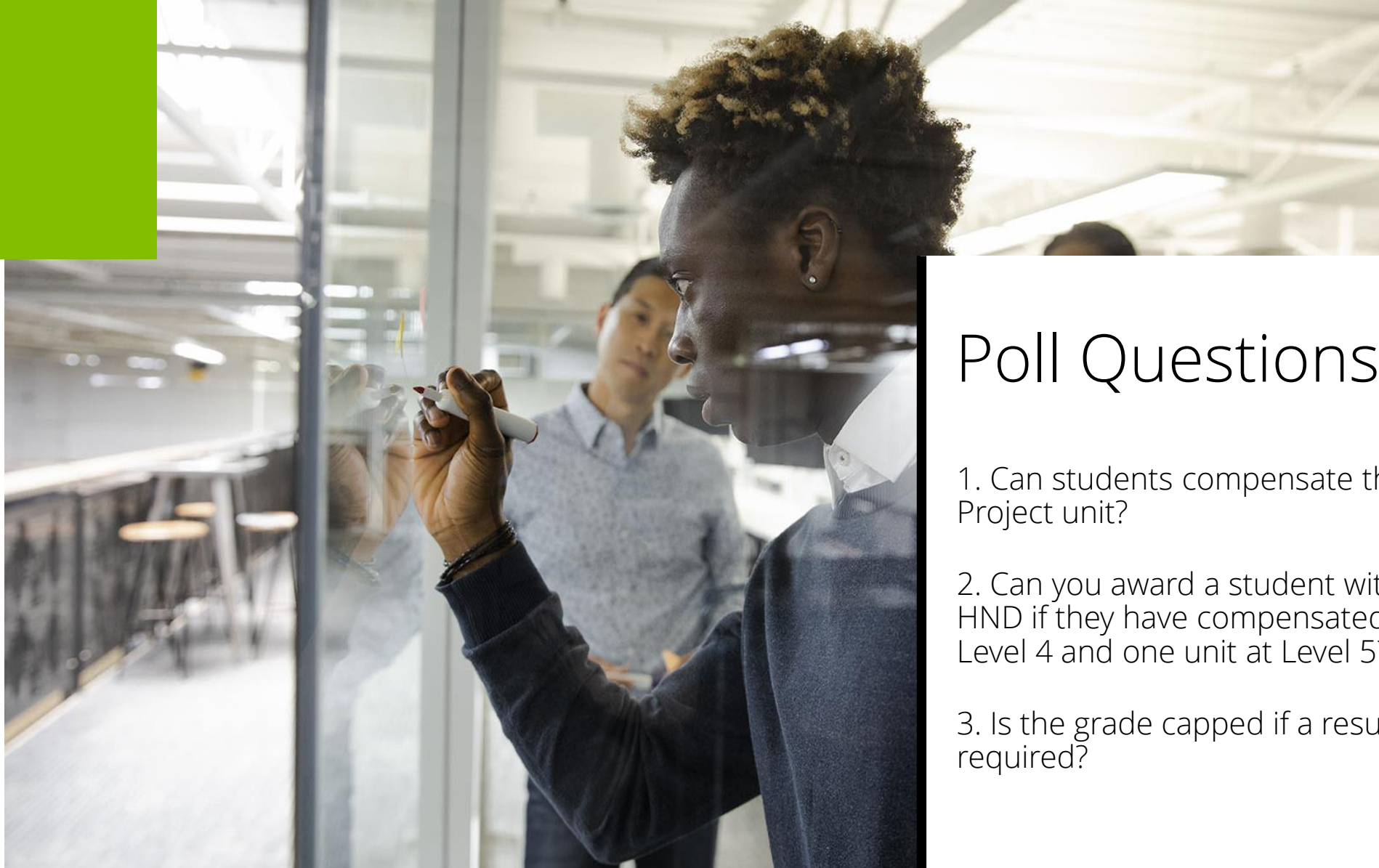
Unit Compensation

- Students may have compensation for failed units.
 - 15 credits (one unit) at Level 4 for the HNC.
 - 15 credits (one unit) at Level 4 and 15 credits (one unit) at Level 5 for the HND.
- A student may only claim compensation on units that they have fully attempted and completed.
- Students must attempt and complete ALL units.

Overall Qualification Grade

	Points per Credit	Point Boundaries for Overall Qualification
Pass	4 points	420 – 599
Merit	6 points	600 – 839
Distinction	8 points	840 - 960





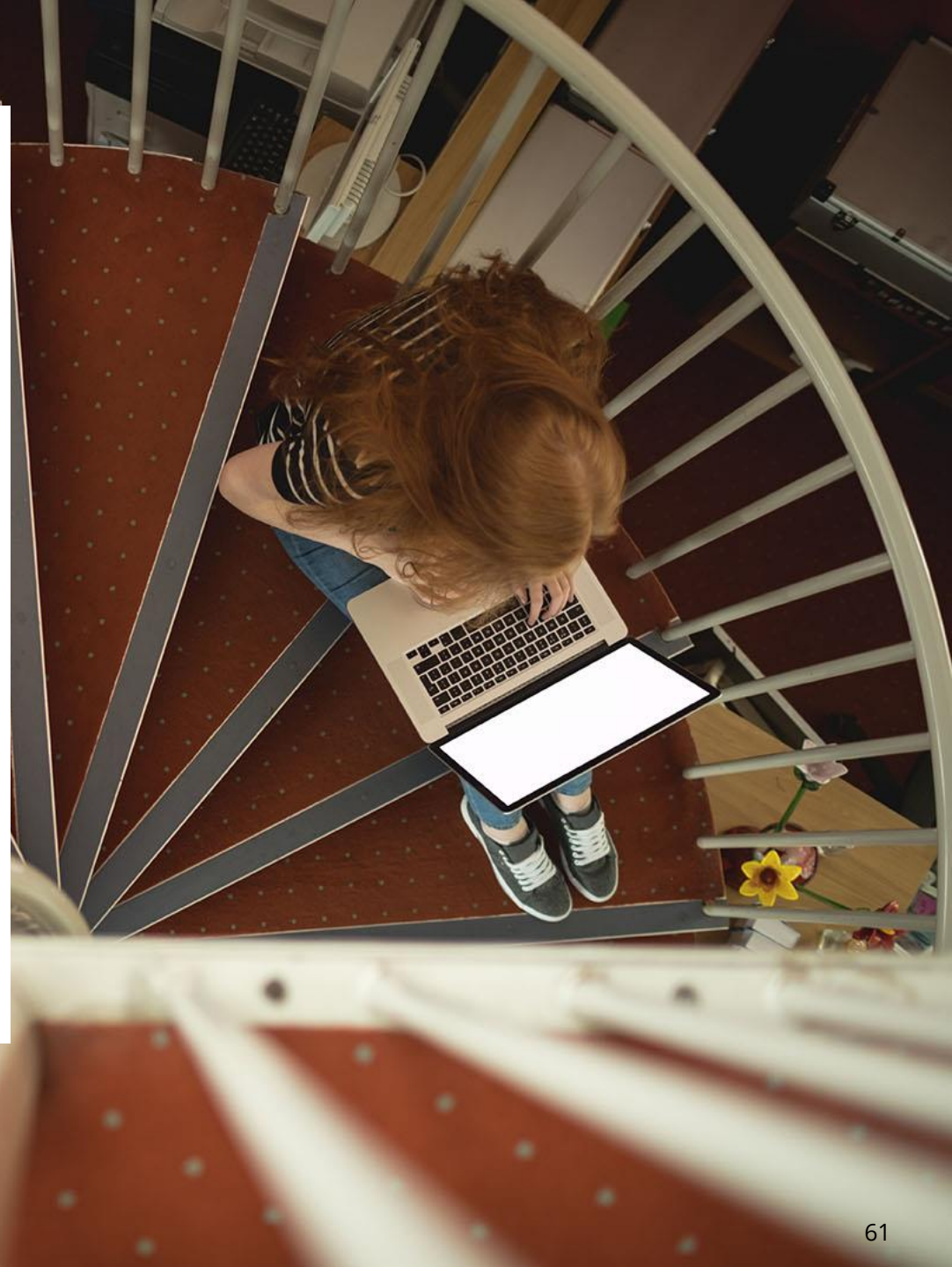
Poll Questions

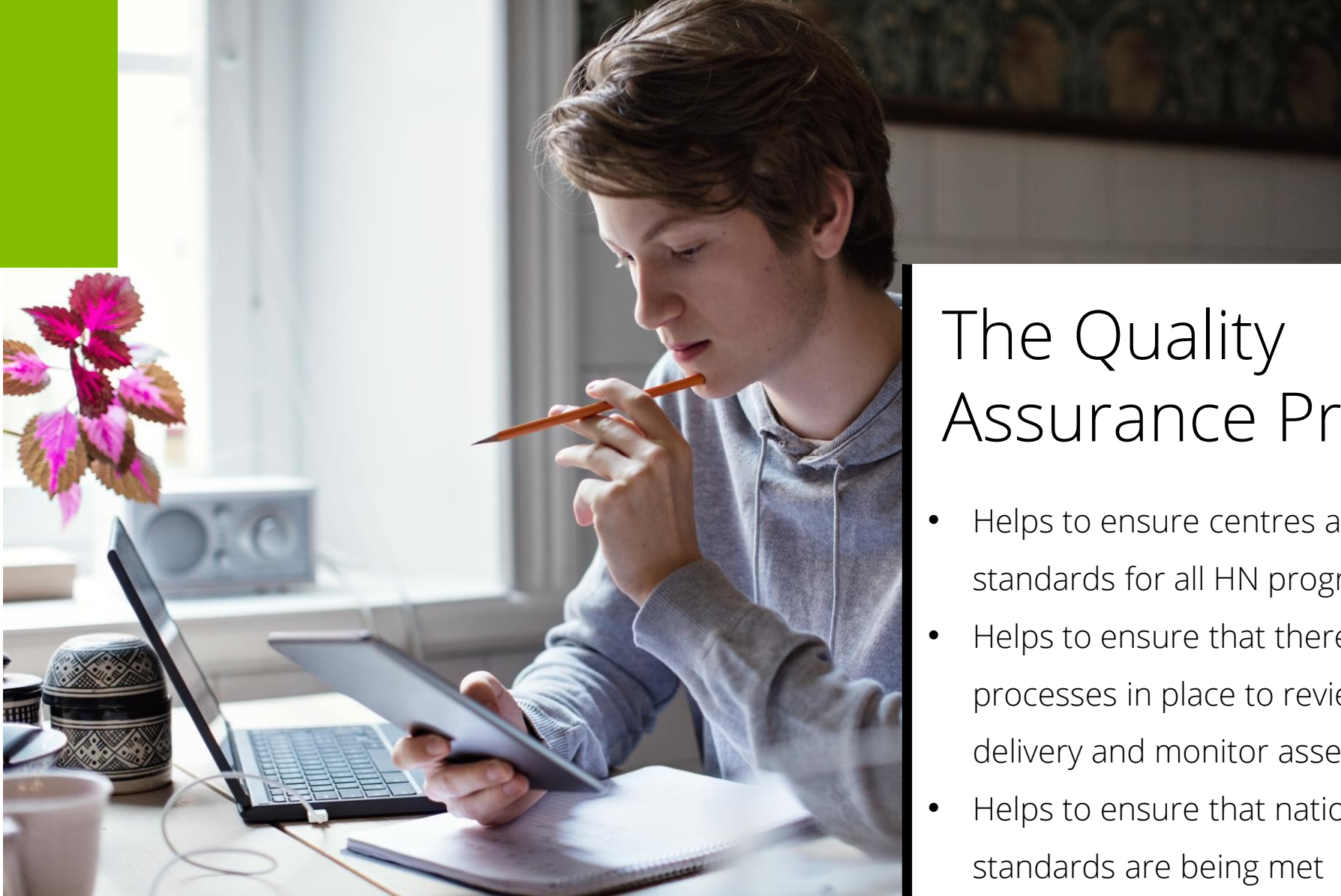
1. Can students compensate the Research Project unit?
2. Can you award a student with a HNC or HND if they have compensated one unit at Level 4 and one unit at Level 5?
3. Is the grade capped if a resubmission is required?

Any Questions?



Quality Assurance

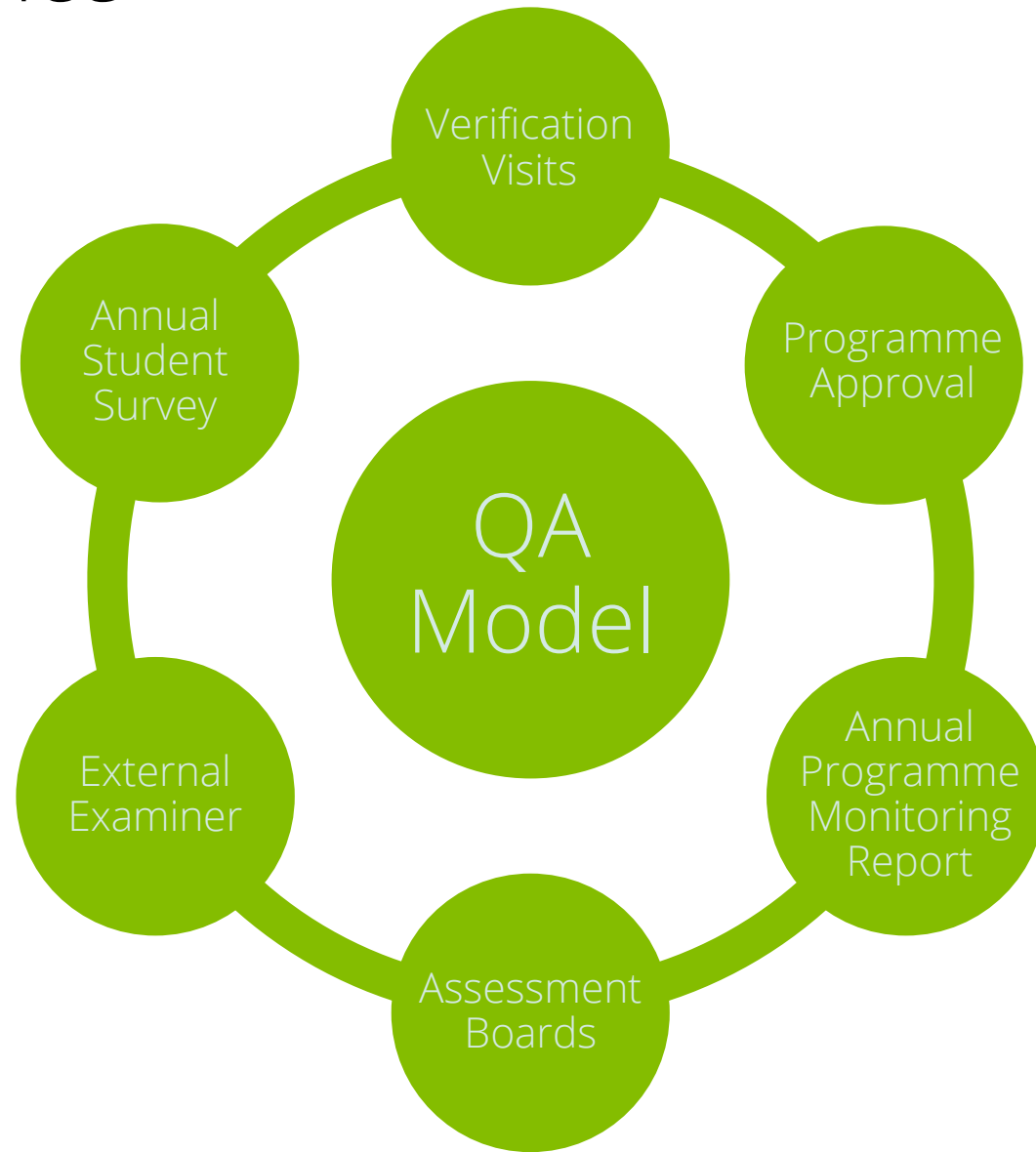




The Quality Assurance Process

- Helps to ensure centres are meeting national standards for all HN programmes
- Helps to ensure that there are effective processes in place to review programme delivery and monitor assessment outcomes
- Helps to ensure that national and regulatory standards are being met

Quality Assurance Process





Annual Programme Monitoring Review & Annual Student Survey

APMR

- Centres will be required to submit an APMR through our online portal
- The portal opens up in autumn each year
- Centres delivering multiple HNs complete one form for all
- Pearson produce an overview report detailing findings

Annual Student Survey

- The annual student survey opens to all BTEC Higher National students from **19 April** each year
- We use the feedback to inform the future design of our qualifications and to support the development of resources
- The survey results give Pearson and our approved centres a global perspective of student opinion
- We also offer [bespoke reports](#) to our approved centres which focus on their students' opinion of programmes

Assessment Boards

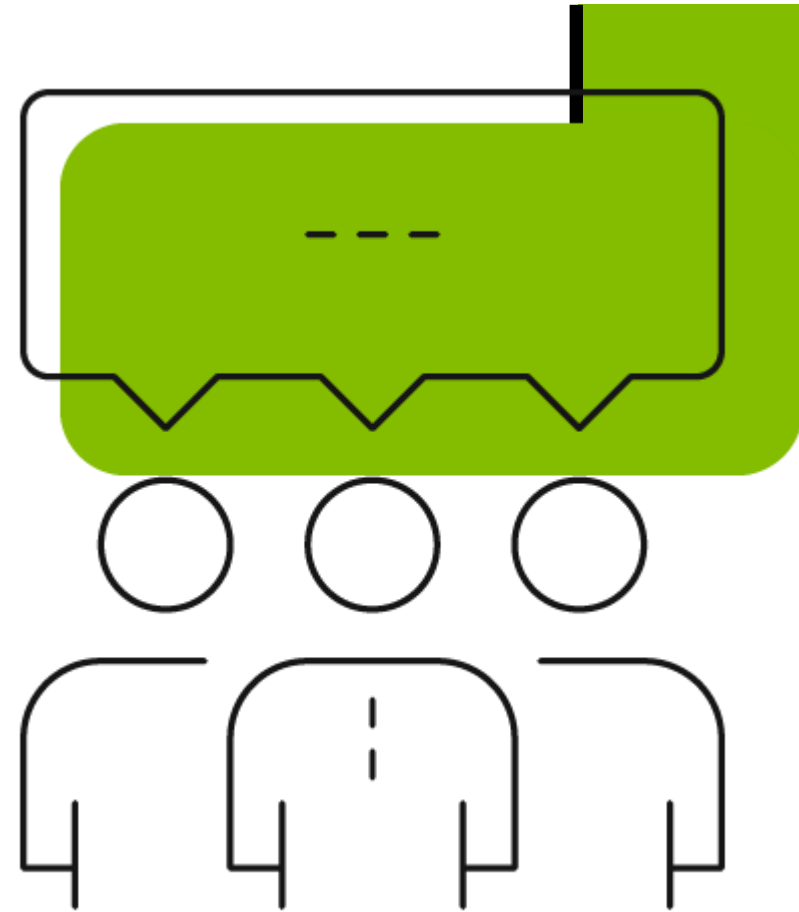
An Assessment Board is mandatory for centres offering the BTEC HNs.

The purpose of the board is to consider the following:

- the grades achieved by students on the individual units
- extenuating circumstances
- cases of cheating and plagiarism
- progression of students onto the next stage of the programme
- the awards to be made to students
- reassessment and repeats

Assessment boards will need to be run at centres for each HN programme.

External Examiners (EEs) will be monitoring that these are taking place & helping centres with an action plan to put these into place if they are not occurring.



Internal Verification

IV templates can be found in the Centre Admin/QA hub on HN Global – always keep an audit trail (paper based or electronic)

The Internal Verifier should check that the:

- assignment guidance and forms of evidence will allow the student to address the targeted Learning Outcome(s) and associated assessment criteria
- language and level are appropriate
- roles and activities are vocationally relevant
- actions are addressed
- documentation is signed and dated

IV Summary

The IV *should*

- Carry out scheduled IV of Assignment Briefs before they are issued to students
- Check the assignment brief against the unit specification (LOs and ACs)
- Provide full and supportive written feedback to the assessor



The IV *should not*

- Internally verify assignments they have written themselves
- Verify assignments after they have been issued
- Provide remedial actions without checking they have been carried out

The Role of the External Examiner

- Pearson employs experts (External Examiners - EEs) to work with you to ensure standards are met.
- Your contracted EE will visit you either once (UK) or twice (International) per year.
- A report will be produced after each visit.

They check the following:

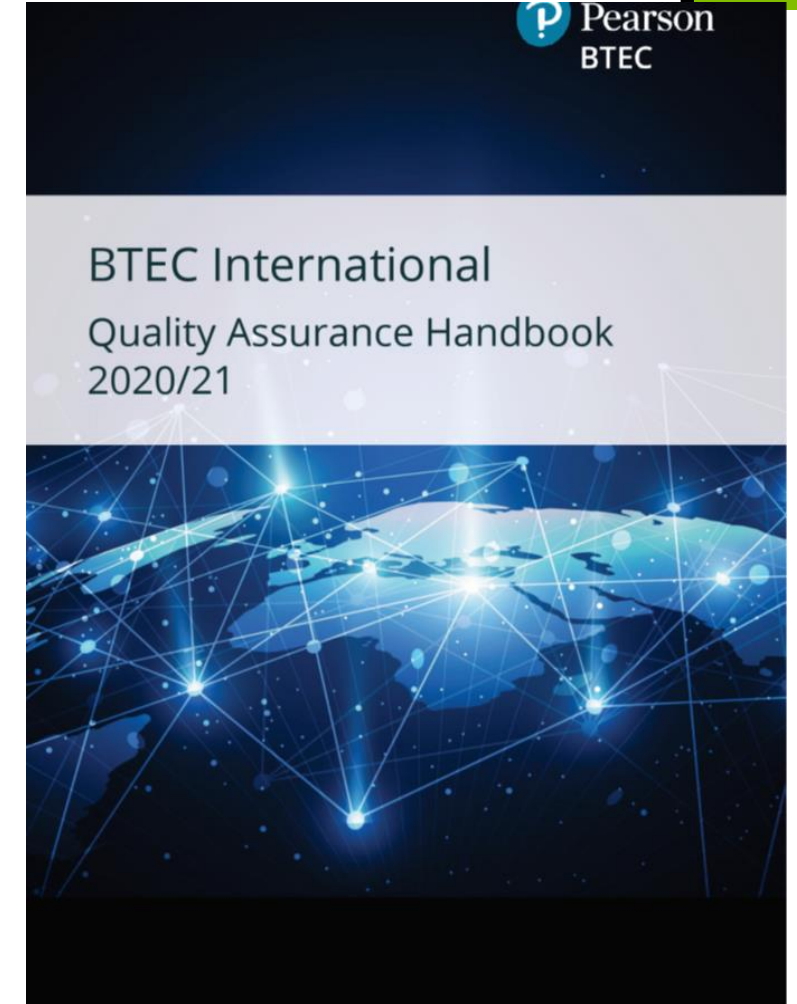
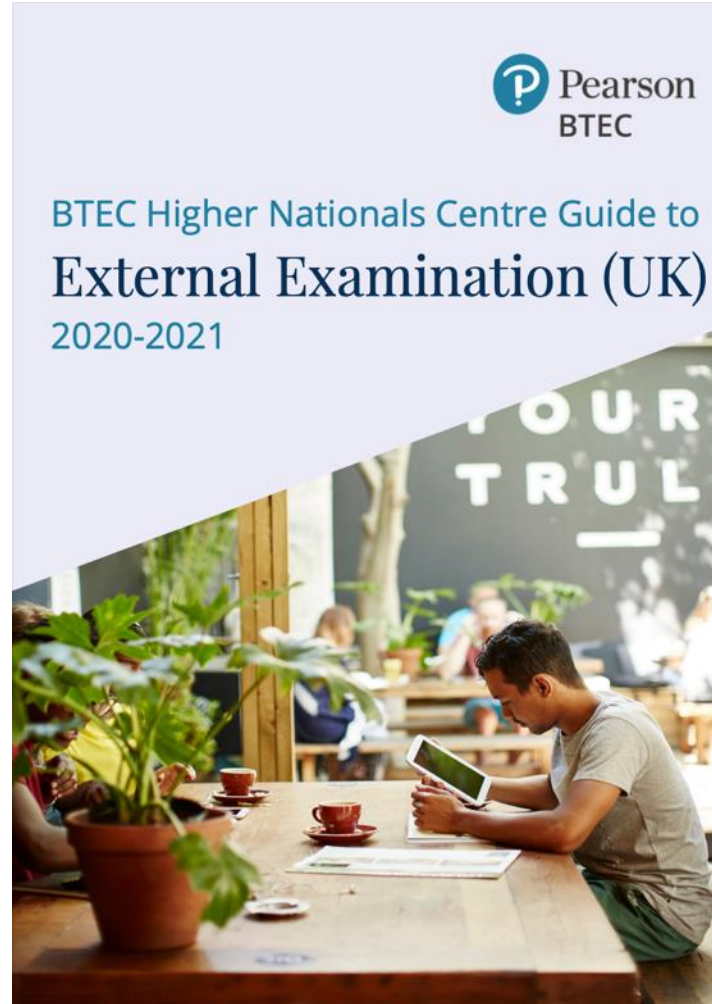
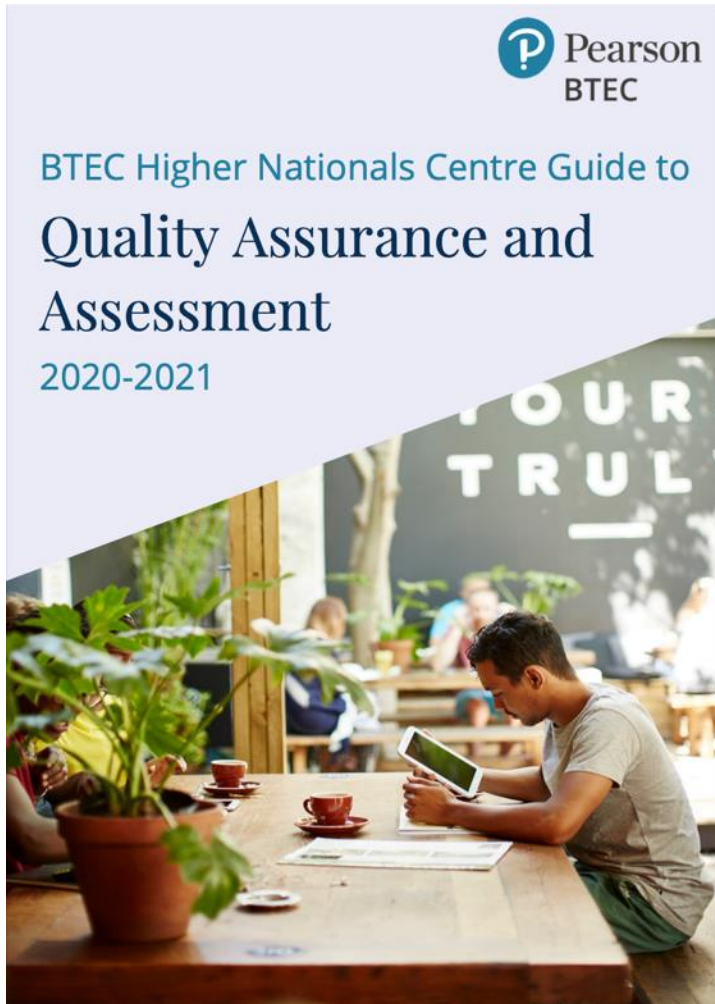
- Assessment planning and methods
- **Assessment decisions** (inc. minutes of Assessment Boards)
- Internal verification
- Physical resources
- Human resources
- Implementation of action plans
- Policies



Any Questions?



Did you know...? We have Quality Assurance & External Examination guides available in HN Global



Recap and what steps will you take next?

- Set up an account with **HN Global** to access all your delivery resources and assessment support
- Register all your students on HN Global
- Refer to the **qualification specification for structure tables** and rules of combination
- Review your **delivery plan** to meet tutor / student needs
- Create **holistic assignment briefs** using the EABs for support
- Internally verify the **assignment briefs** to ensure they are fit for purpose



Training & Contacts



Training

Further Higher Nationals training sessions
available via:

<https://bit.ly/3fRcWDi>

Centre-based training is available by request at:

<https://bit.ly/3kuCk7Q>

Pearson Support

General queries about the Pearson BTEC Higher Nationals:
highernationals@pearson.com

Queries regarding quality assurance for Pearson BTEC
Higher Nationals:
hnqa@pearson.com

Training queries:
Stuart.Abrahamson@pearson.com
Kieran.Brickell@pearson.com



HN Newsletter

 Pearson | BTEC

[View online](#)



Welcome to the
Higher Nationals Newsletter
July 2021 Edition

Did you hear about the HND in Computing getting recognition from IfATE? That's the first for us and a start of our journey into the era of Higher Technical Qualifications in England. If you'd like to hear what we do next, make sure to [sign up](#).

Many of you will be preparing to award your students this summer. If this is you, don't forget to read [our guidelines](#).

And finally, here's something to share with students who are considering to go to university after their Higher National: we published a blog about [topping up to a degree](#).

Contact us via [Pearson Support](#) or email at highernationals@pearson.com if you have any questions.

Best wishes,
Hanna

Our first Higher Technical Qualification



We are very pleased to announce that, after a very long but rewarding process, the Pearson BTEC Higher National Diploma in Computing is the first Pearson qualification to be approved under a new process led by the Institute for Apprenticeships & Technical Education (IfATE) in England.

The qualification now holds the Higher Technical Qualification quality mark and will be available for first teach from September 2022.

[Find out more](#)

Keep up-to-date with updates, information and new releases



<https://bit.ly/3xNnUDG>



Thank You!



Pearson