



Australian Government

CPCCT3021 Restore stone work

Release: 2

CPC CST3021 Restore stone work

Modification History

- Release 2 Updated reference to general construction induction training program.
- Release 1 This version first released with CPC Construction, Plumbing and Services Training Package Release 5.0.
- Supersedes and is equivalent to CPC CST3021A Renovate and restore stone work. Updated to meet the Standards for Training Packages 2012.

Application

This unit specifies the skills and knowledge required to restore stonework. It includes preparing and positioning new stone and reproducing decorative stone.

This unit applies to stonemasons who work independently or in a team to restore stone relating to stonemasonry work in a workshop setting, on a new or existing structure.

A person working at this level would be expected to take responsibility for organising and completing tasks assigned to them without needing close supervision.

Completion of the general construction induction training program specified by the model Code of Practice for Construction Work is required for any person who is to carry out construction work. Achievement of *CPCWHS1001 Prepare to work safely in the construction industry* meets this requirement.

No licensing, legislative or certification requirements apply to this unit at the time of publication.

Pre-requisite Unit

CPCWHS2001 Apply WHS requirements, policies and procedures in the construction industry

Unit Sector

Stonemasonry

Elements and Performance Criteria

Elements describe the essential outcomes.

Performance criteria describe what needs to be done to demonstrate achievement of the element.

- | | |
|---------------------|--|
| 1 Plan and prepare. | 1.1 Read, interpret and apply stone work renovation and restoration requirements from work instructions, current |
|---------------------|--|

- plans, specifications, standards and codes.
- 1.2 Follow relevant information from workplace procedures and workplace safety and environmental documentation.
 - 1.3 Calculate material and product quantities required for the task.
 - 1.4 Determine job priorities and sequence job tasks in consultation with others on site.
 - 1.5 Identify potential hazards and determine and implement control measures.
 - 1.6 Select and check condition of plant, equipment and tools and report damage or faults to relevant personnel.
 - 1.7 Check conformity of materials against the job requirements.
- 2 Access and remove damaged stonework.
- 2.1 Select, fit correctly and use personal protective equipment (PPE) appropriate for job.
 - 2.2 Identify location and dimension of damaged stonework from job drawings.
 - 2.3 Determine the extent of damage and scale of repair required.
 - 2.4 Cut out damaged section accurately without damage or collapse to surrounding stone.
 - 2.5 Remove and dispose of waste materials.
- 3 Prepare replacement stone.
- 3.1 Match colour and type of existing stone, seek advice if sourced stone is not compliant.
 - 3.2 Measure profile dimensions of damaged stone and make templates.
 - 3.3 Prepare replacement stone to accurately match dimensions and profile of removed stone.
- 4 Fix replacement stone.
- 4.1 Prepare stone for fixing using a slotted, doweled or

- bracket method.
- 4.2 Handle and raise stone into position for placement.
 - 4.3 Place and fix stone into exact position and bed stone using adhesive or mortar.
 - 4.4 Fill bed and perpendicular joints with mortar or sealant.
 - 4.5 Clean stonework using dry, liquid or chemical method.
- 5 Reproduce decorative carving work.
- 5.1 Make templates to match damaged decorative stone carving.
 - 5.2 Select stone to match colour and grain of existing stone.
 - 5.3 Apply and mark carving templates to stone to show bulk areas to be removed.
 - 5.4 Remove bulk areas of stone to allow for pattern marking.
 - 5.5 Reapply carving template, mark details and use appropriate methods to complete stone carving.
 - 5.6 Place, fix and bed decorative carved stone and inspect for quality of finish.
- 6 Clean up.
- 6.1 Clear the work area, and dispose of, reuse or recycle materials following workplace and environmental requirements.
 - 6.2 Clean tools and equipment, check for serviceability and report damage or faults.
 - 6.3 Store and secure tools and equipment following workplace procedures.

Foundation Skills

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

Unit Mapping Information

Supersedes and is equivalent to CPC CST3021A Renovate and restore stone work

Links

Companion volumes to this training package are available at the VETNet website -
<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=7e15fa6a-68b8-4097-b099-030a5569b1ad>

Assessment Requirements for CPCST3021 Restore stone work

Modification History

- Release 2 Updated reference to general construction induction training program.
- Release 1 This version first released with CPC Construction, Plumbing and Services Training Package Release 5.0.
- Supersedes and is equivalent to CPCST3021A Renovate and restore stone work. Updated to meet the Standards for Training Packages 2012.

Performance Evidence

To demonstrate competency in this unit, a candidate must meet the performance criteria of this unit by restoring stone work.

In doing this, the candidate must:

- remove and replace a minimum of two damaged stones varying in shape with a minimum size 300 mm x 300 mm x 200 mm
- reproduce one flora and one fauna decorative carving on the face of a minimum of 250 mm x 300 mm stone.

Knowledge Evidence

To be competent in this unit, a person must demonstrate knowledge of:

- characteristics, applications and limitations of materials used for restoring stone work
- processes and techniques for restoring stone work:
 - effective removal of damaged stone with no effect on surrounding work
 - reproducing stone face and decorative stone
 - preparing, mixing and using mortars and compounds
 - finishing and cleaning stonework
- construction terminology relating to restoring stone
- functional and operational features of plant, equipment and tools used in restoring stonework:
 - cranes
 - elevated work platforms (EWP)
 - fork lifts
 - load slinging
 - gin poles
 - compressors
 - materials hoist

- power drills
- power grinders
- battery operated tools
- scaffolding
- workplace processes and procedures
- workplace safety:
 - exposure to silica
 - job safety and environmental analysis (JSEA)
 - hazardous manual tasks
 - exposure to excessive noise
 - work at heights
 - operating lifting and lowering equipment
- features of working drawings and specifications
- environmental requirements for workplace processes and waste disposal
- relevant regulations, standards and codes relating to restoring stone:
 - Heritage Act
 - Heritage Building Classifications
 - The Burra Charter
- digital technology to source information and communicate with others.

Assessment Conditions

Assessors must meet the requirements for assessors contained in the Standards for Registered Training Organisations.

This unit must be assessed in the workplace or a close simulation reflecting workplace conditions and standards, materials, equipment, activities, responsibilities, procedures, safety requirements and environmental considerations.

Links

Companion volumes to this training package are available at the VETNet website -
<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=7e15fa6a-68b8-4097-b099-030a5569b1ad>