Qualification Specification:

OCN NI Level 3 Award in Photovoltaic

- **Qualification No: 610/6164/5**

Version: 1.0

1. Specification Updates

Key changes have been listed below:

Section	Detail of change	Version and date of Issue
Specification	Newly developed qualification	V1.0 - March 2025

2. Contents

3. Introduction to Open College Network Northern Ireland (OCN NI)

The Open College Network Northern Ireland (OCN NI) is a UK recognised awarding organisation based in Northern Ireland. We are regulated by CCEA Regulation to develop and award regulated professional and technical (vocational) qualifications from Entry Level up to and including Level 5 across all sector areas. In addition, OCN NI is also regulated by Ofqual to award qualifications in England.

OCN NI is also an educational charity that advances education by developing nationally recognised qualifications and recognising the achievements of learners. We work with centres such as Further Education Colleges, Private Training Organisations, Voluntary & Community Organisations, Schools, SME's and Public Sector bodies to provide learners with opportunities to progress into further learning and/or employment. OCN NI's Strategic Plan can be found on the OCN NI website www.ocnni.org.uk.

For further information on OCN NI qualifications or to contact us, you can visit our website at www.ocnni.org.uk. The website should provide you with details about our qualifications, courses, contact information, and any other relevant information you may need.

OCN NI Contact Details

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4. About this Specification

This specification details OCN NI's specific requirements for the delivery and assessment of the **OCN NI Level 3 Award in Photovoltaic.**

This specification will provide guidelines for centres to ensure the effective and correct delivery of these qualifications. OCN NI qualification specifications are based on research and engagement with the practitioner community to ensure they provide appropriate skills and knowledge for learners.

The qualification specification will detail the following aspects of the **OCN NI Level 3 Award in Photovoltaic.**

- **Qualification Features**: this includes the key characteristics and features of these qualifications, such as their intended audience, purpose, and credit value.

- **Centre Requirements:** this details the prerequisites and obligations that centres must fulfil to be eligible to deliver and assess these qualifications. These include guidelines on staff qualifications, resources, and required procedures.

- **Structure and Content:** this details the structure and content of the qualifications including units, and any specific content that learners will be required to study.

- **Assessment Requirements:** this details assessment criteria and assessment methods for these qualifications, ensuring that summative assessment approaches are clear.

- **Quality Assurance:** the quality and consistency of delivery and assessment of these qualifications are of paramount importance to OCN NI. The mandatory quality assurance arrangements including processes for internal and external verification that all centres offering these qualifications must adhere to are detailed.

- **Administration:** guidance on the administrative aspects of delivering these qualifications, including registration, certification, and record-keeping.

- Reference to other handbooks and policies as appropriate to the qualifications.

It is important to note that OCN NI will communicate any significant updates or changes to this specification in writing to our centres. Additionally, we will make these changes available on our official website at www.ocnni.org.uk.

To stay current, please refer to the online version of this specification as it is the most authoritative and up-to-date publication. Be aware that downloaded and printed copies may not reflect the latest revisions.

4.1 Additional Support

OCN NI offers a comprehensive range of support services designed to assist centres in meeting the delivery and quality assurance requirements of OCN NI qualifications. These services include:

- **Learner Assessment Booklets**: These booklets are created to assist learners in demonstrating the fulfilment of assessment criteria and organising the quality assurance prerequisites for each individual unit.

- **Specimen Assessment Materials**: These have been designed to work in conjunction with the learning content for each individual unit and assist learners to provide evidence which enables them to meet each assessment criteria.

- **Qualification Support Pack**: A support pack has been developed to support centres in the delivery of these qualifications. The pack includes planning and assessment templates, guides to best practice, etc.

- **Professional Development for Educators**: OCN NI provides opportunities for professional development tailored to meet the various needs of practitioners and quality assurance staff. Centres can join our training sessions, available in both face-to-face and online formats, or explore a wealth of training materials by visiting www.ocnni.org.uk

- **OCN NI Subject Advisors**: Our team of subject advisors offers vital information and support to centres. They provide guidance on specification details, non-exam assessment advice, updates on resource developments, and various training opportunities. They actively engage with subject communities through an array of networks to facilitate the exchange of ideas and expertise, to support practitioners to provide quality education programs to learners.

All centres can access information, support and guidance to support the delivery and quality assurance of these qualifications by contacting their designated Business Development Advisor or by contacting us on Contact Us | OCN NI

5. About these Qualifications

5.1 Qualification Regulation Information

OCN NI Level 3 Award in Photovoltaic
Qualification number: 610/6164/5

Operational start date: 01 August 2025
Operational end date: 31 July 2030
Certification end date: 31 July 2033

The qualifications' operational start and end dates define the regulated qualifications' lifecycle. The operational end date is the final date for learner registration, while learners have until the certificate end date to complete the qualifications and receive their certificates.

It is important to note that all OCN NI regulated qualifications are listed on the Register of Regulated Qualifications (RQF), which can be found at Ofqual Register. This register is maintained by Ofqual in England and CCEA Regulation in Northern Ireland. It contains information about qualifications that are regulated and accredited. It is a key resource for learners, employers, and educational institutions to verify the status and recognition of qualifications.

Centres must adhere to administrative guidelines diligently, with special attention to the fact that fees, registration, and certification end dates for the qualification may be subject to changes. It is a centre's responsibility to make itself aware of updates on any modifications to ensure compliance with the latest requirements. OCN NI provides centres with timely updates through various channels including website, newsletters and through this specification. Information on qualification fees can be found on the Centre Login section of the OCN NI website www.ocnni.org.uk .

5.2 Sector Subject Area

A subject sector area is a specific category used to classify academic and vocational qualifications. Subject sector areas are part of the educational and qualifications framework to organise and categorise qualifications. The sector subject for this qualification is:

5.2 Building and Construction

This qualification is mapped to National Occupational Standards below where appropriate.

Link to following NOS: URN: NOS reference:

BSEECD01 Implement safe site working practices when working in dwellings
BSEECD02 Design and determine the positioning, fitting and fixing of electrical wiring systems, wiring, enclosures, accessories and equipment in dwellings
INSEA5 Promote low and zero carbon energy technologies
BSESPV02 Install and connect Solar PV and EESS systems
BSESPV01 Install assemblies and enclosures for Solar PV and EESS systems
BSESPV06 Maintain Solar PV and EESS systems
BSESPV05 Identify and rectify faults in Solar PV and EESS systems
BSESPV04 Commission Solar PV and EESS systems
BSESPV03 Inspect and test Solar PV and EESS Systems

5.3 Grading

Grading for these qualifications is pass/fail.

5.4 Qualifications' Aims and Objectives

Qualifications' Aim

The aim of the OCN NI Level 3 Award in Photovoltaic is to provide learners with an understanding of photovoltaic technology for small-scale photovoltaic systems.

Qualifications' Objectives

The objectives of these qualifications are to enable learners to understand:

- photovoltaic energy generation and current challenges faced by utility providers
- the risk assessment process that should be conducted prior to installing solar photovoltaic systems
- how to design modular photovoltaic systems
- solar photovoltaic system protection techniques and components
- installation, commissioning, and operation of a small-scale photovoltaic system
- how to design a maintenance programme for a photovoltaic system and diagnose core component faults

5.5 Target Learners

This qualification is targeted at learners who want to work in the area of sustainable energy, including the design and installation of photovoltaics systems or wish to develop their skills further.

5.6 Entry Requirements

In order to take this qualification learners must be at least 18 years old and have an interest in the area of design and installation of photovoltaic systems.

5.7 Progression

The OCN NI Level 3 Award in Photovoltaics will enable learners to progress to related Level 3 qualifications or into employment.

5.8 Delivery Language

These qualifications are exclusively available in English. If there is a desire to offer these qualifications in Welsh or Irish (Gaeilge), we encourage you to get in touch with OCN NI. They will assess the demand for such provisions and, if feasible, provide the qualification in the requested language as appropriate.

6. Centre Requirements for Delivering these Qualifications

6.1 Centre Recognition

New and existing OCN NI recognised centres must apply for and be granted approval to deliver these qualifications prior to the commencement of delivery.

6.2 Qualification Approval

Once a centre has successfully undergone the Centre Recognition process, it becomes eligible to apply for qualification approval. The centre's capability to meet and sustain the qualification criteria will be assessed. Throughout the qualification approval process, OCN NI will aim to ensure that:

- centres possess suitable physical resources (e.g., equipment, IT, learning materials, teaching rooms) to support qualification delivery and assessment
- centre staff involved in the assessment process have relevant expertise and/or occupational experience
- robust systems are in place for ensuring ongoing professional development for staff delivering the qualifications
- centres have appropriate health and safety policies concerning learner equipment use
- qualification delivery by centres complies with current equality and diversity legislation and regulations
- as a part of the assessment process for these qualifications it may be useful for learners to have access to a practical work setting

6.3 Centre Staffing

To offer these qualifications centres are mandated to establish the following roles as a minimum, although a single staff member may serve in more than one capacity*:

- Centre contact
- Programme Co-ordinator
- Assessor
- Internal Quality Assurer

*Note: An individual cannot serve as an Internal Quality Assurer for their own assessments.

6.4 Tutor Requirements

Tutors responsible for delivering these qualifications are expected to possess a high degree of occupational competency. They should meet the following criteria:

- **Occupational Competency:** Tutors should demonstrate a clear understanding of the subject matter, including up-to-date knowledge. This competence should enable them to effectively impart knowledge and practical skills to learners.

- **Qualifications:** Tutors should hold qualifications at a level that is at least one level higher than the qualification they are teaching. This ensures that they have the necessary academic foundation to provide in-depth guidance and support to learners.

- **Relevant Industry Experience:** In addition to academic qualifications, tutors must have a minimum of three years of relevant, hands-on experience.

These requirements collectively ensure that learners receive instruction from highly qualified and experienced instructors, thereby enhancing the quality and effectiveness of their educational experience.

6.5 Assessor Requirements

The assessment of these qualifications takes place within the centre and is subjected to OCN NI's rigorous quality assurance procedures. The achievement of individual units is based on the criteria defined in each unit.

Assessors play a pivotal role in ensuring the validity and fairness of assessments. They are required to meet the following criteria:

- **Occupational Competency:** Assessors should possess a high degree of occupational competency in the relevant subject matter. This expertise enables them to accurately evaluate and measure a learner's knowledge and skills. Additionally, they should hold qualifications at a level that is at least one level higher than the qualification they are assessing, ensuring their in-depth understanding of the subject matter.

- **Relevant Industry Experience:** A minimum of three years of relevant practical experience is a prerequisite. This practical background is essential for assessors to effectively evaluate a learner's capabilities in real-world contexts.

- **Assessment Expertise:** Assessors should have direct or related experience in the field of assessment. This includes knowledge of best practices in designing, conducting, and grading assessments. Their expertise ensures that assessments are both fair and valid.

- **Assessors Qualification:** Assessors should hold or be currently undertaking a recognised assessor's qualification; or must have attended the OCN NI Assessment Training.

- **Comprehensive Assessment Oversight:** Assessors are responsible for evaluating all assessment tasks and activities comprehensively. They must thoroughly review and assess each element to ensure a fair and accurate representation of a learner's skills and knowledge.

These rigorous requirements uphold the quality and integrity of the qualification's assessment process, ensuring that learners receive a fair and reliable evaluation of their competencies.

6.6 IQA Requirements

The IQA plays a crucial role in the Centre's internal quality assurance processes. The Centre must designate a skilled and trained IQA who assumes the role of an internal quality monitor responsible for verifying the delivery and assessment of the qualifications.

The IQA for these qualifications must meet the following criteria:

- **Relevant Industry Experience:** A minimum of three years of relevant practical experience is a prerequisite. This practical background is essential for IQAs to effectively evaluate a learner's capabilities in real-world contexts.
- **IQA Expertise:** IQAs should have direct or related experience in the field of verification. This includes knowledge of best practices in designing, conducting, and grading assessments. Their expertise ensures that assessments are both fair and valid.
- **IQAs Qualification:** IQAs should hold or be currently undertaking a recognised IQA's qualification; or must have attended the OCN NI IQA Training.
- **Thorough Evaluation of Assessment Tasks and Activities:** IQAs are tasked with conducting in-depth reviews and assessments of all assessment tasks and activities. Their responsibility is to ensure a comprehensive and meticulous oversight of each element to guarantee a just and precise reflection of a learner's abilities and knowledge and to ensure that all assessment and quality assurance requirements are fulfilled.

7. Qualification Structure

7.1 Qualification Purpose

The OCN NI Level 3 Award in Photovoltaic is designed to provide learners with the technical knowledge and practical skills required to install, commission, and maintain solar photovoltaic (PV) systems. Aimed at those with a background in electrical, mechanical, or energy-related fields, the qualification equips learners to work safely and effectively in the growing renewable energy sector. It also supports progression into higher-level study or employment in green technologies and sustainable energy solutions.

7.2 Qualification Level

In the context of the OCN NI Level 3 Award in Photovoltaic it is essential to understand the significance of qualification levels, as they play a pivotal role in assessing the depth and complexity of knowledge and skills required for successful attainment. This qualification aligns with Level 3 which signifies a higher level of difficulty and intricacy. It's important to note that qualification levels in the educational framework range from Level 1 to Level 8, complemented by three 'entry' levels, namely Entry 1 to Entry 3.

7.3 Qualification Size

Total Qualification Time (TQT)

This represents the total amount of time a learner is expected to spend to complete the qualification successfully. It includes both guided learning hours (GLH) and independent study or additional learning time.

Guided Learning Hours (GLH)

These are the hours of guided instruction and teaching provided to learners. This may include classroom instruction, tutorials, or other forms of structured learning.

OCN NI Level 3 Award in Photovoltaic	
Total Qualification Time (TQT):	40 hours
Total Credits Required:	4 credits
Guided Learning Hours (GLH):	28 hours

7.4 How to Achieve the Qualification

To achieve the **OCN NI Level 3 Award in Photovoltaic** learners must complete the one unit for 4 credits.

8. Assessment Structure

These qualifications are assessed through internal assessment and each unit is accompanied by specific assessment criteria that define the requirements for achievement.

8.1 Assessment Guidance: Portfolio

The portfolio for these qualifications is designed to provide a comprehensive view of a learner's skills and knowledge. It is a holistic collection of evidence that may include a single piece of evidence that satisfies multiple assessment criteria. There is no requirement for learners to maintain separate evidence for each assessment criterion.

When learners are creating their portfolio, they should refer to the assessment criteria to understand the evidence required. Explanations of command words/verbs used in the assessment criteria can be found in Appendix 1 of this document.

It is essential that the evidence in the portfolio reflects the application of skills in real-world situations. Learners should ensure that they provide multiple examples or references whenever the assessment criteria require it.

8.2 Understanding the Units

The units outlined in this specification establish clear assessment expectations. They serve as a valuable guide for conducting assessments and ensuring quality assurance efficiently. Each unit within this specification follows a consistent structure. This section explains the operational framework of these units. It is imperative that all educators, assessors, IQAs, and other personnel overseeing the qualification review and familiarise themselves with this section to ensure a comprehensive understanding of how these units function.

- **Title:** The title will reflect the content of the unit and should be clear and concise.
- **Level:** A unit can have one of six RQF levels: Entry, One, Two, Three, Four or Five. All units within this qualification are Level 3.
- **Credit Value:** This describes the number of credits ascribed to a unit. It identifies the number of credits a learner is awarded upon successful achievement of the unit. One credit is awarded for the learning outcomes which a learner, on average, might reasonably be expected to achieve in a notional 10 hours of learning.
- **Learning Outcome:** A coherent set of measurable achievements.
- **Assessment Criteria:** These enable a judgement to be made about whether or not, and how well, the students have achieved the learning outcomes.
- **Assessment Guidance and Methods:** These detail the different assessment methods within the unit that may be used.
- **Possible Content:** This provides indicative content to assist in teaching and learning.
- **Scope:** This provides possible teaching content.

9. Qualification Summary by Unit

OCN NI Level 3 Award in Photovoltaic

Total Qualification Time (TQT) for this qualification: 40 hours
Guided Learning Hours (GLH) for this qualification: 28 hours

In order to achieve this qualification, the learner must successfully complete the one unit below for 4 credits.

Unit Reference Number	OCN NI Unit Code	Unit Title	Credit Value	GLH	Level
R/651/7079	CBG766	Photovoltaic Systems	4	28	Three

10. Unit Content

Title	Photovoltaic Systems
Level	Three
Credit Value	4
Guided Learning Hours (GLH)	28
OCN NI Unit Code	CBG766
Unit Reference No	R/651/7079
Learn Direct Code	TH4
Unit purpose and aim(s): This unit will enable the learner to evaluate the requirements to install, commission and maintain small scale photovoltaic (PV) systems.	

Learning Outcomes	Assessment Criteria
1. Understand photovoltaic energy generation and the current challenges faced by utility providers.	1.1. Explain photovoltaic energy generation. 1.2. Evaluate the strengths and weaknesses of photovoltaic energy generation as a green technology, in relation to the current UK energy legislation and strategy. 1.3. Analyse the challenges faced by utility providers regarding the continual adaptation and extension of the current electrical grid and network in relation to: a) infrastructure and age b) energy produced from alternative power generation 1.4. Calculate the energy requirements of a given domestic dwelling within the UK and the energy offset due to the installation of a photovoltaic system.
2. Be able to carry out a risk assessment prior to installing solar photovoltaic systems.	2.1. Complete a risk assessment prior to installing solar photovoltaic systems taking account of: a) relevant health and safety issues b) impact on stakeholders c) environment
3. Be able to design modular photovoltaic systems.	3.1. Explain the design principles used to determine solar photovoltaic system module array size and position requirements. 3.2. Design a modular PV system to reduce the electrical consumption of a standard UK semi-detached dwelling by 25%.
4. Understand solar photovoltaic system protection techniques and components.	4.1. Explain solar photovoltaic system protection techniques and components including: a) anti-islanding protection b) purpose of the inverter
5. Understand the installation, commissioning, and operation of a small-scale photovoltaic system.	5.1. Describe the process of installation, commissioning, and operation of the small-scale system including: a) system schematics b) component identification c) testing the energy performance parameters
6. Be able to design a maintenance programme for a photovoltaic system and diagnose core component faults.	6.1. Design a photovoltaic maintenance regime to ensure optimal system performance of both the solar arrays and electrical components.

	6.2. Carry out using appropriate equipment, the testing of electrical breaker switches for Alternating Current (AC) and Direct Current (DC) electrics. 6.3. Explain how to identify the correct operation of the inverter within the photovoltaic system. 6.4. Diagnose faults with an inverter in relation to: a) battery performance and operation b) electrical polarity c) electrical short circuits

Assessment Guidance
NOS:
BSEECD01 Implement safe site working practices when working in dwellings
BSEECD02 Design and determine the positioning, fitting and fixing of electrical wiring systems, wiring, enclosures, accessories and equipment in dwellings
INSEA5 Promote low and zero carbon energy technologies
BSESPV02 Install and connect Solar PV and EESS systems
BSESPV01 Install assemblies and enclosures for Solar PV and EESS systems
BSESPV06 Maintain Solar PV and EESS systems
BSESPV05 Identify and rectify faults in Solar PV and EESS systems
BSESPV04 Commission Solar PV and EESS systems
BSESPV03 Inspect and test Solar PV and EESS Systems

The following assessment method/s may be used to ensure all learning outcomes and assessment criteria are fully covered.

Assessment Method	Definition	Possible Content
Portfolio of evidence	A collection of documents containing work undertaken to be assessed as evidence to meet required skills outcomes OR A collection of documents containing work that shows the learner's progression through the course	Learner notes/written work Learner log/diary Peer notes Record of observation Record of discussion
Practical demonstration/assignment	A practical demonstration of a skill/situation selected by the tutor or by learners, to enable learners to practice and apply skills and knowledge	Record of observation Learner notes/written work Learner log
Coursework	Research or projects that count towards a learner's final outcome and demonstrate the skills and/or knowledge gained throughout the course	Record of observation Learner notes/written work Tutor notes/record Learner log/diary
E-assessment	The use of information technology to assess learners' work	Electronic portfolio Indicative content will include: • Learner notes/written work • Learner log /diary • Peer notes • Record of observation • Record of discussion • Photographs • Video Evidence • Audio recordings

Learning Outcome	Unit title: Photovoltaic Systems

1. Understand photovoltaic energy generation and the current challenges faced by utility providers.	**Scope**
	Teaching will cover:
	• The need for decarbonizing
	• The use of alternative energy generation systems and techniques, across the following areas:
	  ○ when, why and where solar PV is most effective
	  ○ understanding the UK energy grid and the effects that alternative energy production could have on it
	  ○ know how to calculate, size and understand the energy that solar PV can deliver for the consumer

2. Be able to carry out a risk assessment prior to installing solar photovoltaic systems.	**Scope** **Teaching will cover:** • the process involved in the pre-installation checks for the solar PV system • risk identification and mitigation of 'Retro Fitting' into an existing occupied dwelling construction site. • risk identification and mitigation of 'New-Build' construction sites. • develop a risk assessment to be implemented for the installation of a solar PV system
3. Be able to design modular photovoltaic systems.	**Scope** **Teaching will cover:** • the different recognised types of solar PV systems • how an installer would design, size and specify the different systems

4. Understand solar photovoltaic system protection techniques and components.	**Scope**
	Teaching will cover:
	• electrical safety of:
	  ○ the electrical engineer
	  ○ any other operatives involved in the works
	  ○ the solar PV system
	  ○ the component parts that make up the system protection
	• Electricity at Work Act
	• British Standard 7671
	• Health and Safety at Work Act 1974
	• Building Regulations associated with solar PV works (A-M +P)
	• a focus on anti-islanding protection
	• understanding invertors

5. Understand the installation, commissioning, and operation of a small-scale photovoltaic system.	**Scope** **Teaching will cover:** • the installation and commissioning process for solar PV systems. • system schematics • installation of a solar PV panel in realistic environment • installation of the solar PV electrical cabling and components • solar PV system testing • completion of appropriate test paperwork/certificates of electrical installation
6. Be able to design a maintenance programme for a photovoltaic system and diagnose core component faults.	**Scope** **Teaching will cover:** • maintenance checks and testing regimes applicable to a solar PV annual maintenance schedule • how to complete all electrical safety and performance checks on solar PV systems • Identify potential faults

11. Quality Assurance of Centre Performance

11.1 Internal Assessment

When delivering and assessing qualifications, Centres must align with stakeholders' expectations and address learners' needs by implementing a practical and applied programme. Centres have the flexibility to customise programmes to meet local requirements and establish connections with local employers and the broader vocational sector.

The Assessor should work with the IQA to ensure that the assessment is planned in line with OCN NI requirements. Assessment Plans must be developed and approved by the IQA prior to the delivery of the qualification.

All units within qualifications must undergo internal assessment. Learners must provide evidence that they have appropriately met all assessment criteria required for that grade.

The assessment format for all units involves a task conducted after the delivery of the unit's content, or part of it, if multiple tasks are used. Tasks may exhibit in various forms, encompassing practical and written types. Please refer to 'OCN NI's Assessment Definitions Guide' for additional details.

A task constitutes a distinct activity completed independently by learners, separated from teaching, practice, exploration, and other activities guided by tutors. Tasks are assigned to learners with a specified start date, completion date, and explicit requirements for the evidence to be produced. Some tasks may include observed practical components and require diverse forms of evidence.

A valid assignment will enable a clear and formal assessment outcome, which meets the requirements of the assessment criteria. Assessment decisions are based on the specific assessment criteria given in each unit and set at each grade level. The way in which individual units are written provides a balance of assessment of understanding, practical skills and vocational attributes appropriate to the purpose of qualifications.

It is the Assessor's role to ensure that learners are appropriately prepared for assessment, this begins from induction onwards. Assessors should ensure that learners understand how assessment tasks are used to determine the award of credit, the importance of meeting assessment timelines, and that all learners work must be independently created, where source documents are used this should be appropriately referenced, learners should be aware of what would constitute plagiarism and the possible consequences.

When conducting the assessment, Assessors must ensure they do not provide direct input, instructions or specific feedback which may compromise the authenticity of the work submitted.

Once the Assessor has authenticated the learner's work, they must transparently demonstrate the rationale behind their assessment decisions. Once a learner completes all assigned tasks for a unit, the Assessor will allocate a grade for the unit. Refer to the 'Unit Grading Matrix' for additional information on the grading process.

Once the Assessor has completed the assessment process for the task, the assessment decision is recorded formally, and feedback is provided to the learner. The feedback should show the learner the outcome of the assessment decision, how it was determined or where the criteria has been met, it may indicate to the learner why achievement of the assessment criteria has not been met. It must be clear to the learner that this Assessment outcome is subject to verification.

For further information on assessment practice, please see the 'OCN NI Centre Handbook' in the centre login area of the OCN NI website. Assessment Training is also available and can be booked through the OCN NI Website.

11.2 Internal Quality Assurance

The role of the IQA is to ensure appropriate internal quality assurance processes are carried out. The IQA must oversee that assessments are conducted in accordance with relevant OCN NI policies, regulations, and this specification.

The IQA must ensure assessments are fair, reliable, and uniform, thereby providing a consistent standard for all learners.

IQAs are required to provide constructive feedback to Assessors, identifying areas of strength and those that may require improvement. This feedback contributes to the ongoing professional development of Assessors.

Contributing to the standardisation of assessment practices within the Centre is an important function of this role. This entails aligning assessment methods, grading criteria, and decision-making processes to maintain fairness and equity.

IQAs will actively engage in the sampling and monitoring of assessments to ensure the consistency and accuracy of assessment decisions. This process helps identify trends, areas for improvement, and ensures the robustness of the overall assessment system.

For further information on Internal Quality Assurance practice, please see the 'OCN NI Centre Handbook'. IQA Training is also available and can be booked through the OCN NI Website.

11.3 Documentation

For internal quality assurance processes to be effective, the internal assessment and IQA team needs to keep effective records.

- The programme must have an assessment and internal Quality Assurance plan. When producing a plan, they should consider:
    - the time required for training and standardisation activities
    - the time available to undertake teaching and carry out assessment
    - consider when learners may complete assessments and when quality assurance will take place
    - the completion dates for different assessment tasks
    - the date by which the assignment needs to be internally quality assured
    - sampling strategies
    - how to manage the assessment and verification of learners' work so that they can be given formal decisions promptly
    - how resubmission opportunities can be scheduled

The following documents are available from OCN NI and document templates can be found in the Centre Login section of the OCN NI website www.ocnni.org.uk:

- A1 – Learner Assessment Record per Learner
- Learner Authentication Declarations
- Records of any reasonable adjustments applied for and the outcome – please see 'OCN NI's Reasonable Adjustments and Special Consideration Policy' for further information
- M1 IQA Sample Record
- M2 Feedback to Assessor
- Records of any complaints or appeals

11.4 External Quality Assurance

All OCN NI recognised centres are subject to External Quality Assurance. External quality assurance activities will be conducted to confirm continued compliance with the CCEA Regulation General Conditions of Recognition, OCN NI terms and conditions and the requirements outlined within this qualification specification.

The External Quality Assurance is assigned by OCN NI. The External Quality Assurer will review the delivery and assessment of these qualifications. This will include, but is not limited to, the review of a sample of assessment evidence and evidence of the internal verification of assessment and assessment decisions. This will form the basis of the External Quality Assurance report and will help OCN NI determine the Centre's risk.

The role of the External Quality Assurer serves as an external overseer of assessment quality, working to uphold consistency, compliance, and continuous improvement within the assessment process. Their role is crucial in ensuring that assessments are valid, reliable, fair, and aligned with the required standards and regulations.

For further information on OCN NI Centre Assessments Standards Scrutiny (CASS) Strategy, please see the OCN NI Centre Handbook.

11.5 Standardisation

As a process, standardisation is designed to ensure consistency and promote good practice in understanding and the application of standards. Standardisation events:

- make qualified statements about the level of consistency in assessment across centres delivering a qualification
- make statements on the standard of evidence that is required to meet the assessment criteria for units in a qualification
- make recommendations on assessment practice
- produce advice and guidance for the assessment of units
- identify good practice in assessment and internal quality assurance

Centres offering OCN NI qualifications must carry out internal standardisation activities prior to the claim for certification.

Centres offering units of an OCN NI qualification must attend and contribute assessment materials and learner evidence for standardisation events if requested.

OCN NI will notify centres of the nature of sample evidence required for standardisation events (this will include assessment materials, learner evidence and relevant Assessor and IQA documentation). OCN NI will make standardisation summary reports available and correspond directly with centres regarding event outcomes.

12. Administration

12.1 Registration

A centre must register learners for this qualification within 20 days of commencement of the delivery of the programme.

For further information on learner registration please see the OCN NI Centre Handbook and the QuartzWeb Manual, available through the Centre Login section of the OCN NI website. Administration training is also available and can be booked through http://www.ocnni.org.uk.

12.2 Certification

Once all internal quality assurance activities have been successfully completed the Centre can claim certification for the learner(s).

Certificates will be issued to centres within 20 working days from completion of a satisfactory external quality assurance activity, if appropriate, alternatively from the submission of an accurate and complete marksheet.

It is the responsibility of the centre to ensure that certificates received from OCN NI are held securely and distributed to learners promptly and securely.

For further information on the uploading of results please see the QuartzWeb Manual for guidance, administration training is also available and can be booked through OCN NI.

12.3 Charges

OCN NI publishes all up-to-date qualification fees in its Fees and Invoicing Policy document. Further information can be found on the centre login area of the OCN NI website.

12.4 Equality, Fairness and Inclusion

OCN NI is committed to ensuring all learners have an equal opportunity to access our qualifications and assessment, and that our qualifications are awarded in a way that is fair to every learner.

OCN NI is committed to making sure that:

- learners with a protected characteristic are not, when they are undertaking one of our qualifications, disadvantaged in comparison to learners who do not share that characteristic

- all learners achieve the recognition they deserve for undertaking a qualification and that this achievement can be compared fairly to the achievement of their peers

For information on reasonable adjustments and special considerations please see the OCN NI Centre Handbook and Reasonable Adjustments and Special Considerations Policy held in the back office of the OCN NI website.

12.5 Retention of Evidence

OCN NI has published guidance for centres on the retention of evidence. Details are provided in the OCN NI Centre Handbook and can be accessed via the OCN NI website.

OCN NI Level 3 Award in Photovoltaic
Qualification number: 610/6164/5

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12.6 Appendix 1 - Definition of OCN NI's Assessment Verbs

The following verbs are working definitions of those used in OCN NI assessments with examples of how they can be applied and used in different but equally valid contexts.

Verb	Definition	Example
Analyse	To examine closely and break into components to enable results to be interpreted and findings presented.	The learner will be expected to perform a critical process which will involve closely examining data, breaking it into meaningful components, interpreting the results, and presenting clear findings to inform future decisions and / or draw meaningful conclusions.
Calculate	To determine something using a mathematical method to find an answer or result.	The learner will be expected to have the knowledge and understanding to select the correct mathematical formula they should use to work out the answer needed for a specific task. Learners will need to use appropriate formulas and perform accurate computations to successfully meet the criteria asked of them.
Carry Out	To effectively utilise information, items, or equipment to achieve specific objectives, produce tangible outcomes, or enhance understanding.	The learner will be expected to comprehend the information, items, or equipment they are required to use. This involves understanding the purpose, function, and relevance of the resources. The learner must carry out tasks using the information, items, or equipment to produce specific results. This involves following procedures accurately and demonstrating the ability to use resources effectively. The learner uses the resources to address challenges and find solutions. This involves planning, organising, and executing tasks in a streamlined manner.
Complete	To finish a task fully and accurately, producing items or achieving understanding as required by the task objectives.	The learner will be expected to comprehend the task's objectives and what is required to achieve them. This involves following steps accurately, managing time well, and ensuring the final product meets high standards and is completed on time. The learner pays close attention to details throughout the task. This involves being meticulous in performing each part of the task to ensure nothing is overlooked or done incorrectly. The learner produces high-quality items or achieves a thorough understanding as a result of completing the task. The learner reviews the completed task to ensure all objectives are met. This involves evaluating the output for accuracy, completeness, and quality, and making any necessary adjustments or corrections.

Describe	To give a detailed account in words of a concept, process or thing in words.	The learner will be expected to demonstrate their understanding of a concept, process, or thing in words, providing clear and comprehensive detail. This involves painting a vivid picture with words so that the listener or reader can fully grasp the subject being discussed.
Design	To create a detailed plan or blueprint for an item or process, incorporating functional, aesthetic, and practical considerations to meet specific objectives.	The learner will be expected to conduct thorough research and analysis to understand the requirements, constraints, and objectives of the design. This involves gathering relevant information, identifying needs, and defining the problem to be solved. The learner generates ideas and concepts for the design. This involves brainstorming, sketching, and exploring various approaches to meet the design objectives. The learner creates a detailed plan and specifications for the design. The learner develops prototypes or models to test and refine the design. This involves creating preliminary versions of the item or process to evaluate its functionality, feasibility, and aesthetics. The learner finalizes the design, ensuring that it meets all requirements and objectives.
Diagnose	To identify the nature or cause of a problem, usually through examination, analysis, and evaluation of evidence or symptoms.	The learner would be expected to diagnose faults or issues within a system or process, through a process of elimination through observations, checks, testing, visible signs and symptoms that could provide insights into the underlying problem. The learner can then formulate a diagnosis based on the analysis undertaken using clear and logical reasoning and evidence of this conclusion. Diagnosis can lead to proposed solutions.
Evaluate	An evaluation is normally detailed and provides a solution or conclusion and/or recommendation (perhaps for further exploration). An evaluation could include a comparative element and will ascertain the usefulness or contribution of each part to the whole.	The learner will be expected to assess, analyse, and form judgments about a subject, considering its merits, shortcomings, and potential improvements based on evidence and reasoning.
Explain	Make clear a given subject matter and / or give reasons for and/or the procedure in a given situation or regarding a given subject matter / Setting out purposes or reasons.	The learner will be expected to provide clarity on the subject, outlining the procedure or procedures associated with it, and set out reasons for its importance and / or significance. The learner will be expected to demonstrate a detailed comprehension of the subject matter.
Justify	To provide a valid reason or explanation for something. To defend actions, decisions, or beliefs by offering logical or rational reasons.	It is expected that a learner would provide reasoning or evidence to support and justify their answer. Similarly, a learner may need to explain why they took certain actions and provide valid reasons for them to justify those actions.

Perform	To execute and carry out a specific activity or process effectively and efficiently to achieve a desired outcome.	The learner will be expected to comprehend the instructions or guidelines related to the activity or process. This involves understanding the steps, objectives, and expected outcomes. The learner prepares for the activity or process by organising necessary resources, materials, and tools. The learner carries out the activity or process according to the instructions or plan. The learner applies relevant skills and knowledge during the performance of the activity or process. This involves using techniques and methods appropriate to the task. The learner manages their time effectively to complete the activity or process within the given timeframe. The learner evaluates the results of the activity or process to ensure that the objectives are met. This involves assessing the quality of the produced items or the accuracy of the understanding gained.