

## EPA Apprenticeship Guidance

# End-Point Assessment Apprenticeship Guidance for: **Level 3 Maintenance & Operations Engineering Technician (MOET)**

Standard Reference: ST0154

End-point Assessment Plan: ST0154/AP02

## Contents

About EAL .....	2
Equal Opportunities and Diversity.....	2
Customer Service and Feedback.....	2
Document Purpose .....	3
Overview .....	3
End-point Assessment Gateway .....	4
Assessment Methods.....	4
Assessment Method 1: Knowledge Assessment.....	4
Assessment Method 2: Final Practical Observation.....	5
Assessment Method 3: Technical Interview .....	6
Behaviours Assessment .....	8
Grading.....	8
Re-sits and Re-takes.....	9
Roles and Responsibilities.....	9
Appendix 1: Gateway Checklist .....	10
Appendix 2: Knowledge Criteria for the Multiple-Choice Examination.....	11
Appendix 3: Practical Observation: Checklist and Grading Criteria .....	14
Appendix 4: Technical Interview: Checklist and Grading Criteria .....	16

## Document Amendments

Amendment Made	Issue Number	Effective From
New document	1.0	01.04.2019
Page 5: The specified number of standardised questions 'eleven' removed from practical observation as this is not specified within the assessment plan Page 11: On screen exam registration code reference added Pages 12 & 13: Spelling corrections made	1.1	01.09.2019

## About EAL

Since 1964, EAL (Excellence, Achievement and Learning) has been awarding superior vocational qualifications and apprenticeship components for engineering, building services and related sectors.

EAL has been at the heart of new apprenticeship standards development, supporting employer trailblazer development groups for key industry occupations since 2013, when the reforms began. With our long-standing tradition of being closer to industry and designing qualifications that reflect this close partnership, EAL is perfectly positioned to guide the employer development groups' work. Our expertise, knowledge and support ensures the new standards meet the needs of all employers, from SMEs to multinationals, and provide learners with the best possible start to their careers.

EAL is an end-point assessment organisation (EPAO) and is listed on the Register of End-Point Assessment Organisations (RoEPAO).

## Equal Opportunities and Diversity

EAL expects all employers to enable you to have equal access to training and assessment for end-point assessment (EPA) in line with the Equality Act 2010 and protected characteristics. Further details can be found in the EAL Equal Opportunities and Diversity Policy: <http://www.eal.org.uk/centre-support/centre-support/policies-and-important-documents>

## Customer Service and Feedback

Customer service is a fundamental part of EAL's commitment to you. EAL aims to ensure that all customers receive a high quality efficient service. We are always interested in feedback and if you have any comments or feedback on our qualifications, products or services, please contact the Customer Services Team:

EAL Customer Services

Tel: +44 (0)1923 652 400

Email: [customercare@eal.org.uk](mailto:customercare@eal.org.uk)

## Document Purpose

To ensure a consistent approach when carrying out the knowledge assessment, final observation of practical work and technical interview across all independent assessment panel members, assessment sites, apprentices and assessment decisions.

This document, and its contents, will be used to **guide** you on the outcome of the assessment decisions.

It supports the Apprentice Recording Document, which has been developed to record the outcome of your knowledge assessment, final observation of practical work, technical interview and your overall grade. The Apprentice Recording Document is an auditable record of your End Point Assessment (EPA) activity.

This document should be used in conjunction with EAL's End-point Assessment Policies and Procedures Handbook.

## Overview

The EPA is designed to enable you to demonstrate that you are fully conversant in the knowledge, skills and behaviours (KSBs) expected of individuals working at this level. It is designed to provide assessors with a holistic view of you, and to allow them to assess to what extent you meet, or exceed, the level 3 maintenance & operations engineering technician apprenticeship standard. The EPA must be completed within 6 months after you have met the EPA gateway requirements.

The Apprenticeship Standard and End-point Assessment Plan defines when, what, who and how the EPA is assessed. All those participating and delivering this EPA, which includes you, independent assessors (technical experts) and employers, **must** refer to the following principle documents for the full details of the EPA requirements:

### Maintenance and Operations Engineering Technician

- Apprenticeship Standard – ST0154, approved for delivery 26<sup>th</sup> September 2016.
- End-point Assessment Plan – ST0154/AP02

Both of which are currently available here:

<https://www.instituteforapprenticeships.org/apprenticeship-standards/maintenance-and-operations-engineering-technician/>

Whilst elements of the Apprenticeship Standard and End-point Assessment Plan have been reproduced within this document under the following licence: <http://www.nationalarchives.gov.uk/doc/open-government-licence/version/3/>, it is the responsibility of the independent assessors (technical experts) to ensure the apprentice is being assessed against the correct version of the Apprenticeship Standard and End-point Assessment Plan.

## End-point Assessment Gateway

Your employer must satisfy themselves that you are ready for your end-point assessment, which is evidenced by you consistently working at or above the level set out in the occupational standard.

In addition to the employer's confirmation that you are working at or above the level in the occupational standard, the following gateway requirements must be met prior to you starting the EPA:

- You have achieved English and mathematics at level 2\*
- You have satisfactorily completed the formal training plan agreed between you and your employer
- You have sufficient evidence in the form of a portfolio to allow you to consistently demonstrate knowledge, skills and behaviours as described in the standard.

\* Apprentices without level 2 English and maths will need to achieve this level prior to taking the End-point Assessment. For those with an education, health and care plan or a legacy statement, the apprenticeships English and mathematics minimum requirement is Entry Level 3. British Sign Language qualifications are an alternative to English qualifications for whom this is their primary language.

Independent assessment panel members must ensure that the **Gateway Checklist** document (**Appendix 1**) has been completed to confirm the above requirements have been met.

## Assessment Methods

The end-point assessment is made up of three elements, which are weighted as indicated below:

1. Knowledge assessment (weighting 20%)
2. Final practical observation (weighting 40%)
3. Technical interview (weighting 40%)

### Assessment Method 1: Knowledge Assessment

#### What is the Knowledge Assessment?

The knowledge assessment is a 45 minute on-line question paper which comprises of 30 multiple choice questions designed to test your core technical knowledge across the maintenance & operations engineering technician standard as detailed in annex A of the end-point assessment plan. The knowledge assessment will be conducted in a suitably controlled environment i.e. quiet room free from distraction and influence, in the presence of an invigilator.

The multiple-choice examination will consist of **30 questions** of which you must choose one correct answer from a choice of four.

The examination will be graded: Fail (0 – 59%), Pass (60 – 74%), Merit (75 – 84%) and Distinction 85% and above.

The examination is closed book, but you will be allowed the use of a calculator to conduct any calculations.

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The multiple-choice examination will consist of four outcomes:

1. First principles relating to the operations and maintenance of appropriate plant and equipment.
2. Relevant industry health and safety standards, regulations, and environmental and regulatory requirements.
3. Maintenance and operational practices, processes and procedures covering a range of plant and equipment.
4. The relevant engineering theories and principles relative to their occupation.

You **must** achieve a minimum of 60% as an overall score to successfully achieve this knowledge assessment.

The knowledge criteria can be found within **Appendix 2** of this guidance document.

## Assessment Method 2: Final Practical Observation

You must have at least two weeks' notice of the final practical observation. You will be observed carrying out an activity that relates to the specific role you are working towards e.g. Electrical Technician. The observation will be managed and graded by an independent assessor (technical expert) who has been appointed by EAL as the EPAO. The independent assessor (technical expert) must have no direct connection with you or your employer, unless otherwise agreed in advance by the EPAO by exception as described within the assessment plan for the apprenticeship standard.

The aim of the practical observation is to provide an opportunity for you to synoptically demonstrate your core skills, core behaviours and specific skills as detailed in annex A of the end-point assessment plan, on actual plant and equipment in a realistic work situation. This will offer the opportunity to bring together and apply your learning. You will be assessed to confirm that you can apply your knowledge of plant and systems to safely perform maintenance and operational activities with minimum supervision.

The independent assessor (technical expert) will brief you on the final practical observation and agree the work activity to be observed. Apart from this verbal briefing, the independent assessor (technical expert) will not discuss the activity or provide guidance to you during the activity. The independent assessor (technical expert) may stop the assessment should they observe any unsafe practices. The independent assessor (technical expert) will record a factual account of the observation utilising the recording documents provided by EAL as the EPAO. You will be asked standardised questions (**questioning component**) from the set developed by EAL as the EPAO and have your response recorded. Additional follow up questions may be asked by the independent assessor (technical expert) as appropriate; to confirm your understanding of the rationale for the actions taken and the choices made to complete the tasks. Where follow up questions are required, they will be recorded and attached to the Apprentice Recording Document.

The final practical observation is graded pass, merit or distinction with the **outcome** contributing to the overall grade. The practical observation checklist and grading criteria to include the assessment decision made will then be completed by the independent assessor (technical expert) (**Appendix 3**).

After completion of the activity, the technical expert will submit all relevant documents covering the practical observation to include the questioning component to the EPAO within 10 working days.

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## Questioning Component

The independent assessor (technical expert) will decide on the timing and frequency of the questioning to ensure that they are unobtrusive, must not distract you from your activity or compromise safety. The questioning component must be conducted on a one-to-one basis, under controlled conditions free from influence. The EPAO would recommend that questions are asked **either** immediately prior to the observation of the practical tasks or once the tasks have been completed, plant &/or equipment has been handed over and the work area has been reinstated. A quiet room free from distraction must be made available to you should you wish to use it, however due to the nature of the questions you may choose to demonstrate part or all of your understanding whilst within the working area e.g. by providing a narrative response during a walk through.

## Assessment Method 3: Technical Interview

The technical interview is the final stage of the end-point assessment process and will be conducted by two independent assessors (technical experts), one being the senior technical expert; both are appointed by the EPAO. This interview is based on the content of your evidence portfolio, which may be compiled throughout the apprenticeship and finalised during the end-point assessment period. The portfolio evidence should be sufficient to demonstrate that you can apply the knowledge, skills and behaviours required as indicated within **Annex A** of the end-point assessment plan.

The technical interview will test the currency, validity and coverage of this evidence. It will consist of three scenario question areas synoptically examining knowledge, skills and behaviours and will typically last two hours, up to a maximum of two and a half hours. The independent assessors (technical experts) will use standard questions from agreed sets of questions developed by EAL as the EPAO. Follow-up questions may be used by the independent assessors (technical experts) to probe further into the detail in order to satisfy him/herself of the depth of knowledge and skills.

The technical interview (supported by a portfolio of evidence) shall be a face-to-face session involving you and the independent assessors (technical experts). The portfolio itself will not be assessed, but will be used by the independent assessors (technical experts) as a source of evidence to prepare the questioning for the technical interview and by you to exemplify your responses to the questions.

- The technical interview will assess the knowledge, skills and behaviours as specified in **Annex A** of the end-point assessment plan for the standard.
- The technical interview shall be supported by a portfolio of evidence.
- The portfolio of evidence shall be made available to the assessment organisation no less than **2 weeks** prior to the technical interview to allow for preparation.
- The technical interview shall last **two hours** up to a maximum of **two and a half hours**.
- The technical interview shall be carried out by two independent end-point assessors (technical experts) appointed by EAL as the EPAO.
- The technical interview shall take place in an environment which is free from interruptions and a date, time and location agreed with the EPAO.
- Prior to the assessment you shall be given suitable notice, not less than **5 working days**, to provide preparation time (for example to make travel arrangements if necessary).

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- Independent assessors (technical experts) must ask you **three sets of questions**, from a question bank prepared by EAL as the EPAO, covering the core technical knowledge, core skills, core behaviours and specific skills as specified in **Annex A** of the end-point assessment plan for the standard. Supplementary questions are allowed to seek clarification.

### The End-point Assessor Must:

- Plan the technical interview (supported by the portfolio of evidence) prior to it taking place and ensure that it is relevant to the standard.
- Ensure that you understand the process, the possible outcomes and how it is graded.
- Ensure they take steps to put you at ease.
- Ensure that he/she has the grading criteria and relevant documentation to hand before commencing the technical interview (supported by portfolio of evidence).
- Complete the relevant documentation prepared by EAL as the EPAO, taking notes of what is said.
- Ensure that the outcome of assessment is notified to EAL as the EPAO within the timescale set by them.
- Ensure any special needs highlighted by the employer and training provider are taken into consideration in line with EAL's Reasonable Adjustments policy.

The technical interview is graded pass, merit or distinction with the **outcome** contributing to the overall grade. The technical interview checklist and grading criteria to include the assessment decision made will then be completed by the independent assessor (technical expert) (**Appendix 4**).

### Portfolio of Evidence Requirements

On commencement of the apprenticeship, you should begin to retain a portfolio of evidence which is compiled throughout the apprenticeship. The EPAO advises that this portfolio is finalised before passing through the gateway.

A sufficiently evidenced portfolio is a mandatory requirement of the EPA gateway requirement that supports the EPA technical Interview component.

Employers/training providers are free to devise their own version of the portfolio of evidence but the portfolio of evidence must contain the following information:

- Your name.
- Details of your workplace.
- Evidence to support the knowledge, skills and behaviours of the apprenticeship standard that are mapped to the technical Interview assessment method. Each of these **knowledge, skills and behaviour** (KSB) statements must be sufficiently evidenced (evidence can be provided through a range of sources, for example work reviews, department feedback) and mapped to the relevant KSBs. Each piece of evidence will cover multiple KSBs.
- Confirmation from the employer that the tasks evidenced in the portfolio were completed to the required standard of the organisation.
- Document the off-the-job training that has taken place during the on-programme phase, with at least **20%** of their employed time **off-the-job**.
- Copy of English and mathematics certificates.

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Your **employer** must sign-off the **portfolio** of evidence, thereby confirming the demonstration of competence against the KSBs assigned to this assessment component and authenticating its contents.

You must submit your portfolio of evidence to EAL as their EPAO when applying for the EPA. An independent assessor (technical expert) will check qualification outcomes and review the portfolio to glean personalised information that will assist the technical interview component of the EPA.

The full details of the technical interview requirements can be found in the end-point assessment plan for this standard here:

<https://www.instituteforapprenticeships.org/apprenticeship-standards/maintenance-and-operations-engineering-technician/>

## Behaviours Assessment

You are expected to demonstrate the behaviours, as detailed within **Annex A** of the assessment plan for the standard throughout the end-point assessment. Furthermore, your portfolio will evidence the required behaviours that have been displayed during the apprenticeship. All behaviour statements **must** be sufficiently evidenced.

The independent assessors (technical experts) will assess the behaviours during the practical observation and technical interview. The required behaviours are detailed within **Annex A** of the assessment plan here:

<https://www.instituteforapprenticeships.org/apprenticeship-standards/maintenance-and-operations-engineering-technician/>

## Grading

Independent assessors (technical experts) must individually grade each assessment method according to the requirements set out in the end-point assessment plan for this standard. Restrictions on grading apply where you re-sit/re-take an assessment method – see re-sit/re-take section below.

The three assessment methods outlined are weighted, 20% on the knowledge assessment, 40% on the practical observation and 40% on the technical interview. EAL as the EPAO will combine the moderated grades of all three assessment methods to determine the overall EPA grade.

To achieve an EPA **pass**, apprentices must achieve a minimum of a **pass** in the knowledge assessment, practical observation and technical interview.

To achieve an EPA **merit**, you must achieve a minimum of a **pass** in the knowledge assessment, **merit** in the practical observation and **merit** in the technical interview

To achieve an EPA **distinction**, you must achieve a minimum of a **merit** in the knowledge assessment, **distinction** in the practical observation and **distinction** in the technical interview

A **fail** in any assessment method will result in an EPA **fail**.

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Independent assessors' decisions will be subject to **moderation** by EAL as the EPAO. Decisions **will not** be confirmed until after moderation.

The full details of the grading requirements can be found in the end-point assessment plan for this standard here:

<https://www.instituteforapprenticeships.org/apprenticeship-standards/maintenance-and-operations-engineering-technician/>

## Re-sits and Re-takes

If you fail one or more assessment method, you will be offered the opportunity to take a re-sit or a re-take. A re-sit does not require further learning, whereas a re-take does.

You should have a supportive action plan to prepare for the re-sit or a re-take. Your employer will need to agree that a re-sit or re-take is an appropriate course of action.

If you fail any of the assessment methods, and therefore the EPA, in the first instance, you will be required to re-sit/re-take those failed assessment methods.

You may re-take/re-sit one or more elements within the six month end-point assessment period. Re-take/re-sits outside of the six-month end-point assessment period would require all elements to be re-assessed, unless, in the opinion of EAL as the EPAO, exceptional circumstances apply outside the control of you or your employer. Further re-takes/re-sits will be at the discretion of your employer following a 1:1 review with you to determine the suitability of the apprentice for further testing.

Re-sits and re-takes **are not** offered to you if you want to move from pass to merit or distinction.

Where any assessment method has to be re-sat or re-taken, you will be awarded a **maximum** EPA grade of **pass**, unless EAL as the EPAO determines there are exceptional circumstances requiring a re-sit or re-take.

If a re-take/re-sit relates to the final practical observation, you must be presented with a different task, which must cover the same components/activities.

If the re-take/re-sit relates to the knowledge assessment, you will be presented with a new randomised on-line knowledge test.

If the re-take/re-sit relates to the technical interview, you must be questioned on the same subject area.

## Roles and Responsibilities

There are five main roles involved in this end-point assessment process: the **apprentice**, the **employer**, independent examiner, EAL as the **EPAO** and **independent assessor** (technical expert). An explanation of their main responsibilities can be found in the end-point assessment plan for this standard here:

<https://www.instituteforapprenticeships.org/apprenticeship-standards/maintenance-and-operations-engineering-technician/>

## Appendix 1: Gateway Checklist

The EPA must only start once the employer is satisfied that the apprentice is consistently working at or above the level set out in the occupational standard; that means they have achieved occupational competence. In making this decision, the employer may take advice from the apprentice’s training provider(s) but the decision must ultimately be made solely by the employer.

In addition to the employer’s confirmation that the apprentice is working at or above the level in the occupational standard, the following gateway requirements must be met prior to the apprentice starting the EPA:

The apprentice has:	Evidence reference	Employer/provider confirmation (v)	EPAO confirmation (v)
*Achieved a minimum level 2 English	<i>Example Template</i>	<i>Example Template</i>	<i>Example Template</i>
*Achieved a minimum level 2 maths	<i>Example Template</i>	<i>Example Template</i>	<i>Example Template</i>
Satisfactorily completed the formal training plan agreed with the apprentice by the employer.	<i>Example Template</i>	<i>Example Template</i>	<i>Example Template</i>
Provided sufficient evidence in the form of a portfolio to consistently demonstrate their knowledge, skills and behaviours as described in the standard, authenticated by employer.	<i>Example Template</i>	<i>Example Template</i>	<i>Example Template</i>

\* Apprentices without level 2 English and maths will need to achieve this level prior to taking the End-point Assessment. For those with an education, health and care plan or a legacy statement, the apprenticeships English and mathematics minimum requirement is Entry Level 3. British Sign Language qualifications are an alternative to English qualifications for whom this is their primary language.

## Appendix 2: Knowledge Criteria for the Multiple-choice Examination

The multiple-choice examination consists of four learning outcomes:

1. First principles relating to the operations and maintenance of appropriate plant and equipment.
2. Relevant industry health and safety standards, regulations, and environmental and regulatory requirements.
3. Maintenance and operational practices, processes and procedures covering a range of plant and equipment.
4. The relevant engineering theories and principles relative to their occupation.

The knowledge criteria outlined below contains multiple assessed criteria within learning outcome (LO) 4 that represents the **seven** different occupational roles referred to within the maintenance and operations engineering technician standard. All of the seven roles share the assessment criteria within LO 1 – 3. Two occupational roles (Electrical Systems/Process Control Technicians and Electromechanical Technicians) share the assessment criteria within LO 4. Therefore for the purpose setting out the knowledge criteria below, the occupational roles have been grouped into the following **six** roles:

Occupational role	On screen exam registration code
1: Mechanical Technician	EPA/MOETMT1
2: Electrical Technician	EPA/MOETET1
3: Electrical System and Process Control Technician and Electromechanical Technician	EPA/MOETESP3
4: Control and Instrumentation Technician	EPA/MOETCIT4
5: Plant Operations Technician	EPA/MOETPOT5
6: Wind Turbine Technician	MOETWTT6

Apprentice candidates will be assessed against one set of LO 4 which relates to their occupational role.

### Outcome 1 - First principles relating to the operation and maintenance of appropriate plant and equipment

**Outcome 1 will cover five knowledge criteria:**

- 1.1 Reasons for carrying out maintenance
- 1.2 Types of maintenance
- 1.3 Considerations of maintenance planning
- 1.4 Appropriate forms of communication used within the occupation
- 1.5 Technical and functional information and data

### Outcome 2 - Relevant industry health and safety standards, regulations, and environmental and regulatory requirements

**Outcome 2 will cover eleven knowledge criteria:**

- 2.1 Roles and responsibilities with regard to current relevant Health and Safety legislation
- 2.2 Roles and responsibilities with regard to current relevant environmental legislation
- 2.3 Procedures that should be followed in the case of accidents which involve injury, including requirements for the treatment of electric shock/electrical burns  
Appropriate procedures which should be followed when emergency situations occur in the workplace

Continued

- 2.4 Actions to be taken in situations which exceed their level of responsibility for Health and Safety in the workplace  
Appropriate responsible persons to whom health and safety and welfare related matters should be reported
- 2.5 Ways in which the environment may be affected by work activities
- 2.6 Current requirements and good working practices for processing waste on site  
Why it is important to report any hazards to the environment that arise from work procedures
- 2.7 Procedure for producing risk assessments and method statements in accordance with their level of responsibility  
Procedures that should be taken to remove or minimise risks before deciding PPE is needed  
Purpose of PPE  
Appropriate protective clothing and equipment that is required for identified work tasks
- 2.8 First aid facilities that must be available in the work area in accordance with health and safety regulations  
Why it is important not to misuse first aid equipment/supplies and to replace first aid supplies once used
- 2.9 Warning signs for the main groups of hazardous substances
- 2.10 What is meant by the term hazard in relation to Health and Safety legislation in the workplace  
Specific hazards associated with maintenance and operations
- 2.11 Situations which can constitute a hazard in the workplace  
Practices and procedures for addressing hazards in the work place

### **Outcome 3 - Maintenance and operational practices, processes and procedures covering a range of plant and equipment**

#### **Outcome 3 will cover six knowledge criteria:**

- 3.1 Procedures for the safe isolation of systems
- 3.2 Safe working practices and procedures for the use of equipment and materials in the working environment
- 3.3 Appropriate data gathering/condition monitoring techniques for engineering plant and equipment
- 3.4 Operational practices, processes and procedures on plant/equipment
- 3.5 Application of fault diagnosis techniques
- 3.6 Use of fault finding aids

### **Outcome 4 - The relevant engineering theories and principles relative to their occupation**

#### **OCCUPATIONAL ROLE 1 - Mechanical Technician**

#### **Outcome 4.1 will cover six knowledge criteria 4.1a – 4.1f:**

#### **Mechanical Engineering Principles/ Mechanical Science Principles**

- 4.1a Installation, Assembly and Disassembly
- 4.1b General Mechanical Engineering
- 4.1c Mechanical Science
- 4.1d Service, Repair, Replace
- 4.1e Safety
- 4.1f Practical Application

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## **OCCUPATIONAL ROLE 2 - Electrical Technician**

**Outcome 4.2 will cover six knowledge criteria 4.2a – 4.2f:  
Electrical Engineering Principles/ Electrical Science Principles**

- 4.2a Installation, Assembly and Disassembly
- 4.2b General Electrical Engineering
- 4.2c Electrical Science
- 4.2d Service, Repair, Replace
- 4.2e Safety
- 4.2f Practical Application

## **OCCUPATIONAL ROLE 3 - Electrical System and Process Control Technician and Electromechanical Technician**

**Outcome 4.3 will cover six knowledge criteria 4.3a – 4.3f:**

**Electromechanical Engineering Principles/ Electrical Engineering Principles/ Electrical Science Principles**

- 4.3a Installation, Assembly and Disassembly
- 4.3b Electromechanical Engineering Science
- 4.3c General Electromechanical Engineering
- 4.3d Service, Repair, Replace
- 4.3e Safety
- 4.3f Practical Application

## **OCCUPATIONAL ROLE 4 - Control & Instrumentation Technician**

**Outcome 4.4 will cover six knowledge criteria 4.4a – 4.4f:**

**Control & Instrumentation Engineering Principles/ Control & Instrumentation Engineering Science**

- 4.4a Installation, Assembly and Disassembly
- 4.4b General Control & Instrumentation Engineering
- 4.4c Control & Instrumentation Engineering Science
- 4.4d Service, Repair, Replace
- 4.4e Safety
- 4.4f Practical Application

## **OCCUPATIONAL ROLE 5 - Plant Operations Technician**

**Outcome 4.5 will cover six knowledge criteria 4.5a – 4.5f:**

**Plant Engineering Principles/ Plant Engineering Science**

- 4.5a Installation, Assembly and Disassembly
- 4.5b General Plant Engineering
- 4.5c Plant Engineering Science
- 4.5d Service, Repair, Replace
- 4.5e Safety
- 4.5f Practical Application

## **OCCUPATIONAL ROLE 6 - Wind Turbine Technician**

**Outcome 4.6 will cover six knowledge criteria 4.6a – 4.6f:**

**Wind Turbine Engineering Principles/ Wind Turbine Engineering Science**

- 4.6a Installation, Assembly and Disassembly
- 4.6b General Plant Engineering
- 4.6c Plant Engineering Science
- 4.6d Service, Repair, Replace
- 4.6e Safety
- 4.6f Practical Application

## Appendix 3: Practical Observation: Checklist and Grading Criteria

### Practical Observation: Checklist

Practical Observation Checklist:	Evidence reference	Completed (✓)
<b>Practical activity</b>		
The apprentice has been observed carrying relevant work activity on actual plant and equipment in a realistic work situation by a technical expert appointed by the EPAO.	<i>Example Template</i>	<i>Example Template</i>
Through completion of the practical observation the Apprentice has synoptically demonstrated the specific knowledge, skills and behaviours as detailed within the grading criteria on actual plant and equipment in a realistic work situation.	<i>Example Template</i>	<i>Example Template</i>
<b>Record</b>		
The technical expert has produced a report which is current, valid, reliable and sufficient.	<i>Example Template</i>	<i>Example Template</i>
The technical expert has mapped the annex evidence against the core skills, core behaviors and specific skills being assessed by this assessment method.	<i>Example Template</i>	<i>Example Template</i>
<b>Questioning Component</b>		
The Apprentice has answered all questions satisfactorily to include supplementary questions which confirm the Apprentice's understand of the rationale for actions taken and the choices made to complete the tasks.	<i>Example Template</i>	<i>Example Template</i>

### Grading of Practical Observation: Grading Criteria

#### Practical observation (including evidence) and questioning

##### Pass criteria – All criteria below must be achieved:

Grading criteria	The grading criteria below is detailed within table 1 of the assessment plan for the apprenticeship standard	Evidence reference	Completed (✓)
P1	Achieves practical activities as described in Annex A (of the assessment plan for this standard) and meets the expectations of technical experts	<i>Example Template</i>	<i>Example Template</i>
P2	Follows policies and procedures; applies health and safety knowledge. Takes personal responsibility for own health, safety and security and that of anyone who may be affected by their actions	<i>Example Template</i>	<i>Example Template</i>
P3	Accuracy and finish of work meets company standards	<i>Example Template</i>	<i>Example Template</i>
P4	Effectively contributes to team success, and suggests valid ideas	<i>Example Template</i>	<i>Example Template</i>

Continued

P5	Speaks confidently when asked, listens to others and takes required action	<i>Example Template</i>	<i>Example Template</i>
P6	Demonstrates consistent application of policies and procedures	<i>Example Template</i>	<i>Example Template</i>
P7	Consistently demonstrates compliance and proactively identifies workplace hazards	<i>Example Template</i>	<i>Example Template</i>

**Merit criteria – All pass criteria above must have been achieved, and in addition:**

<b>Grading criteria</b>	<b>The grading criteria below is detailed within table 1 of the assessment plan for the apprenticeship standard</b>	<b>Evidence reference</b>	<b>Completed (✓)</b>
M1	Works with others to identify areas for improvement and follows through on agreed implementation	<i>Example Template</i>	<i>Example Template</i>
M2	Demonstrates positive professional relationships with individuals to support specific issues	<i>Example Template</i>	<i>Example Template</i>
M3	Adapts the method and style of communications to changing circumstances and needs	<i>Example Template</i>	<i>Example Template</i>
M4	Consistently demonstrates compliance and makes suggestions to reduce risks	<i>Example Template</i>	<i>Example Template</i>

**Distinction criteria – All pass and merit criteria above must have been achieved, and in addition:**

<b>Grading criteria</b>	<b>The grading criteria below is detailed within table 1 of the assessment plan for the apprenticeship standard</b>	<b>Evidence reference</b>	<b>Completed (✓)</b>
D1	Exemplary health & safety performance	<i>Example Template</i>	<i>Example Template</i>
D2	Identifies health & safety deficiency and provides solutions	<i>Example Template</i>	<i>Example Template</i>
D3	Consults and involves, people from team and other areas to achieve greater understanding	<i>Example Template</i>	<i>Example Template</i>
D4	Takes additional responsibility and autonomy to achieve high performance outcomes	<i>Example Template</i>	<i>Example Template</i>
D5	Through positive relationships is able to actively address conflict with positive outcomes	<i>Example Template</i>	<i>Example Template</i>
D6	Pre-empts risks prior to task commencement and puts actions in place to prevent them occurring	<i>Example Template</i>	<i>Example Template</i>



## Appendix 4: Technical Interview: Checklist and Grading Criteria

### Technical Interview Checklist

The apprentice has:	Evidence reference	Completed (✓)
<b>Portfolio of Evidence</b>		
Completed a portfolio of evidence to the requirements set out in the End-point Assessment Plan for this Standard.	<i>Example Template</i>	<i>Example Template</i>
Received employer sign-off for their portfolio of evidence, thereby confirming the demonstration of competence against the knowledge, skills and behaviours assigned to this assessment component and authenticating its contents.	<i>Example Template</i>	<i>Example Template</i>
Submitted their portfolio of evidence to their EPAO when applying for the EPA (An independent assessor will check qualification outcomes and review the portfolio to glean personalised information that will assist the Technical Interview component of the EPA).	<i>Example Template</i>	<i>Example Template</i>
<b>Questioning Component</b>		
The Apprentice has answered all questions asked during the interview satisfactorily to include any supplementary questions.	<i>Example Template</i>	<i>Example Template</i>

### Grading of Technical Interview: Grading Criteria

#### Technical Interview (including evidence) and questioning

The grading criteria below is detailed within table 1 of the assessment plan for the apprenticeship standard

#### Pass criteria – Pass criteria – All criteria below must be achieved:

Grading criteria	Provides correct information to describe their understanding of skills, knowledge and behaviours required to undertake their respective role competently, meeting technical experts' requirements, with particular emphasis on:	Evidence reference	Completed (✓)
P1	Understands and can describe the impact of their actions on plant, equipment and others	<i>Example Template</i>	<i>Example Template</i>
P2	Demonstrates compliance with all company health, safety and environmental processes and policies as well as regulatory requirements	<i>Example Template</i>	<i>Example Template</i>
P3	Describes why policies and procedures are required	<i>Example Template</i>	<i>Example Template</i>

#### Merit criteria – All pass criteria above must have been achieved, and in addition:

Grading criteria	Explains in detail, with supporting evidence, the range of required skills, knowledge and behaviours with particular emphasis on:	Evidence reference	Completed (✓)
M1	Inclusion of the relevant engineering theories and principles relative to their occupation	<i>Example Template</i>	<i>Example Template</i>

Continued

M2	Demonstration of review and applicability of industry health, safety and environmental working practices and regulations	<i>Example Template</i>	<i>Example Template</i>
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**Distinction criteria – All pass and merit criteria above must have been achieved, and in addition:**

<b>Grading criteria</b>	<b>Provides:</b>	<b>Evidence reference</b>	<b>Completed (✓)</b>
D1	Justification of maintenance and operational practices, processes and procedures covering a range of plant and equipment	<i>Example Template</i>	<i>Example Template</i>
D2	Justification of a range of methods to locate, and rectify faults on plant and equipment, with explanation of their recommended choice	<i>Example Template</i>	<i>Example Template</i>
D3	Demonstration of excellent and thorough understanding of the relevant engineering theories and principles relative to their occupation	<i>Example Template</i>	<i>Example Template</i>
D4	Excellent knowledge and understanding of the impact of relevant industry health, safety and environmental working practices and regulations on their activities	<i>Example Template</i>	<i>Example Template</i>

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