

# City & Guilds NPTC Level 2 Principles of Safe Handling and Application of Pesticides (PA1) (0216-49)

Version 1.3 (February 2025)

**Qualification Handbook** 

# Qualification at a glance

| Subject area                   | Pesticides and Pest Control   |  |
|--------------------------------|---|--|
| City & Guilds number           | 0216-49   |  |
| Age group approved             | 16+   |  |
| Entry requirements             | Candidates must meet minimum age requirements. By law everyone who uses pesticides professionally must have received adequate training in using pesticides safely. Candidates are strongly advised to ensure that they will be able to meet the standards required in the assessment. |  |
| Assessment                     | To gain this qualification, candidates must successfully achieve the following assessments:  • E-volve based multiple choice examination to be conducted in a suitably controlled and invigilated environment.  |  |
| Grading                        | Pass only   |  |
| Approvals                      | Full centre approval Qualification approval   |  |
| Support materials              | Qualification Handbook  |  |
| Registration and certification | Consult the Walled Garden/Online Catalogue for last Registration and Certification dates.   |  |

| Title and level  | City &<br>Guilds<br>qualification<br>number | Regulatory<br>reference<br>number | GLH | TQT |
|--|---|-----------------------------------|-----|-----|
| City & Guilds NPTC Level 2 Principles of Safe Handling and Application of Pesticides (PA1) | 0216-49                                     | A/506/8297                        | 26  | 30  |

| Version and date  | Change detail   | Section                      |
|-------------------|---|------------------------------|
| 1.0 February 2024 | Initial version   | All                          |
| 1.1 June 2024     | Removal of Test Specification                             | Page 22-23                   |
| 1.2 August 2024   | Update of Quality Assurance Statement Formatting          | Centre Requirements<br>All   |
| 1.3 February 2025 | Inclusion and diversity and Sustainability sections added | Delivering the qualification |

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# 1 Introduction

This document tells you what you need to do to deliver the City & Guilds NPTC Level 2 Principles of Safe Handling and Application of Pesticides (PA1) (0216-49)

| Area  | Description  |
|---|--|
| Who is the qualification for?                 | This is an Independently Assessed qualification (PA1)  |
|   | Type of Learner: If your job involves applying pesticides in a commercial role then you are legally required by the Plant Protection Products (Sustainable Use) Regulations (2012) to take this qualification.               |
|   | Qualification Overview: The candidate to successfully complete and pass the online e-volve test before they can register for any of the further pesticide qualifications within the new pesticide suite (0216-50 to 0216-63) |
|   | What you need to do: Candidates to undertake a theory exam via E-Volve   |
| What does the qualification cover?            | This qualification covers the requirements for the safe handling and application of pesticides.  |
|   | Please refer to the Qualification Handbook for more detail.  |
| What opportunities for progression are there? | Once a candidate has successfully completed this qualification they must progress to one of the City & Guilds Level 2 Application of Pesticide Qualification(s) 0216-25 to 0216-62   |
|   | Once a candidate has successfully completed this qualification, they are <b>not</b> legally able to apply pesticides until the completion of the City & Guilds Level 2 Application of Pesticide Qualification                |
|   | Recommended progression onto 0216-63 – City & Guilds Level 3 Award in Responsible Pesticide Management.  |

| Area   | Description  |
|--|--|
| Who did we develop the qualification with?               | Developed with the Health and Safety Executive,<br>Chemical Regulation Division, Voluntary Initiative and<br>practicing industry stakeholders, DEFRA, Environment<br>Agency. |
| Is it part of an apprenticeship framework or initiative? | No   |

#### **Assessment Guidance for the Candidate**

A list of registered Assessment Centres is available from City & Guilds NPTC. (www.nptc.org.uk)

Assessment is a process by which it is confirmed that the candidate is competent in the unit(s) within the award to which the assessment relates. It is the process of collecting evidence about the candidate's capabilities and judging whether that evidence is sufficient to attribute competence.

The Candidate must be registered through the City & Guilds approved Assessment Centre for this qualification prior to the assessment.

#### 2 Qualification structure

To achieve the City & Guilds NPTC Level 2 Principles of Safe Handling and Application of Pesticides (PA1) (0216-49) learners must achieve:

| City & Guilds unit number | Unit title  | GLH |
|---------------------------|---|-----|
| Mandatory unit            | s:  |     |
| 101                       | Principles of safe handling and application of pesticides (PA1) | 26  |

#### **Total Qualification Time (TQT)**

Total Qualification Time (TQT) is the number of notional hours which represents an estimate of the total amount of time that could reasonably be expected for a learner to demonstrate the achievement of the level of attainment necessary for the award of a qualification.

TQT consists of the following two elements:

- 1) the number of hours that an awarding organisation has assigned to a qualification for guided learning
- 2) an estimate of the number of hours a learner will reasonably be likely to spend in preparation, study or any other form of participation in education or training, including assessment, which takes place as directed by but, unlike guided learning, not under the immediate guidance or supervision of a lecturer, supervisor, tutor or other appropriate provider of education or training.

| Title and level   | GLH | TQT |
|---|-----|-----|
| City & Guilds NPTC Level 2 Principles of Safe<br>Handling and Application of Pesticides (PA1) (0216-<br>49) | 26  | 30  |

# 3 Centre requirements

#### **Approval**

#### Full approval

To offer this qualification, new centres will need to gain both centre and qualification approval. Please refer to the document **Centre Approval process: Quality Standards** for further information. Please email **qasupport@cityandguilds.com** for further information on the approval process.

#### Centre staffing

Staff overseeing this qualification must be able to demonstrate that they meet the following requirements:

- be technically competent in the areas in which they are overseeing
- be able to register candidates, arrange assessors and process results
- have recent relevant teaching and assessment experience in the specific area they will be overseeing, or be working towards this
- · demonstrate continuing CPD.

Centre staff should familiarise themselves with the structure, content and assessment requirements of the qualification before delivering a course programme.

#### Physical resources

Centres must be able to demonstrate that they have access to the equipment and E-volve workstation required to deliver this qualification and its assessments.

#### **Guidance for the Invigilator**

The Invigilator for this qualifications E-volve examination work on behalf of the registered centre. Therefore, the relevant JCQ guidelines must be adhered to.

#### Safe Practice

Candidate, Assessor, and any other persons to follow safety practices of the centre

#### Validation of Equipment

Any item(s) equipment used for the assessment must comply with current legal requirements.

Additional information may be sought from the relevant manufacturer's instruction book, operators' manual, product label/database or any other Government/Government Agency publication.

#### **Appeals and Equal opportunities**

Centres must have their own auditable, appeals procedures. If a Candidate is not satisfied with the examination conditions or a Candidate feels the opportunity for examination is being denied, the Centre Manager should, in the first instance, address the problem. If, however the problem cannot be resolved, City & Guilds will arbitrate and a Principal Verifier may be approached to offer independent advice.

All appeals must be clearly documented by the Centre Manager and made available to the Principal Verifier or City & Guilds if advice is required.

Should occasions arise when Centres are not satisfied with any aspect of the verification process, they should contact the Quality Assurance Manager at City & Guilds NPTC, 5-6 Giltspur Street, London, EC1A 9DE, UK.

Access to the qualification is open to all, irrespective of gender, race, creed or special needs. Subject to H&S restrictions the Centre Manager should ensure that no learner is subjected to unfair discrimination on any grounds in relation to access to assessment and to the fairness of the assessment. QCA requires City & Guilds to monitor centres to check whether equal opportunities policies are being adhered to.

#### **Quality assurance**

Approved centres must have effective quality assurance systems to ensure optimum delivery and assessment of qualifications. Quality assurance includes initial centre approval, qualification approval and the centre's own internal procedures for monitoring quality. Centres are responsible for internal quality assurance and City & Guilds is responsible for external quality assurance. All external quality assurance processes reflect the minimum requirements for verified and moderated assessments, as detailed in the Centre Assessment Standards Scrutiny (CASS), section H2 of Ofqual's General Conditions. For more information on both CASS and City & Guilds Quality Assurance processes visit: the What is CASS? and Quality Assurance Standards documents on the City & Guilds website.

Standards and rigorous quality assurance are maintained by the use of:

- Internal quality assurance
- City & Guilds external quality assurance.

In order to carry out the quality assurance role, Internal Quality Assurers must:

- have appropriate teaching and vocational knowledge and expertise
- have experience in quality management/internal quality assurance
- hold or be working towards an appropriate teaching/training/assessing qualification
- be familiar with the occupation and technical content covered within the qualification.

External quality assurance for the qualification will be provided by City & Guilds EQA process. EQAs are appointed by City & Guilds to approve centres, and to monitor the assessment and internal quality assurance carried out by centres. External quality assurance is carried out to ensure that assessment is valid and reliable, and that there is good assessment practice in centres.

The role of the EQA is to:

- provide advice and support to centre staff
- ensure the quality and consistency of assessments and marking/grading within and between centres by the use of systematic sampling
- provide feedback to centres and to City & Guilds.

#### Learner entry requirements

Candidates must meet minimum age requirements.

The Code of Practice for Using Plant Protection Products states "By law everyone who uses pesticides professionally must have received adequate training in using pesticides safely". Candidates are strongly advised to ensure that they will be able to meet the standards required in the assessment.

#### Age restrictions

This qualification is approved for learners aged 16 or above.

#### Access arrangements and reasonable adjustments

Access arrangements are adjustments that allow candidates with disabilities, special educational needs, and temporary injuries to access the assessment and demonstrate their skills and knowledge without changing the demands of the assessment. These arrangements must be made before assessment takes place.

The Equality Act 2010 requires City & Guilds to make reasonable adjustments where a disabled person would be at a substantial disadvantage in undertaking an assessment.

It is the responsibility of the centre to ensure at the start of a programme of learning that candidates will be able to access the requirements of the qualification.

Please refer to the JCQ access arrangements and reasonable adjustments and Access arrangements - when and how applications need to be made to City & Guilds for more information. Both are available on the City & Guilds website:

http://www.cityandguilds.com/delivering-our-qualifications/centre-development/centre-document-library/policies-and-procedures/access-arrangements-reasonable-adjustments

# 4 Delivering the qualification

#### Initial assessment and induction

An initial assessment of each learner should be made before the start of their programme to identify:

- if the learner has any specific training needs
- support and guidance they may need when working towards their qualification.
- any units they have already completed or credit they have accumulated which is relevant to the qualification
- the appropriate type and level of qualification.

We recommend that centres provide an induction programme so the learner fully understands the requirements of the qualification, their responsibilities as a learner and the responsibilities of the centre. This information can be recorded on a learning contract.

#### **Inclusion and diversity**

City & Guilds is committed to improving inclusion and diversity within the way we work and how we deliver our purpose which is to help people and organisations develop the skills they need for growth.

More information and guidance to support centres in supporting inclusion and diversity through the delivery of City & Guilds qualifications can be found here:

Inclusion and diversity | City & Guilds (cityandguilds.com)

#### Sustainability

City & Guilds are committed to net zero. Our ambition is to reduce our carbon emissions by at least 50% before 2030 and develop environmentally responsible operations to achieve net zero by 2040 or sooner if we can. City & Guilds is committed to supporting qualifications that support our customers to consider sustainability and their environmental footprint.

More information and guidance to support centres in developing sustainable practices through the delivery of City & Guilds qualifications can be found here:

Our Pathway to Net Zero | City & Guilds (cityandguilds.com)

Centres should consider their own carbon footprint when delivering this qualification and consider reasonable and practical ways of delivering this qualification with sustainability in mind. This could include:

- reviewing purchasing and procurement processes (such as buying in bulk to reduce the amount of travel time and energy, considering and investing in the use of components that can be reused, instead of the use of disposable or single use consumables)
- reusing components wherever possible
- waste procedures (ensuring that waste is minimised, recycling of components is in place wherever possible)
- minimising water use and considering options for reuse/salvage as part of plumbing activities wherever possible.

# **Support materials**

The following resources are available for this qualification:

| Description        | How to access   |
|--------------------|-----------------|
| Candidate Handbook | www.nptc.org.uk |

#### 5 Assessment

#### Assessment of the qualification

| Assessment types |   |  |                                      |
|------------------|---|--|--------------------------------------|
| Unit             | Title   | Assessment method                          | Where to obtain assessment materials |
| 101              | Principles of safe handling and application of pesticides (PA1) | E-volve multiple choice based examination. | www.nptc.org.uk                      |

#### **Assessment strategy**

City & Guilds has written the theory test for unit 101 to use with this qualification.

This qualification can only be invigilated by an Invigilator who is suitably qualified and meets the requirements of the awarding body. The invigilator must be independent and cannot have been involved with the training of the Candidate. Please see City & Guilds Centre Manual for guidance.

The Candidate is to be notified of the place and time of assessment.

#### **Time constraints**

The following must be applied to the assessment of this qualification:

- Candidates must finish their assessment within 24 months of date of initial registration.
- Qualification registration is valid for 2 years.

#### 6 Units

#### Structure of the units

These units each have the following:

- City & Guilds reference number
- title
- level
- Guided Learning Hours (GLH)
- unit aim
- assessment type
- learning outcomes, which are comprised of a number of assessment criteria.

#### Guidance for delivery of the units

This qualification comprises of **one** unit. A unit describes what is expected of a competent person in particular aspects of their job.

Each **unit** is divided into learning outcomes which describe in further detail the skills and knowledge that a candidate should possess.

Each **learning outcome** has a set of **assessment criteria** (performance and knowledge and understanding) which specify the desired criteria that must be satisfied before an individual can be said to have performed to the agreed standard.

# Unit 101 Principles of safe handling and application of pesticides (PA1)

| Level:           | 2  |
|------------------|--|
| GLH:             | 26   |
| Assessment type: | Theory Test  |
| Aim:             | The aim of this unit is for the candidate to understand the principles of safe handling and application of pesticides. |

#### Learning outcome

The learner will:

- LO1 Know the legislative requirements and codes of practice relating to the use of pesticides (Criteria 1.1 1.2)
- LO2 Understand the relevance of product information (**Criteria 2.1**)
- LO3 Know how to minimise the risk of human contamination and implement emergency procedures (**Criteria 3.1 3.4**)
- LO4 Know how to store and transport pesticides safely (**Criteria 4.1 4.2**)
- LO5 Know how to manage and dispose of surplus pesticide and waste materials (**Criteria** 5.3 5.3)
- LO6 Know the record keeping requirements (**Criteria 6.1**)
- LO7 Know how to minimise the risk of environmental contamination and implement emergency procedures (**Criteria 7.1 7.3**)

#### Assessment criteria

The learner can:

AC1.1 Identify an operator's responsibilities under current legislation

AC1.2 Identify an operator's responsibilities under current codes of practice

#### Topic 1.1

Operator's responsibilities under current legislation:

- comply with a Control of Substances Hazardous to Health (COSHH) assessment that has been carried out
- keep up to date with pesticide related legislation
- receive adequate training for the task
- follow the Pesticide Code of Practice for using Plant Protection Products
- Certificate of Competence is required for anyone who is going to apply professional products unless under direct supervision from a certificate holder
- reasonable precautions must be taken to protect human health and that of the environment
- application must be confined to the intended target
- preference should be given to products not classified to be harmful to the environment
- the amount of pesticide used, and frequency of use is as low as reasonably practicable on: roads, railways, very permeable surfaces and sealed surfaces where there is a greater risk of run off or contamination of surface and groundwater
- equipment must be inspected/tested in line with current legislative requirements.

#### Topic 1.2

Operator's responsibilities under current codes of practice:

- use pesticides in a safe manner following product information
- carry out and comply with an Environmental Assessment on the application site
- ensure that equipment is in good condition and correctly calibrated.

#### Assessment criteria

The learner can:

AC2.1 Explain the relevance of product information

#### Topic 2.1

Relevance of product information:

- current approval number evidence of approval
- product group symbol ie H, I, F, P
- important information must be strictly complied with
- active substance(s) (ingredient(s)) relevant to the operator in the event of an emergency
- approved field of use the industry sector for which the product is approved

- maximum dose rate must not be exceeded
- timing of application(s) manufacturer's recommendations must be followed
- approved adjuvants only approved adjuvants can be used as recommended
- Extension of Authorisation for Minor Use (EAMU) use additional to label approvals.

#### Assessment criteria

The learner can:

- AC3.1 Identify possible routes of contamination
- AC3.2 Identify appropriate Personal Protective Equipment (PPE)
- AC3.3 Identify the symptoms of contamination
- AC3.4 Explain appropriate procedures for dealing with contamination

#### Topic 3.1

Possible routes of contamination:

- absorption
- inhalation
- ingestion
- injection.

#### Topic 3.2

Quality standard marks of Personal Protective Equipment (PPE) eg CE Mark. Type, condition and features of:

- gloves
- coverall
- face shield
- footwear
- respirator.

#### Topic 3.3

Symptoms of contamination:

- headache
- nausea
- stomach pains
- · rashes/blistering of skin.

#### Topic 3.4

Appropriate procedures for dealing with pesticide contamination:

• self – identify contamination, decontaminate, remove contaminated PPE and clothing, seek medical advice if needed

- third parties protect yourself, relocate to safe area, decontaminate, if possible, remove contaminated PPE and clothing, contact Emergency Services
- third party information access product information and the Material Safety Data Sheet (MSDS) made available.

#### Assessment criteria

The learner can:

AC4.1 State how pesticides should be stored

AC4.2 State how pesticides should be transported

#### Topic 4.1

Storage of pesticides:

- · maintain stock security to avoid theft and misuse
- adequate containment facilities
- · careful handling to reduce risk of spillage
- product segregation to avoid dangerous occurrences.

#### Topic 4.2

Transportation of pesticides:

- maintain stock security to avoid theft and misuse
- · careful handling to reduce risk of spillage
- adequate containment facilities
- return unused concentrated pesticide to the store
- mobile storage is secure and meets current Codes of Practice.

#### Assessment criteria

The learner can:

AC5.1 Identify appropriate methods of reducing waste

AC5.2 State how to manage and dispose of surplus pesticides

AC5.3 State how to manage and dispose of waste materials

#### Topic 5.1

Methods of reducing waste:

- · accuracy of all calculations
- correct calibration of sprayer/applicator
- · correct measuring and mixing of pesticides
- accurate application.

#### Topic 5.2

Managing and disposing of surplus pesticides:

- back on to the site/target as long as it is below the maximum dose rate
- treated by a specialist treatment facility on site (eg a lined biobed)
- collected by a licensed waste disposal contractor
- returned to supplier if currently approved.

#### Topic 5.3

Managing and disposing of waste materials:

- dealing appropriately with empty packaging and containers
- packaging licensed waste disposal contractor
- triple rinse containers
- secure storage until disposal
- container disposal licensed waste disposal contractor
- return to the supplier
- collected by a licensed waste disposal contractor for disposal if out of approval or suspect in any other way eg counterfeit.

#### Assessment criteria

The learner can:

AC6.1 Identify the records required to comply with legislation and best practice

#### Topic 6.1

Records required to comply with legislation and best practice:

- training records
- environmental assessment records
- COSHH assessment records
- control measure records Respiratory Protective Equipment (RPE)
- stock records
- pesticide treatment records
- waste transfer note.

#### **Assessment criteria**

The learner can:

AC7.1 Identify the risks to the environment from pesticides

AC7.2 Describe how to carry out pesticide application to minimise the risk to the environment

AC7.3 Explain appropriate procedures for dealing with environmental contamination

#### Topic 7.1

Risks to the environment from pesticides:

- pollution of water and the aquatic environment
- pollution of specially designated areas
- pollution and destruction of wildlife habitats
- effect on wildlife
- from off target application/contamination.

#### Topic 7.2

Carrying out pesticide application to minimise the risk to the environment:

- reasonable precautions must be taken to protect the environment
- application must be confined to the intended target
- preferred time of day
- protection of human health and the environment
- apply only in suitable weather conditions
- informing neighbours/other interested parties.

#### Topic 7.3

Appropriate procedures for dealing with environmental contamination:

- dealing with minor spillages containment, collection and disposal
- dealing with major spillages contain, if possible, inform appropriate environmental agency and the emergency services
- dealing with suspected animal/fish poisoning phone wildlife Incident Investigation scheme/appropriate environment agency

# **Supporting Information**

#### **Evidence requirements**

E-volve based multiple choice examination by an NPTC City & Guilds approved assessor to be conducted in a suitably controlled and invigilated environment

#### **Unit guidance**

Candidates must successfully achieve all assessment activities in their chosen unit(s).

#### Safe Practice

The assessor and candidate must wear Personal Protective Equipment (PPE) when appropriate.

The assessor must ensure that a site-specific risk assessment is carried out.

All equipment must be operated in such a way that the candidate, assessor, other persons and the environment are not endangered. Failure to operate safely and comply with these requirements will result in the candidate not meeting the required standard.

A breach of Health and Safety that puts any person at risk during the assessment process will result in the assessment being terminated and the candidate not meeting the required standard. The assessor may stop the assessment on the grounds of safety at any time at their discretion.

Candidates who undertake this assessment and have met the requirements are reminded of their legal obligation to receive/undertake appropriate additional training in the use of any equipment that differs from that used during the assessment, but which they are nevertheless qualified to use.

#### Suggested learning resources:

Code of Practice for Using Plant Protection Products.

This is available from https://www.hse.gov.uk/

# **Appendix 1** Sources of general information

The following documents contain essential information for centres delivering City & Guilds qualifications. They should be referred to in conjunction with this handbook. To download the documents and to find other useful documents, go to **www.cityandguilds.com** or click on the links below:

#### Centre handbook: quality assurance standards

This document is for all approved centres and provides guidance to support their delivery of our qualifications. It includes information on:

- centre quality assurance criteria and monitoring activities
- administration and assessment systems
- centre-facing support teams at City & Guilds/ILM
- centre quality assurance roles and responsibilities.

The Centre Handbook should be used to ensure compliance with the terms and conditions of the centre contract.

#### Centre assessment: quality assurance standards

This document sets out the minimum common quality assurance requirements for our regulated and non-regulated qualifications that feature centre-assessed components. Specific guidance will also be included in relevant qualification handbooks and/or assessment documentation.

It incorporates our expectations for centre internal quality assurance and the external quality assurance methods we use to ensure that assessment standards are met and upheld. It also details the range of sanctions that may be put in place when centres do not comply with our requirements or actions that will be taken to align centre marking/assessment to required standards. Additionally, it provides detailed guidance on the secure and valid administration of centre assessments.

Access arrangements: When and how applications need to be made to City & Guilds provides full details of the arrangements that may be made to facilitate access to assessments and qualifications for candidates who are eligible for adjustments in assessment.

The **Centre document library** also contains useful information on such things as:

- conducting examinations
- registering learners
- appeals and malpractice.

#### **Useful contacts**

Please visit the Contact us section of the City & Guilds website, Contact us

#### City & Guilds

For over 140 years, we have worked with people, organisations and economies to help them identify and develop the skills they need to thrive. We understand the life-changing link between skills development, social mobility, prosperity and success. Everything we do is focused on developing and delivering high-quality training, qualifications, assessments and credentials that lead to jobs and meet the changing needs of industry.

We partner with our customers to deliver work-based learning programmes that build competency to support better prospects for people, organisations and wider society. We create flexible learning pathways that support lifelong employability because we believe that people deserve the opportunity to (re)train and (re)learn again and again – gaining new skills at every stage of life, regardless of where they start.

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