



Tower crane certificates

New certification requirements for self-erecting tower cranes take effect from 1 January 2006:

- There are two separate certificates for operating tower cranes (CT) and self-erecting tower cranes (CS).
- Existing holders of tower crane certificates (CT) who are operating self-erecting tower cranes will have until 1 July 2007 to obtain the new self-erecting tower crane certificate (CS)

What is a tower crane?

Description of tower crane

Existing and interstate certificates

existing certificates have no expiry date, recognition of interstate certificates

How to obtain a certificate

On the job training, training through a provider

Assessment

Practical skills performance assessment, written assessment, knowledge assessment

What is a tower crane?

A **tower crane** is a jib or boom crane mounted on a tower structure, demountable or permanent, including both horizontal and luffing jib types.

To be **competent to operate a crane** the person should be able to:

1. Assess and secure equipment and work area
2. Secure and transfer load
3. Set up and dismantle mobile or tower cranes
4. Carry out special operations with mobile or tower cranes

Existing and interstate certificates

Certificates can also be known as certificates or certificates of authority.

Existing certificate holders

Interstate certificates

Existing certificate holders

Existing Queensland certificate holders for dogging, rigging, scaffolding, pressure equipment and crane and hoist operation can continue working in Queensland within the scope of their certificate without the need to obtain a new certificate. There is no requirement to renew your certificate as there is no expiry date.

However, holders of tower crane certificates (CT) who are operating self-erecting tower cranes will have until 1 July 2007 to obtain the new self-erecting tower crane certificate (CS).

Interstate certificates

The National Occupational Health and Safety Certification Standard for Users and Operators of Industrial Equipment (NOHSC: 1006) provides consistent guidelines all jurisdictions in Australia must adhere to when certifying (i.e. testing and issuing certificates) users and operators of industrial equipment.

National certificates for dogging, rigging, scaffolding, pressure equipment and crane and hoist operation are recognised throughout Australia. Certificates for loadshifting equipment operation are not issued in all States and Territories with the exception of forklift trucks and order picking forklift trucks. However, if you have a certificate issued from Queensland you are entitled to use it within any other State or Territory of Australia.

For example, if you have a certificate issued by the State of NSW this will be recognised within Queensland and the holder of the certificate will not be required to be re-tested or have to apply to Workplace Health and Safety Queensland for a re-issue of a Queensland operators certificate.

How to obtain a certificate

There are two methods you can follow to obtain your certificate:

- On the job training and assessment by an accredited provider
- Training and assessment by a Registered Training Organisation (RTO)

From **1 January 2006** you can only be assessed by an accredited provider.

From **1 July 2006** you can be assessed by either a Registered Training Organisation or an accredited provider.

From **1 July 2007** only Registered Training Organisations will be authorised to conduct the assessments.

On the job training and assessment by an accredited provider

1. Acquire on the job training with a qualified certificated person for the chosen prescribed occupation.
2. Ensure that the person you are receiving on the job training with possesses the relevant certificate.
3. If you are training on a construction worksite it is mandatory to undertake and complete the construction safety induction course.
4. Maintain a training log book or similar record of on the job training.
5. Arrange for an assessment with an accredited provider. They will confirm the appointment prior to an assessment with you (i.e. date, time and location of where assessment is to take place).
6. A lists of assessors (accredited providers) in your area is available by contacting a Workplace Health and Safety Queensland Office on 1300 369 915.
7. You will be required to provide evidence of your identity (usually a drivers licence) to the accredited provider.
8. You should read the provided assessment instrument tool and specific instructions for the relevant prescribed occupation/certificate before beginning an assessment.

Training and assessment by an RTO

1. Approach a plant operator training school who is an RTO or another RTO that can provide the relevant training to obtain experience in operating plant for the chosen prescribed occupation.
2. You should check with National Technical Information Service (NTIS) that the RTO you are considering undertaking training with has the scope of registration to deliver the appropriate accredited training.
3. You will be required to maintain a training log book provided by the RTO or similar record of the experience you have acquired.

4. After undertaking the appropriate training and you have received on the job experience, the RTO will arrange the assessment.
5. You will be required to provide evidence of your identity (usually a drivers licence) to the RTO.
6. The RTO will assist you with completing the application for a certificate and will process the application on your behalf.

Assessment

There are three parts to an assessment/test that you will need to pass in order to receive your certificate.

1. Practical skills performance assessment
Tests applicants skills in pre-operational checks, site/job planning, start up crane, operate crane and shut down crane.
2. Written assignment
Evaluates the applicant's conceptual understanding of slings, sheaves and drums, rope terminations, anchors and attachments, operational manual, load assessment and load charts.
3. Knowledge assessment
Tests applicants knowledge in pre-operational checks, site/job planning, start up crane, operate crane and shut down crane.

Practical skills performance assessment

The practical skills performance assessment is one of three assessments which you must pass to qualify for a tower crane certificate. The other components are a knowledge assessment and a written assignment.

What does the test cover?

The practical skills performance assessment for tower cranes covers five sections:

- Section 1: Pre-operational checks
- Section 2: Start up crane
- Section 3: Operate crane
- Section 4: Shut down crane
- Section 5: Set up and dismantle crane
- Section 6: Special operations

Further details of the knowledge and skills required to complete assessment are available in the unit of competency to Operate a tower crane (PDF, 101 KB).

How does the assessor evaluate me?

In this assessment the assessor will complete a performance checklist as you undertake each allocated task.

The assessor has the right to stop the assessment at any time if you endanger yourself or any other person.

Where does the test take place?

The practical skills assessment can be conducted at any location which has:

- sufficient clear space to operate freely without obstruction
- no interference from nearby operations

Written assignment assessment

The written assignment is one of three assessments which you must pass to qualify for a crane certificate. The other components are a knowledge assessment and a practical skills performance assessment.

The written assignment document covers the following cranes:

- tower cranes
- derrick cranes
- portal boom cranes
- bridge and gantry cranes
- vehicle loading cranes
- non-slewing mobile cranes
- slewing mobile cranes (up to 20, 60, 100 and over 100 tonnes)

Further details of the knowledge and skills required to complete assessment are available in the unit of competency to Operate a tower crane (PDF, 101 KB).

What does the test cover?

In the written assignment the assessor evaluates your underpinning knowledge in a 'closed book' examination over 6 sections.

To pass the assignment, you must satisfactorily complete each of the following sections:

- Section 1: Slings
- Section 2: Sheaves and drums
- Section 3: Rope terminations, anchors and attachments
- Section 4: Operational manual
- Section 5: Load assessment
- Section 6: Load charts

How does the assessor evaluate me?

The written assignment can take up to 1 hour to complete.

To satisfy the requirements for competency you must correctly answer (either in writing or orally) all critical questions and 75% of the non-critical questions from each area.

Where does the test take place?

The written assignment assessment can be conducted at any location such as:

- your workplace

- at a training organisation or
- any other suitable location

Knowledge assessment

The knowledge assessment is one of three assessments which you must pass to qualify for a tower crane certificate. The other components are a written assignment and a practical skills performance assessment.

What does the test cover?

In the knowledge assessment the assessor evaluates your knowledge in a 'closed book' short answer examination over five sections:

- Section 1: Pre-operational checks
- Section 2: Start up crane
- Section 3: Site/job planning
- Section 4: Operate crane
- Section 5: Shut down crane
- Section 6: Set up and dismantle crane
- Section 7: Special operations

Further details of the knowledge and skills required to complete assessment are available in the unit of competency to Operate a tower crane (PDF, 101 KB).

How does the assessor evaluate me?

To pass the assessment, you must correctly answer (either in writing or orally) a majority of the randomly selected questions in each of the seven sections.

There are total of 70 questions, with 18 compulsory questions. Compulsory questions have part or all of the answers identified as critical. All critical components must be answered correctly, and at least 75% of other components answered correctly, for you to be assessed as competent.

How is the test carried out?

There are two ways in which the knowledge assessment can be conducted:

- **Written examination** - where this method is used, you must be given the chance to be orally assessed on any questions which are not completed in writing.
- **Oral examination** - where this method is used, the assessor will enter your answers on to the examination paper.

Where does the test take place?

The written assignment assessment can be conducted at any location such as:

- your workplace

- at a training organisation or
- any other suitable location

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