



Australian Government

RIICRC302E Place and form concrete kerb, channel and fixtures

Release: 1

RIICRC302E Place and form concrete kerb, channel and fixtures

Modification History

Release	Comments
Release 1	This version first released with RII Resources and Infrastructure Industry Training Package Version 6.0.

Application

This unit describes the skills and knowledge required to place and form concrete kerb, channel and fixtures in civil construction. It includes forming kerb and median and barrier strips, installing formwork and repairing kerb, gutters and median and barrier strips.

It applies to those working in operational roles. They generally work under minimal supervision to undertake a broad range of tasks in varied work contexts, using some discretion and judgement in selecting equipment, services or contingency measures.

Licensing, legislative and certification requirements that apply to this unit can vary between states, territories and industry sectors. Users must check requirements with relevant body before applying the unit.

Unit Sector

Civil construction

Elements and Performance Criteria

ELEMENT	PERFORMANCE CRITERIA
<i>Elements describe the essential outcomes.</i>	<i>Performance criteria describe the performance needed to demonstrate achievement of the element.</i>
1. Plan and prepare to place and form concrete kerb, channel and fixtures	1.1 Obtain, interpret, clarify and confirm work requirements 1.2 Access, interpret and apply documentation required to place and form concrete kerb, channel and fixtures and confirm work activity is compliant 1.3 Identify and address potential risks, hazards and environmental issues, and implement control measures 1.4 Select and wear personal protective equipment according to site requirements
2. Set out and prepare for construction or	2.1 Identify and protect existing services from damage according to site requirements

ELEMENT	PERFORMANCE CRITERIA
installation	2.2 Set out location of kerb, channel and/or fixtures to dimensions according to job requirements or to pre-set pegs 2.3 Set out driveways and other required inverts 2.4 Check grades and confirm specified fall according to job requirements 2.5 Construct formwork and check and confirm against job requirements 2.6 Complete services and conduit preparation according to site requirements
3. Form kerb and barrier strips	3.1 Place concrete to string line and maintain vertical and horizontal alignment 3.2 Maintain concrete according to job requirements 3.3 Mix and apply mortar at quality and quantity to achieve specified finish according to job requirements
4. Pour concrete to installed formwork	4.1 Place and compact concrete into formwork 4.2 Finish surface to specified alignment according to job requirements 4.3 Remove face formwork without damage to concrete
5. Finish kerbs, channels and fixtures	5.1 Finish job to shape according to job requirements 5.2 Finish concrete to specified quality and texture according to job requirements 5.3 Position expansion, construction and dowel joints according to job requirements 5.4 Cure and protect finished work
6. Install pre-cast concrete units	6.1 Prepare base section and finish for pre-cast unit installation according to job requirements 6.2 Install and join pre-cast concrete units according to job requirements
7. Repair kerb, gutters and median and barrier strips	7.1 Identify damaged areas, assess repair requirements and remove or repair damaged section according to job requirements 7.2 Set up formwork or slip form machine and use to replace removed section according to job requirements 7.3 Place concrete to alignment using concrete to specified mix according to job requirements 7.4 Finish concrete to specification and match kerb shape of kerb or gutter in place according to job requirements 7.5 Clear, backfill and finish area according to site requirements
8. Conduct clean-up activities	8.1 Clear work area and dispose of or recycle materials according to site requirements 8.2 Clean, maintain, check and store tools and equipment according to

ELEMENT	PERFORMANCE CRITERIA
	manufacturer specifications and site requirements

Foundation Skills

This section describes those language, literacy, numeracy and employment skills that are essential to performance but not explicit in the performance criteria.

SKILL	DESCRIPTION
Numeracy	Calculates basic measurements including mass and dimensions
Self-management	Monitors and minimises own exposure to worksite risks and hazards during work activities

Unit Mapping Information

Supersedes and is equivalent to RIICRC302D Place and form concrete kerb, channel and fixtures

Links

Companion Volume Implementation Guide is found on VETNet -

<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=88a61002-9a21-4386-aaf8-69c76e675272>

Assessment Requirements for RIICRC302E Place and form concrete kerb, channel and fixtures

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Performance Evidence

The candidate must demonstrate the ability to complete the tasks outlined in the elements, performance criteria and foundation skills of this unit, including evidence of the ability to:

- place and form concrete kerb, channel and fixtures on at least two occasions, including:
 - setting out and preparing for construction or installation according to drawings and specifications requirements
 - forming kerb and barrier strips by placing concrete and applying mortar to specifications
 - pouring concrete into installed formwork
 - finishing kerbs, channels and fixtures
 - installing pre-cast concrete units and finishing to specifications
 - repairing kerb, gutters and median and barrier strips
 - clearing, backfilling and finishing work areas
 - clearing work area and disposing of, recycling or storing materials.

During the above, the candidate must:

- locate and apply required documentation, policies and procedures and confirm work activity is compliant
- implement the requirements, procedures and techniques to place and form concrete kerbs, channels and fixtures, including:
 - identifying and applying relevant drawings and job specifications to all work activities
 - identifying, addressing and reporting potential hazards and risks
 - identifying, obtaining, confirming and implementing signage requirements
 - selecting and checking for faults all plant, tools and equipment required to carry out tasks
 - identifying, addressing and reporting environmental issues and ground conditions
- work with others to place and form concrete kerbs, channels and fixtures in a way that meets required outcomes, including:

- preparing for and organising work activities to meet task requirements
- communicating with others to receive and clarify work instructions
- using communication techniques and aids to advise others of work activity and exclusion zones
- monitoring hazards and identifying and communicating changes to work environment.

Knowledge Evidence

The candidate must be able to demonstrate knowledge to complete the tasks outlined in the elements, performance criteria and foundation skills of this unit, including knowledge of:

- legislation required to place and form concrete kerb, channel and fixtures
- policies, procedures and documentation required to place and form concrete kerb, channel and fixtures, including those relating to:
 - Australian Standards required for kerbs, channels and fixtures
 - site requirements
 - manufacturer specifications for required plant and equipment
 - relevant drawings and job specifications
 - hazard and risk management
 - environmental protection and ground conditions
 - work activity set up procedures
 - project quality requirements
 - communication techniques and aids
 - site isolation and traffic control responsibilities
 - work health and safety
 - waste management
- types, characteristics, technical capabilities and limitations of equipment required to place and form concrete kerb, channel and fixtures
- principles and techniques for effective concrete kerb, channel and fixtures placement and formation, including:
 - gutters
 - median and barrier strips
 - driveways
 - inverts
 - techniques for installing formwork
 - kerb, channel and fixture repair techniques.

Assessment Conditions

Mandatory conditions for assessment of this unit are stipulated below. The assessment must:

- include access to:
 - personal protective equipment

- equipment required to place and form concrete kerb, channel and fixtures
- be conducted in a safe environment; and,
- be assessed in the context of this sector's work environment; and,
- be assessed in compliance with relevant legislation/regulation and using policies, procedures and processes directly related to the industry sector for which it is being assessed; and,
- confirm consistent performance can be applied in a range of relevant workplace circumstances.

Where personal safety or environmental damage are limiting factors, assessment may occur in a simulated work environment* provided it is realistic and sufficiently rigorous to cover all aspects of this sector's workplace performance, including environment, task skills, task management skills, contingency management skills and job role environment skills.

• **Assessor requirements**

Assessors must be able to clearly demonstrate current and relevant industry knowledge and experience to satisfy the mandatory regulatory standards as set out in the Standards for Registered Training Organisations (RTOs) 2015/Australian Quality Training Framework mandatory requirements for assessors current at the time of assessment and any relevant licensing and certification requirements. This includes:

- vocational competencies at least to the level being delivered and assessed
- current industry skills directly relevant to the training and assessment being provided
- current knowledge and skills in vocational training and learning that informs their training and assessment
- formal relevant qualifications in training and assessment
- having knowledge of and/or experience using the latest techniques and processes
- possessing the required level of RII training product knowledge
- having an understanding and knowledge of legislation and regulations relevant to the industry and to employment and workplaces
- demonstrating the performance evidence, and knowledge evidence outlined in this unit of competency, and
- the minimum years of current** work experience after competency has been obtained as specified below in an industry sector relevant to the outcomes of the unit.

It is also acceptable for the appropriately qualified assessor to work with an industry expert to conduct assessment together and for the industry expert to be involved in the assessment judgement. The industry expert must have current industry skills directly relevant to the training and assessment being provided. This means the industry subject matter expert must demonstrate skills and knowledge from the minimum years of current work experience after competency has been obtained as specified below, including time spent in roles related to the unit being assessed:

Industry sector	AQF indicator level***	Required assessor or industry subject matter expert experience
Drilling, Metalliferous	1	1 year

Mining, Coal Mining, Extractive (Quarrying) and Civil Infrastructure	2	2 years
Drilling, Coal Mining, Extractive (Quarrying), Metalliferous Mining and Civil Infrastructure	3-6	3 years
Other sectors	Where this unit is being assessed outside of the resources and infrastructure sectors assessor and/or industry subject matter expert experience should be in-line with industry standards for the sector in which it is being assessed and where no industry standard is specified should comply with any relevant regulation.	

*Guidance on simulated environments has been stipulated in the Companion Volume Implementation Guide located on VETNet.

**Assessors can demonstrate current work experience through employment within industry in a role relevant to the outcomes of the unit; or, for external assessors this can be demonstrated through exposure to industry by conducting a minimum number of site assessments as determined by the relevant industry sector, across various locations.

*** While a unit of competency does not have an AQF level, where a unit is being delivered outside of a qualification the first numeric character in the unit code should be considered as the AQF indicator level for assessment purposes.

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