



**Australian Government**

# **Assessment Requirements for CPPSSI5046 Set out roads and stormwater systems**

**Release: 1**

# Assessment Requirements for CPPSSI5046 Set out roads and stormwater systems

## Modification History

Release 1 This version first released with CPP Property Services Training Package Release 12.0.

This unit supersedes and is not equivalent to CPPSIS5046 Set out stormwater systems.

## Performance Evidence

To demonstrate competency a candidate must meet the elements and performance criteria of this unit by setting out two different projects:

- one project that sets out a stormwater system and associated engineering structures
- one project that includes road set-out.

For each project, the candidate must set out marks and lines to define the position and level of design points on site using two of the following pieces of equipment:

- total station
- global navigation satellite system (GNSS)
- level
- hand-held laser measuring device.

## Knowledge Evidence

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

- types of stormwater systems and their purposes
- types and features of roads
- graphical information in plans, drawings and contour maps
- reference and coordinate systems for surveying data, including Australian Height Datum and Map Grid of Australia.
- types of pegs and markers used during set-out and methods for optimal placement on site
- mathematical concepts relating to algebra, trigonometry and geometry relevant to calculating spatial measurements for roads and stormwater systems
- methods for calculating surveying data and verifying its accuracy using primary and secondary controls
- methods for calculating fall of land and volume
- purpose of primary and secondary controls for set-out
- methods for establishing a control network that meets specified tolerances

- methods for setting up, levelling and checking calibration of equipment used to set out road and stormwater systems
- methods for recording spatial data relating to set-out
- industry-accepted tolerances for accuracy relevant to roads and stormwater systems.

## **Assessment Conditions**

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

Competency is to be assessed in the workplace or a simulated environment that accurately reflects performance in a real workplace setting where these skills and knowledge would be performed.

Candidates must have access to:

- personal protective equipment (PPE)
- task specifications, drawings, maps and plans
- surveying equipment.

## **Links**

Companion volumes to this training package are available at the VETNet website - <https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=6f3f9672-30e8-4835-b348-205dfcf13d9b>