Australian Government

CPCCDE3022A Manage demolition recyclable and waste materials using load shifting equipment

Release 1

INDUSTRY SKILLS COUNCILS
Creating Australia's Future

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Modification History

New unit.
This version first released with CPC08 Construction, Plumbing and Services Training Package Version 9.

Unit Descriptor

This unit of competency specifies the outcomes required to organise the removal of different types of demolition recyclable and waste materials, including hazardous materials. It involves the operation of a range of load shifting equipment on demolition sites and incorporates knowledge of recyclable materials and the safe disposal of hazardous materials.

Application of the Unit

This unit of competency supports the role of demolition workers who manage and move recyclable and waste materials resulting from demolition work.

Licensing/Regulatory Information

Licensing, legislative, regulatory or certification requirements apply to demolition work in different States and Territories. Candidates are advised to consult with the relevant regulatory authorities.

Pre-Requisites

Nil

Employability Skills Information

This unit contains employability skills.

Elements and Performance Criteria Pre-Content

Elements describe the essential outcomes of a unit of competency.	Performance criteria describe the required performance needed to demonstrate achievement of the element. Where ***bold italicised*** text is used, further information is detailed in the required skills and knowledge and/or the range statement. Assessment of performance is to be consistent with the evidence guide.

Elements and Performance Criteria

1	Plan and prepare.	1.1	Work instructions are obtained using relevant ***information***, confirmed and applied to planning and preparation.
		1.2	***Work health and safety (WHS) requirements*** are identified and applied to task planning according to safety plans and policies.
		1.3	***Load shifting equipment***, associated attachments and ***emergency and personal protective equipment*** (PPE) are selected according to job requirements to maximise efficiency and effectiveness of transportation.
		1.4	Licence to operate specific plant is presented to relevant personnel for compliance inspection.
		1.5	***Potential hazards and risks*** are identified and dealt with according to workplace ***emergency response procedures*** and legislative requirements.
		1.6	Environmental requirements are identified and applied to work planning according to work site environmental plans, workplace requirements and regulatory obligations.
2	Perform routine checks on load shifting and other equipment.	2.1	Load shifting equipment is inspected and ***faults*** are dealt with or reported as required.
		2.2	Load shifting equipment systems are tested to ensure compliance with manufacturer specifications and organisational requirements.

		2.3	***Service checks*** are conducted in compliance with manufacturer specifications.
		2.4	Emergency and personal protective equipment is checked to ensure it is serviceable.
		2.5	Associated equipment is checked to ensure that it is operational and complies with manufacturer specifications.
3	Organise materials and equipment for loading.	3.1	Work site procedures for segregating and locating ***recyclable and waste demolition materials*** are confirmed with relevant personnel.
		3.2	Recyclable materials to be loaded are identified and checked to ensure integrity of on-site sorting, as required.
		3.3	Waste materials to be loaded are identified and checked to ensure ***integrity of containment***, as required.
		3.4	***Loading procedures*** are determined according to material or waste type and organisational and environmental requirements.
		3.5	Load shifting equipment is parked or set up in a loading position that ensures efficiency and safety of loading.
		3.6	Barriers and warning signs are erected at loading sites to ensure safety of surrounding personnel according to organisational requirements and requirements of relevant legislation.
4	Load and move materials.	4.1	Materials are loaded safely and efficiently according to type and using an approved loading method to maintain integrity.
		4.2	Visual checks of load and surrounding environment are maintained to identify and avoid, minimise or remedy potential hazards.
		4.3	Clear ***communication*** with relevant personnel is maintained.
		4.4	Load is checked to ensure it conforms to equipment capacity requirements, manufacturer specifications, and

			requirements of relevant legislation and codes.
		4.5	Equipment is operated and driven in a safe and efficient manner, according to organisational requirements, road and traffic regulations, and requirements of other legislation and codes.
		4.6	Materials are moved safely and securely according to organisational requirements, manufacturer specifications, and requirements of relevant legislation and codes.
5	Unload and store materials.	5.1	Materials are unloaded safely and efficiently in designated area according to type and using an approved unloading method to maintain integrity.
		5.2	Visual checks are maintained to identify and remedy potential hazards during unloading.
		5.3	Load is stacked or housed at destination according to organisational requirements, manufacturer specifications, and requirements of relevant legislation and codes.
6	Shut down and secure load shifting equipment.	6.1	Equipment is parked or stored in a safe location to avoid damage to equipment or obstruction of surrounding site activity.
		6.2	Shut-down procedures are completed according to manufacturer specifications and organisational requirements.
		6.3	Equipment is secured and stored in a manner that prevents unauthorised access or use.
7	Carry out basic housekeeping and maintenance	7.1	***Equipment is cleaned*** to remove debris and contamination and to ensure safe operating procedures.
		7.2	***Service checks*** are conducted according to manufacturer specifications.
		7.3	Equipment faults and defects are reported to relevant personnel.
		7.4	Record of moving activities is completed promptly and

according to organisational requirements.

Required Skills and Knowledge

This section describes the skills and knowledge required for this unit.

Required skills

- learning skills to:
  - evaluate own actions and make judgements about performance and necessary improvements
  - respond to change, such as differences in current work site environmental and sustainability requirements
- numeracy skills to:
  - estimate the weight of volumes of demolition debris
  - perform measurements and calculations associated with work, such as determining maximum load capacity of equipment
- oral communication skills to:
  - enable clear and direct communication, using questioning to identify and confirm requirements, and share information
  - report hazards on the work site, including faults in equipment
  - use language and concepts appropriate to cultural differences
- reading skills to:
  - interpret documentation, including route maps
  - understand written instructions, procedures and signage
- writing skills to complete pre-operational checklists and equipment fault forms

Required knowledge

- compliance requirements for handling and transporting materials, which include dangerous goods and hazardous substances
- driving procedures for different types of load shifting equipment, including:
  - licence requirements
  - map reading
  - road laws
- hazards and risks associated with handling and transporting materials and management strategies, including:
  - emergency response procedures
  - hierarchy of control
- manual and mechanical loading and unloading methods
- types of loading equipment, including equipment load weight requirements

Evidence Guide

The evidence guide provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge, range statement and the Assessment Guidelines for the Training Package.

Overview of assessment

This unit of competency could be assessed by observation of practical demonstration in the workplace using load shifting equipment.

Critical aspects for assessment and evidence required to demonstrate competency in this unit

A person should demonstrate the ability to:

- manage and move a range of demolition recyclable and waste materials in two different contexts, using relevant combinations of the following types of equipment:
  - dozers
  - earthmoving equipment
  - forklifts
  - loaders:
    - front-end
    - rear-end
    - tailgate
  - trucks:
    - articulated trucks
    - open-bodied, including hook lift, pump, and vacuum
    - rigid
  - windrow turners
- locate, interpret and apply relevant information, standards and specifications relating to the management of demolition recyclable and waste materials
- comply with site safety plan and requirements of WHS legislation, regulations and codes of practice applicable to workplace operations
- comply with organisational policies and procedures, including quality requirements
- communicate and work effectively and safely with others
- follow work instructions, operating procedures and inspection practices to safely and effectively use the load shifting equipment listed above for their appropriate application, ensuring:
  - there is no damage to tools or equipment or injury to persons
  - all work is completed to specification
- compliance with regulations, standards and organisational quality procedures and processes.

Context of and specific resources for assessment

Assessment of this unit:

- must be in the context of the work environment
- must meet relevant compliance requirements.

Resource implications for assessment include:

- an induction procedure
- realistic tasks covering the mandatory task requirements
- relevant specifications and work instructions
- tools and equipment as listed appropriate to applying safe work practices
- support materials appropriate to activity
- workplace instructions relating to safe work practices and addressing hazards and emergencies
- information relevant to each task, such as safety data sheets, work plans and approved specifications, forms and procedures manuals.

Method of assessment

Assessment for this unit must verify the practical application of the required skills and knowledge, using a combination of the following methods:

- direct observation of tasks
- questioning to confirm the ability to consistently identify and correctly interpret the essential underpinning knowledge required for practical application
- review of relevant authenticated documentation from third parties, such as existing supervisors, team leaders or specialist training staff.

Guidance information for assessment

This unit could be assessed on its own or in combination with other units relevant to the job function.

Reasonable adjustments for people with disabilities must be made to assessment processes where required. This could include access to modified equipment and other physical resources, and the provision of appropriate assessment support.

Assessment processes and techniques should, as far as is practical, take into account the language, literacy and numeracy capacity of the candidate in relation to the competency being assessed.

Range Statement

The range statement relates to the unit of competency as a whole. It allows for different work environments and situations that may affect performance. ***Bold italicised*** wording, if used in the performance criteria, is detailed below. Essential operating conditions that may be present

with training and assessment (depending on the work situation, needs of the candidate, accessibility of the item, and local industry and regional contexts) may also be included.

Information may include:

- advice and guidelines relating to regulatory and legislative requirements, including:
  - Australian Code for the Transport of Dangerous Goods by Road and Rail
  - commonwealth, state and territory legislation, including:
    - environmental protection
    - trade practices
    - road laws
- current Australian standards relating to managing and moving demolition materials
- instructions issued by authorised organisational or external personnel
- job routes and sequences
- materials and waste types, classifications, characteristics and transport requirements
- quality requirements relating to the management of demolition recyclable and waste materials
- safe work method statements and procedures for managing and moving demolition materials and waste
- safety data sheets
- signage
- site contact
- site requirements
- vehicle and associated equipment requirements
- work schedules, plans and specifications.

Work health and safety requirements must comply with state or territory legislation and regulations and demolition project safety plan and may include:

- emergency procedures, including extinguishing fires, organisational first aid requirements, and evacuation procedures
- manual handling activities that may require the assistance of others or the use of manual or mechanical lifting devices where size, weight or other issues, such as a disability are a factor
- hazard control
- identification of hazardous materials and substances and relevant safe handling or quarantining procedures for each, including:
  - animal residue
  - asbestos
  - dust
  - lead
  - lead-based paints

- pesticide residue
- use of safe operating procedures, including operational risk assessment and treatments associated with:
  - equipment tagging
  - fall protection
  - identification and preparation of access and egress points
  - identification of equipment guarding and cut-off switches
  - lighting
  - power cables, including overhead service trays, cables and conduits
  - restricted access barriers
  - surrounding structures
  - traffic control
  - trip hazards
  - work site visitors and the public
  - working at heights
  - working in confined spaces
  - working in proximity to others.

Load shifting equipment may include:

- dozers
- earthmoving equipment
- forklifts
- loaders:
  - front-end
  - rear-end
  - tailgate
- trucks, including:
  - articulated
  - open-bodied, including:
    - hook lift
    - pump
    - vacuum
  - rigid
- windrow turners.

Emergency and personal protective equipment:

- must include:
  - communications equipment
  - eye protection, such as goggles and protective glasses
  - eyewash kit
  - fire extinguishers
  - first aid kit
  - footwear

- gloves
- overalls and protective clothing

- may include:
  - breathing apparatus
  - emergency procedure guides
  - face shields or masks
  - hard hats
  - hearing protection
  - safety data sheets
  - spill kit
- personal protective equipment must be:
  - cleaned and fitted according to organisational requirements, manufacturer specifications and WHS requirements
  - worn when required according to organisational requirements
  - stored according to organisational requirements.

Potential hazards and risks:

- may include:
  - broken glass
  - broken metal
  - compaction equipment
  - contamination
  - dust
  - fire
  - gases and fumes
  - hazardous waste
  - narrow driveways
  - other vehicles and equipment
  - overhanging signs
  - projectiles
  - spark-producing equipment
  - unguarded conveyor belts
  - weather
- may cause:
  - damage to plant, vehicle or property
  - harm to the environment
  - illness or injury to employees, contractors or the public
  - injuries resulting from manual handling and repetitive work.

Emergency response

- cleaning up

procedures may include:
- containing emergency
- isolating or shutting down equipment or plant
- evacuation
- first aid
- making site safe
- notifying authorities
- using PPE.

Faults in load shifting equipment may include:
- component wear or damage
- leaks
- obstructions.

Service checks may include:
- ensuring that the following are maintained at designated levels:
  - air pressure
  - fuel
  - greasing
  - oil
  - water.

Recyclable and waste demolition materials may include:
- recyclable materials, such as:
  - bricks
  - concrete
  - copper wiring
  - glass
  - masonry
  - metal
  - polyvinyl chloride (PVC) pipe
  - timber
- waste materials, including:
  - hazardous:
    - medical and clinical
    - prescribed
    - quarantined
    - regulated
  - non-hazardous solid and liquid waste.

Integrity of containment may include checks for:
- contamination
- drum expansion
- gases
- leaching
- leaks
- seals
- spillage

Loading procedures may involve:	• unstable form. • cart lifter • forklift • front-end loader • high pressure vacuum loading • loading by hand • shovelling.

Communication may include:	• non-verbal communication, such as:
	  • flagging
	  • hand signals
	  • SMS
	• verbal communication, which may be conducted using:
	  • radio
	  • telephone.

Cleaning of equipment may include:	• high pressure water or air-hosing • shovelling • sweeping out • using cleaning and decontamination products • vacuuming.

Unit Sector(s)

Demolition

Custom Content Section

Not applicable.