Title	Use cutting tools and machines in the performance of electrical installation and maintenance		
Level	2	Credits	2

safety procedures; - set up and use a drill press; - set up and use a lathe; - set up and use a bench grinder; and - set up and use a power saw.	Purpose	 set up and use a drill press; set up and use a lathe; set up and use a bench grinder; and
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Classification	Electrical Engineering > Electrical Installation and Maintenance

Available grade	Achieved	.5	
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Guidance Information

- 1 This unit standard has been developed for, but it is not restricted to, learning and assessment on-job.
- 2 Electrical safety and proper workshop practices are to be maintained at all times.

Outcomes and performance criteria

Outcome 1

Identify cutting tools and machines and describe their safety procedures.

Range drill press, lathe, bench grinder, power saw.

Performance criteria

1.1 Cutting tools and machines are identified by name.

Range actual machines, graphic representation.

1.2 Safety procedures and requirements are described.

Outcome 2

Set up and use a drill press.

Performance criteria

- 2.1 Material is secured tightly.
- 2.2 Drill bit is selected and secured in the chuck.
- 2.3 Required drill speed is selected.

Range pulley and belt, gearing, selector.

2.4 Drill is put to use in accordance with safe workshop practices.

Outcome 3

Set up and use a lathe.

Performance criteria

- 3.1 Material is secured tightly.
- 3.2 Cutting tool is selected and secured.
- 3.3 Required chuck speed is selected.

Range gearing, selector.

3.4 Lathe is put to use in accordance with safe workshop practices.

Outcome 4

Set up and use a bench grinder.

Performance criteria

- 4.1 Grinding wheel is inspected for cracks and to ensure that the edge is square.
- 4.2 Rest is set in accordance with manufacturer's directions.
- 4.3 Guard is checked for integrity and tightness.
- 4.4 Material is ground in accordance with safe workshop practices.

Outcome 5

Set up and use a power saw.

Performance criteria

- 5.1 Power saw blade is set up and tensioned.
- 5.2 Material is secured tightly.

5.3 Power saw is put to use in accordance with safe workshop practices.

This unit standard is expiring. Assessment against the standard must take place by the last date for assessment set out below.

Status information and last date for assessment for superseded versions

Process	Version	Date	Last Date for Assessment
Registration	1	23 April 1996	31 December 2013
Revision	2	3 April 2001	31 December 2013
Review	3	26 May 2005	31 December 2027
Rollover and Revision	4	15 March 2012	31 December 2027
Revision	5	15 January 2014	31 December 2027
Rollover and Revision	6	28 January 2021	31 December 2027
Review	7	25 May 2023	31 December 2027

Consent and Moderation Requirements (CMR) reference	0003
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This CMR can be accessed at http://www.nzqa.govt.nz/framework/search/index.do.