

Australian Government

Department of Education, Employment and Workplace Relations

UEGNSG111A Produce maintenance strategies and plans for a gas facility

Release: 1



UEGNSG111A Produce maintenance strategies and plans for a gas facility

Modification History

Not Applicable

Unit Descriptor

Unit Descriptor 1)

This Unit covers the development of producing maintenance strategies and plans for a gas production facility. The competency standard involves strategies; budgeting; reference information; communication; producing documentation; preparation and implementation strategies.

Application of the Unit

Application of the Unit 3)

This competency standard shall apply to any basic and safe work site where Gas Industry operations occur. It could also apply, where applicable to other workplaces in the electricity supply industry (transmission and distribution and generation), the electrotechnology industry and the water industry, subject to all Occupational Health and Safety and duty of care requirements being met for the workplace.

Licensing/Regulatory Information

License to practice 3.1)

The skills and knowledge described in this unit are not subject to licence regulation other than those directly related to Occupational Health and Safety, gas/electricity/water industry safety and compliance, industrial relations, environmental protection, telecommunications, anti discrimination and training.

License to practice	3.1)
	Commonwealth, State/Territory or Local Government legislation and regulations may exist that limit the age at which a person can operate certain equipment.
Pre-Requisites	
Prerequisite Unit(s)	2)
Competencies	2.1)
	Granting of competency in this unit shall be made only after competency in the following unit(s) has/have been confirmed:
	Nil

Employability Skills Information

Refer to the Evidence Guide

Elements and Performance Criteria Pre-Content

5) Elements describe the sesential outcomes of a competency standard unit Assessment of performance is to be consistent with the evidence guide.

Elements and Performance Criteria

ELEMENT PERFORMANCE CRITERIA

- 1 Research and plan to 1.1 Existing strategies are reviewed for maintenance requirements and directions against work schedule
 - 1.2 Enterprise and site plans are reviewed for impact on maintenance work

ELEMENT

PERFORMANCE CRITERIA

- 1.3 Work is prioritised and sequenced for the most efficient and effective outcome following consultation with others for completion within acceptable timeframes to a quality standard and in accordance with established procedures
- 1.4 Risk control measures are identified, prioritised and evaluated against the work schedule
- 1.5 Relevant requirements and established procedures for the work are communicated to all persons and identified for all work sites
- 1.6 Cost estimating and economic evaluation is performed and legal implications are investigated to ensure work can be undertaken in accordance with requirements
- 1.7 Resources including persons and equipment required are identified, scheduled, coordinated and confirmed
- 1.8 Clients are provided with possible solutions and options within the scope, acceptable cost and requirements
- 1.9 Liaison and communication issues with authorised persons, authorities, clients and land owners are resolved and activities coordinated to carry out work
- 1.10 Persons participating in the work, including plant operators and contractors are fully briefed and respective responsibilities coordinated and authorised where applicable in accordance with establish procedures
- 1.11 Site is prepared according to the work schedule and to minimise risk and damage to property, commerce and individuals in accordance with established procedures

ELEMENT

PERFORMANCE CRITERIA

- 2 Establish strategies 2.1 OHS, environmental and sustainable energy for implementing a policies and procedures and safe work practices maintenance plan are followed to eliminate or minimise incidents and hazards
 - 2.2 Resources required to implement strategies are identified and detailed and the work is performed in accordance with a work schedule and to requirements
 - 2.3 Timeframes and potential variances for maintenance scheduling are defined and potential risks and control measures are monitored and preventative action taken where necessary
 - 2.4 Planned objectives are documented in accordance with enterprise requirements
 - 2.5 Essential Knowledge and Associated Skills is applied to ensure completion in an agreed timeframe and to quality standards with a minimum of waste according to requirements
 - 2.6 Solutions to non-routine problems are identified and actioned using acquired Essential Knowledge and Associated Skills according to requirements
 - 2.7 Ongoing checks of quality of the work are undertaken in accordance with requirements and established procedures to ensure a quality like outcome is achieved for the client and to a community and industry standards
 - 3.1 Implement Strategies and plans are implemented in order to facilitate required outcomes as per enterprise requirements
 - 3.2 Strategies are implemented and variances are identified and corrective action is taken in accordance with risk management planning process
 - 3.3 Final reporting is performed as per enterprise requirements

3 maintenance strategy

Required Skills and Knowledge

REQUIRED SKILLS AND KNOWLEDGE

6) This describes the essential skills and knowledge and their level, required for this unit.

Evidence shall show that knowledge has been acquired of maintenance strategies and plans for a gas facility. The extent of the essential knowledge and associated skills (EKAS) required is given in Volume 2 - Part 2.2 EKAS. It forms an integral part of this unit.

G 5.1.1	Gas Industry concepts for supervising operations
G 5.1.2	Problem solving, decision making and conflict resolution
G 5.1.3	Emergency management
G 5.1.4	Management techniques of utilities industry supervision
G 5.1.6	Technical knowledge for Gas Industry managers

8.1)

Evidence Guide

EVIDENCE GUIDE

8) The Evidence Guide forms an integral part of this Unit and shall be used in conjunction with all components parts of this unit and performed in accordance with the Assessment Guidelines of this Training Package.

Overview of

Assessment

Longitudinal competency development approaches to assessment, such as Profiling, require data to be reliably gathered in a form that can be consistently interpreted over time. This approach is best utilised in Apprenticeship programs and reduces assessment intervention. It is the Industry's preferred model for apprenticeships. However, where summative (or final) assessment is used it is to include the application of the competency in the normal work environment or, at a minimum, the application of the competency in a realistically simulated work environment. It is recognised that, in some circumstances, assessment in part or full can occur outside the workplace. However, it must be in accord with industry and regulatory policy in this regard.

Methods chosen for a particular assessment will be influenced by various factors. These include the extent of the assessment, the most effective locations for the assessment activities to take place, access to physical resources, additional safety measures that may be required and the critical nature of the competencies being assessed.

The critical safety nature of working with electricity, electrical equipment, gas or any other hazardous substance/material carries risk in deeming a person competent. Hence, sources of evidence need to be 'rich' in nature so as to minimise error in judgment.

Activities associated with normal every day work have a bearing on the decision as to how much and how detailed the data gathered will contribute to its 'richness'. Some skills are more critical to safety and operational requirements while the same skills may be more or less frequently practised. These points are raised for the assessors to consider when choosing an assessment method and developing assessment instruments. Sample assessment instruments are included in the Assessment Guidelines of this Training Package.

EVIDENCE GUIDE

Critical aspects of	8.2)
evidence required to demonstrate competency in this	Before the critical aspects of evidence are considered all prerequisites shall be met.
unit	Evidence for competence in this unit shall be considered holistically. Each element and associated Performance Criteria shall be demonstrated on at least two occasions in accordance with the 'Assessment Guidelines' UEG06'. Evidence shall also comprise:
	• A representative body of Performance Criteria demonstrated within the timeframes typically expected of the discipline, work function and industrial environment. In particular this shall incorporate evidence that shows a candidate is able to:
	• Implement Occupational Health and Safety workplace procedures and practices including the use of risk control measures as specified in the Performance Criteria and range
	• Apply sustainable energy principles and practices as specified in the Performance Criteria and range
	• Demonstrate an understanding of the essential knowledge and associated skills as described in this unit to such an extent that the learner's performance outcome is reported in accordance with the preferred approach; namely a percentile graded result, where required by the regulated environment
	• Demonstrate an appropriate level of skills enabling employment
	 Conduct work observing the relevant Anti discrimination legislation, regulations, polices and workplace procedures
	• Demonstrate performance across a representative range of contexts from the prescribed items below:
	Range of tools/equipment/materials/procedures/ workplaces/other variables
	Group The minimum Item List No number of items on

which skill is

demonstrated

to be

,

-

. . . .

.

. .

Range of tools/equipment/materials/procedures/ workplaces/other variables		
А	All	Knowledge and interpretation of OHS legislation
		Enterprise safety procedures
		Enterprise site safety and emergency procedures
В	All	Strategy development
		Maintenance philosophy
		Engineering principles
		Risk management
		Principles of planning
		Communication principles
		Problem solving skills
С	At least one occasion	Deal with an unplanned event by drawing on essential knowledge and associated skills to provide appropriate solutions incorporated in the holistic assessment with the above listed items

. . .

Context of and specific resources for assessment

8.3)

This unit should be assessed as it relates to normal work practice using procedures, information and resources typical of a workplace. This should include:

- OHS policy and work procedures and instructions.
- Suitable work environment, facilities, equipment and materials to undertake actual work as prescribed by this Unit.
- Appropriate environmental regulation and work practices.
- Appropriate organisational requirements.
- Appropriate work environment, equipment and tools.

In addition to the resources listed above, in Context of and specific resources for assessment, evidence should show demonstrated competency in producing maintenance strategies and plans for a gas facility.

Assessment of this competency must also be undertaken in either an actual workplace or under a simulated work

	Range of tools/equipment/materials/pro- workplaces/other variables	cedures/
	environment. Assessment must also integrate the competencies.	e key
Method of	8.4)	
assessment	This Unit shall be assessed by methods given in 3 'Assessment Guidelines'.	Volume 1, Part
	Note : Competent performance with inherent safe practices is expected in the Industry to which thi This requires that the specified Essential Knowle Associated Skills are assessed in a structured en- which is primarily intended for learning/assessmi incorporates all necessary equipment and faciliti to develop and demonstrate the Essential Knowl Associated Skills described in this unit.	s Unit applies. edge and vironment ent and es for learners
Concurrent	8.5)	
assessment and relationship with other units	There are no recommended concurrent assessme unit, however in some cases efficiencies may be of learning and assessment effort being concurre with allied Units where listed.	gained in terms
	BSBFLM405A Implement operational plans	
	BSBCMN411A Monitor a safe workplace	
Key Competencies	8.6)	
	Evidence that particular key competencies have been achiev within this Unit is in the context of the following Performan Criteria of evidence. See Volume 2, Part 4 for an explanation Key Competencies and levels of this Training Package.	
Key Competencies	Example of Application	Performance Level
TT '1 '		

How are ideas and information communicated within this competency?	Refer to the following Performance Criteria for examples of application: 1.5; 1.8; 1.9; 1.10	2

		Range of tools/equipment/materials/proc workplaces/other variables	cedures/	
inf co	ow can Formation be Ilected, analysed d organised?	Refer to the following Performance Criteria for examples of application: 1.1; 1.3; 1.4	2	
pla	ow are activities anned and ganised?	Refer to the following Performance Criteria for examples of application: 1.2; 1.3; 1.7; 2.4; 3.1	3	
use	ow is team work ed within this mpetency?	Refer to the following Performance Criteria for examples of application: 1.3; 1.5; 1.10	3	
ma ano	ow are athematical ideas d techniques ed?	Refer to the following Performance Criteria for examples of application:	N/A	
sol	ow are problem lving skills plied?	Refer to the following Performance Criteria for examples of application: 2.6	2	
How is use of technology applied?		Refer to the following Performance Criteria for examples of application:	2	
		3.3		
	ills Enabling nployment	8.7)		
Employment		Evidence that competency in this unit incorporates skills enabling employment is in the context of the following performance.		
Skills for Employment		Example of Application		
1	Developing and using skills within a real workplace	Refer to the following Performance Criteria for eapplication: All	examples of	

		Range of tools/equipment/materials/procedures/ workplaces/other variables	
2	Learning to learn in the workplace	Refer to the following Performance Criteria for examples of application:	
		1.3; 1.4; 2.6	
3 Reflecting on the outcome and process of work		Refer to the following Performance Criteria for examples of application:	
	task	3.3	
4	Interacting and understanding of the context of the	Refer to the following Performance Criteria for examples of application:	
	work task	1.5; 1.9; 2.6	
5	organising the	Refer to the following Performance Criteria for examples of application:	
	meaningful work task	1.3; 1.4	
6	Performing the work task in non-routine or contingent situations	Refer to the following Performance Criteria for examples of application: 2.6	

Range Statement

RANGE STATEMENT

7) This relates to the competency standard unit as a whole providing the range of contexts and conditions to which the Performance Criteria apply. It allows for different work environments and situations that will affect performance.

This Unit shall/may be demonstrated in relation to producing maintenance strategies and plans for a gas facility.

The following constants and variables included in the element/Performance Criteria in this unit are fully described in the Definitions Section of this volume and form an integral part of the Range Statement of this unit:

Strategies Budget Reference information Communication Documentation (5) Preparation and implementation strategies

Unit Sector(s)

Not Applicable

skills

Literacy and numeracy skills

Literacy and numeracy 2.2)

Participants are best equipped to achieve this unit if they have reading, writing and numeracy skills indicated by the following scales. Description of each scale is given in

Reading 4 Writing 4 Numeracy 4

Volume 2, Part 3 'Literacy and Numeracy'

Competency Field

Competency Field 4)

Cross discipline.