

Title	Commission mechanical engineering machinery or plant		
Level	5	Credits	15

Purpose	People credited with this standard are able to: prepare for commissioning and commission machinery or plant.
----------------	--

Classification	Mechanical Engineering > Mechanical Commissioning
-----------------------	---

Available grade	Achieved
------------------------	----------

Entry information	
Recommended skills and knowledge	Previously acquired skills in machine installation including assembly and fitting of engineering components, levelling, alignment, and measurement; and hold Unit 2390, <i>Install industrial machines</i> , or demonstrate equivalent knowledge and skills.

Explanatory notes

1 References

Health and Safety at Work Act 2015 and supporting regulations.

Guidelines for Guarding Principles and General Safety for Machinery. Wellington: Occupational Safety and Health Service, Department of Labour, 1995. Available at: <http://www.eat.worksafe.govt.nz/worksafe/information-guidance/all-guidance-items/machinery-guidelines-for-guarding-principles-and-general-safety-for/machin-g.pdf>.

2 Definitions

Accepted industry practice refers to approved codes of practice and standardised procedures accepted by the wider mechanical engineering industry sectors as examples of best practice.

Ancillary services – services required for the proper operation of the machines such as electricity supply, hydraulics, pneumatics, raw material flow, water, drainage, lighting, and ventilation.

Job specifications – instructions relevant to the safe completion of a specific task, such as technical specifications, assembly instructions, drawings, parts lists, material specifications, standards, codes of practice, test and commissioning procedures, and verbal instructions.

Plant – rotating equipment and machinery such as pumps, blowers, compressors, drive units, production equipment, process equipment, and machine tools.

Workplace procedures refer to procedures used by the organisation carrying out the work and applicable to the tasks being carried out. They may include but are not limited to – standard operating procedures, safety procedures, equipment operating

procedures, codes of practice, quality management practices and standards, procedures to comply with legislative and local body requirements.

3 Range

Evidence of two commissioning projects is required.

4 The following apply to this unit standard:

- a All activities must comply with applicable workplace procedures and must be consistent with accepted industry practice.
- b All activities must be completed independently and reported within reasonable timeframes.

Outcomes and evidence requirements

Outcome 1

Prepare for commissioning of machinery or plant.

Evidence requirements

- 1.1 Job specifications are analysed to determine commissioning requirements.
- 1.2 Installation results of individual machines or plant are reviewed against specifications and any discrepancies rectified.
- 1.3 Ancillary services are confirmed as being operational.
- 1.4 Safety and environmental issues are identified and managed.
- 1.5 Appropriate personnel are advised of commissioning schedule, and all necessary authorisations are obtained.

Outcome 2

Commission machinery or plant.

Evidence requirements

- 2.1 Commissioning process is undertaken in accordance with job specifications.
- 2.2 Performance of machinery or plant is adjusted to meet job specifications, and, if necessary, problems are resolved in consultation with appropriate personnel.
- 2.3 Report is produced on system performance in accordance with job specifications.
- 2.4 Drawings are marked to show the as-built condition.
- 2.5 Documentation is completed.

Replacement information	This unit standard replaced unit standard 2392 and unit standard 2394.
--------------------------------	--

Planned review date	31 December 2021
----------------------------	------------------

Status information and last date for assessment for superseded versions

Process	Version	Date	Last Date for Assessment
Registration	1	20 June 2006	31 December 2014
Review	2	17 November 2011	31 December 2021
Review	3	17 November 2016	N/A

Consent and Moderation Requirements (CMR) reference	0013
--	------

This CMR can be accessed at <http://www.nzqa.govt.nz/framework/search/index.do>.

Please note

Providers must be granted consent to assess against standards (accredited) by NZQA, before they can report credits from assessment against unit standards or deliver courses of study leading to that assessment.

Industry Training Organisations must be granted consent to assess against standards by NZQA before they can register credits from assessment against unit standards.

Providers and Industry Training Organisations, which have been granted consent and which are assessing against unit standards must engage with the moderation system that applies to those standards.

Requirements for consent to assess and an outline of the moderation system that applies to this standard are outlined in the Consent and Moderation Requirements (CMR). The CMR also includes useful information about special requirements for organisations wishing to develop education and training programmes, such as minimum qualifications for tutors and assessors, and special resource requirements.

Comments on this unit standard

Please contact Competenz on qualifications@competenz.org.nz if you wish to suggest changes to the content of this unit standard.