



Australian Government

UETDRTO003 Establish and reinstate a power systems transmission structure work site

Release: 1

UETDRTO003 Establish and reinstate a power systems transmission structure work site

Modification History

Release 1. This is the first release of this unit of competency in the UET Transmission, Distribution and Rail Sector Training Package Release 2.0.

Application

This unit covers the operation/maintenance of support plant and equipment and tools used for excavation work associated with foundations and footings for the construction of transmission towers. It also covers the preparation of the worksite and the reinstatement of the ground surface. Scope of maintenance includes visual inspection, lubrication, gland nipping, draining of water taps, degreasing and replacing gaskets. Use of relevant personal protective equipment (PPE) is also required.

The application of the skills and knowledge described in this unit may require a licence/registration to practice in the workplace subject to regulations for undertaking of electrical work.

Other conditions may apply under state and territory legislative and regulatory licensing requirements which must be confirmed prior to commencing this unit.

Pre-requisite Unit

UEECD0007 Apply work health and safety regulations, codes and practices in the workplace

UETDREL002 Comply with environmental requirements

Competency Field

Transmission Overhead

Unit Sector

Not applicable.

Elements and Performance Criteria

ELEMENTS

PERFORMANCE CRITERIA

Elements describe the essential Performance criteria describe the performance needed to

outcomes.

demonstrate achievement of the element.

1 Prepare to establish and/or restore a transmission tower worksite schedule of work

- 1.1** Work instructions are identified, received and confirmed
- 1.2** Relevant requirements, specifications and priorities are set in accordance with procedures to establish and confirm the work schedule
- 1.3** Work health and safety (WHS)/occupational health and safety (OHS) policies and procedures to be followed for the work to be performed are received and confirmed
- 1.4** Suggestions to assist with the establishing/restoration of the worksite are made to others involved in the work
- 1.5** Hazards are identified, WHS/OHS risks assessed and emergency exits kept clear according to given instructions and established procedures
- 1.6** Scope of responsibility under the relevant work permit, where appropriate, are received and confirmed with relevant personnel according to requirements and established procedures
- 1.7** Resources, including equipment, tools, drawings, notices and PPE, required for the job are identified and checked for working order according to established procedures
- 1.8** Relevant responsibilities associated with first aid and other related work safety procedures at the worksite are checked and confirmed in accordance with requirements and established procedures to ensure safety measures are followed in the instance of an incident
- 1.9** Client issues are referred to appropriate personnel in accordance with industry/community standards
- 1.10** Site preparation is confirmed according to given instructions, as is the site safety plan and the work schedule for a quality outcome and to minimise risk and damage to property, commerce and individuals in accordance with established procedures
- 1.11** Road signs, barriers and warning devices are correctly positioned in accordance with given instructions and requirements

2 Establish and/or restore the worksite schedule of work

- 2.1** WHS/OHS and sustainable energy principles and practices to reduce the incidents of accidents and minimise waste associated with establishing/restoring the worksite and/or using of plant and equipment are followed in accordance with given instructions, requirements and/or established procedures
- 2.2** Site hazards, such as lifting, climbing, working in confined spaces and/or aloft, and use of power tools/equipment, techniques and practices, are safely followed in accordance with given instructions and according to requirements
- 2.3** Operational knowledge for establishing/restoration of the worksite and for operating support plant and equipment is confirmed to ensure completion in an agreed timeframe and to quality standards with a minimum of waste according to requirements and established procedures
- 2.4** Establishing/restoring the worksite and operating support plant and equipment is used safely and carried out in accordance with given instructions and established procedures to ensure all process aspects of the work are confirmed
- 2.5** Hazard warnings and safety signs are recognised and hazards and assessed WHS/OHS risks reported to immediate authorised personnel for directions according to established procedures
- 2.6** Non-routine events are referred to immediate authorised personnel for directions according to established procedures
- 2.7** Problems associated with establishing/restoring the worksite and the operation of support plant and equipment are dealt with using acquired known solutions and skills related to routine procedures to ensure work instructions and established procedures are met
- 2.8** Ongoing checks of quality of the work are undertaken and work is completed within an allocated timeframe in accordance with given instructions and established procedures

3 Review and document establishment and/or restoration of worksite

- 3.1** Work undertaken is checked against work schedule and anomalies reported to authorised persons in accordance

schedule of work

with established procedures

- 3.2** Accidents and/or incidents are actioned and reported to authorised personnel in accordance with established procedures
- 3.3** Worksite is rehabilitated, cleaned up and made safe in accordance with given instructions and established procedures
- 3.4** Tools, equipment and any surplus resources and materials are, where appropriate, cleaned, checked and returned to storage in accordance with established procedures
- 3.5** Appropriate personnel are notified of work completion according to established procedures
- 3.6** Work completion records and report forms/data sheets are completed accurately in accordance with given instructions and established procedures
- 3.7** Performance feedback is sought to confirm outcomes are in agreement with work requirements and specifications

Foundation Skills

Foundation skills essential to performance are explicit in the performance criteria of this unit of competency.

Range of Conditions

Range is restricted to essential operating conditions and any other variables essential to the work environment.

Non-essential conditions may be found in the UET Transmission, Distribution and Rail Sector Training Package Companion Volume Implementation Guide.

Unit Mapping Information

This unit replaces and is equivalent to UETTDRT22 Establish and reinstate a power systems transmission structure work site.

Links

Companion Volume Implementation Guides are found in VETNet -

<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=229bace1-b7bc-4653-9300-dffb13ecfad7>

Assessment Requirements for UETDRT0003 Establish and reinstate a power systems transmission structure work site

Modification History

Release 1. This is the first release of this unit of competency in the UET Transmission, Distribution and Rail Sector Training Package Release 2.0.

Performance Evidence

Evidence required to demonstrate competence in this unit must be relevant to and satisfy all of the requirements of the elements and performance criteria on at least two separate occasions and include:

- applying relevant work health and safety (WHS)/occupational health and safety (OHS) requirements, including the use of risk control measures
- applying sustainable energy principles and practices
- using plans, drawings, maps/work schedules to define work to be completed, indicating WHS/OHS and environmental issues/hazards
- verifying qualifications to operate machinery and perform machinery daily log checks
- submitting Dial Before You Dig application forms
- verifying understanding of material safety data sheets (MSDS) and work permits
- undertaking appropriate traffic control management
- verifying an understanding of working safely with hazardous materials and equipment, safe manual handling techniques and correct use of personal protective equipment (PPE)
- operating safely at least five (5) of the following types of equipment/tools:
 - small generator sets
 - welding units
 - air compressors and hoses
 - pneumatic and/or electric hammers
 - rollers and compactors
 - concrete and ceramic cutters
 - pumps
 - post hole diggers
 - drills
- operating at least one (1) of the following pieces of equipment:
 - back hoes
 - earth drilling rigs
 - trench excavators
 - heavy vehicles
- dealing with unplanned events on at least one (1) occasion.

Knowledge Evidence

Evidence required to demonstrate competence in this unit must be relevant to and satisfy all of the requirements of the elements and performance criteria and include knowledge of:

- hand tools and their use encompassing:
 - hand tools for cutting, shaping, drilling, threading, tapping and finishing metallic and non-metallic components - types of tools and their purpose, techniques for the correct and safe use of these tools, hazards associated with their use, and care and maintenance of hand tools
 - tools for measuring and marking out - types of tools and their purpose, techniques for the correct and safe use of these tools, hazards associated with their use, and care and maintenance of hand tools
 - tools for dismantling and assembling electrical and electronic components - types of tools and their purpose, techniques for the correct and safe use of these tools, hazards associated with their use, and care and maintenance of hand tools
- fixed and portable tools and their use encompassing:
 - fixed power tools for cutting, shaping, drilling and finishing metallic and non-metallic components - types of tools and their purpose, techniques for the correct and safe use of these tools, hazards associated with their use, and care and maintenance of fixed power tools
 - portable power tools for cutting, shaping, drilling and structural components - types of tools and their purpose, techniques for the correct and safe use of these tools, hazards associated with their use, care and maintenance of fixed power tools, and requirements for use on construction sites
- materials properties encompassing:
 - identification and classification of engineering materials material properties
 - types and applications - properties of tensile strength; effects of temperature on the expansion of metals; ductility, malleability, work hardening and annealing; and the conditions that lead to corrosion and the properties of timbers
- requirements for the use of enterprise vehicles, such as trucks and four-wheel drives encompassing:
 - standards, codes, legislation, supply authority regulations and/or enterprise requirements associated with safe use of enterprise vehicles, including relevant certification and licensing, such as motor cars, light and heavy commercial trucks, heavy truck/trailer combination and four-wheel drive vehicles
 - compliance with regulations associated with the securing of loads prior for transportation
- requirements for the use of chainsaws, including relevant certification and licensing, encompassing:
 - safety precautions, requirements and responsibilities
 - selection and use of appropriate PPE
 - chainsaw operation - parts and function of components and ancillary equipment, pre-operational checks, starting procedures and safe use of chainsaw under load
 - safe transporting and storage procedures.

Assessment Conditions

Assessors must hold credentials specified within the Standards for Registered Training Organisations current at the time of assessment.

Assessment must satisfy the Principles of Assessment and Rules of Evidence and all regulatory requirements included within the Standards for Registered Training Organisations current at the time of assessment.

Assessment must occur in workplace operational situations where it is appropriate to do so; where this is not appropriate, assessment must occur in simulated conditions involving realistic and authentic activities that replicate operational workplace conditions.

Assessment processes and techniques must be appropriate to the language, literacy and numeracy requirements of the work being performed and the needs of the candidate.

Resources for assessment must include access to:

- a range of relevant exercises, case studies and/or other simulations
- relevant and appropriate materials, tools, equipment and PPE currently used in industry
- applicable documentation, including workplace procedures, equipment specifications, regulations, codes of practice and operation manuals.

Links

Companion Volume Implementation Guides are found in VETNet -

<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=229bace1-b7bc-4653-9300-dffb13ecfad7>