Title	**Operate a ripping saw centre**		
Level	**3**	**Credits**	**5**

Purpose	People credited with this unit standard are able to: demonstrate knowledge of the operation and operating principles of a ripping saw centre; prepare to operate, and operate, a ripping saw centre; monitor the performance of a ripping saw centre with respect to volume and quality of output; and explain and apply preventative maintenance requirements specific to a ripping saw centre.

Classification	Solid Wood Manufacturing > Sawmilling

Available grade	Achieved

Guidance Information

1 Legislation
Health and Safety at Work Act 2015.
Resource Management Act 1991.

2 Definitions
Accepted industry practice – approved codes of practice and standardised procedures accepted by the wider sawmilling industry as examples of best practice.
Corrective action may include actions such as communication to management, communication to on-site technical person, communication to off-site technical support person, cleaning, communication with maintenance staff, recalibration, or changes made to the operating system in accordance with worksite documentation.
Input material refers to timber, shook, or boards that are presented to the docking or trim centre for further processing.
Workplace procedures refer to documented policies and procedures set by the organisation carrying out the work, and to documented or other directions provided to staff, and applicable to the tasks being carried out. They may include but are not limited to – standard operating procedures, site specific procedures, site safety procedures, equipment operating procedures, quality assurance procedures, product quality specifications, references, approved codes of practice, housekeeping standards, environmental considerations, on-site briefings, supervisor's instructions, and procedures to comply with legislative and local body requirements relevant to the industry sector.

3 Range
Saw types includes but are not limited to – horizontal or vertical band resaws, circular resaws;
evidence is required of one ripping saw type. The same ripping saw type should be used for all the outcomes in this unit standard.

4 Assessment information
  a All activities and evidence must meet workplace procedures and accepted industry practice.
  b This unit standard applies to ripping timber (single rip) for width and thickness, using band or circular sawing systems.

Outcomes and performance criteria

Outcome 1

Demonstrate knowledge of the operation and operating principles of a ripping saw centre.

Performance criteria

1.1 The role of a ripping saw centre in the timber conversion process is identified.

1.2 Roles and responsibilities of a ripping saw centre operator are described.

1.3 Operating parameters and capability of a ripping saw centre are identified.

Range includes but is not limited to – minimum and maximum cross sections of input material, maximum and minimum lengths, feed speed, cutting accuracy and tolerances.

1.4 Rip saw components are identified.

Range components may include but are not limited to – process control system; in-feed and out-feed conveyor systems; fence, lubrication systems; blades, saw guides; and if fitted – saw strain systems, photoelectric cells, laser light system.

1.5 Operating faults that can affect output volume and quality are identified, and the corrective action that can be taken is described.

1.6 Safety features of a ripping saw centre are identified, and their roles are explained.

Range safety features may include but are not limited to – stop button, lock-out switch or system, hold cards, guards, isolation of photo electric cell and scanning systems, safety access ways.

Outcome 2

Prepare to operate a ripping saw centre.

Performance criteria

2.1 Start-up checks are completed.

2.2 Input materials checks are completed to ensure materials meet specification and production run expectations.

2.3 Hazards associated with operating a ripping saw centre are identified and actions to be taken to manage the hazards are described.

Range hazards may include but are not limited to – moving equipment, dust, mobile plant, noise.

2.4 Upstream and downstream processing stages are checked to ensure they are ready for production to start.

2.5 Trial timber is cut to check the process set-up and output products.

Outcome 3

Operate a ripping saw centre.

Performance criteria

3.1 Safe work practices associated with operating a ripping saw centre are applied.

Range practices may include but are not limited to – isolation procedures, lock-outs, emergency stops, machine guarding, wearing appropriate safety equipment.

3.2 Saw centre and any fitted scanner are started, operated, and shut down according to manufacturer's specifications.

3.3 Off cuts and reject timber are directed to waste or further processing.

3.4 Production and quality records are completed.

3.5 Production rate is maintained to balance mill flow.

Outcome 4

Monitor the performance of a ripping saw centre with respect to volume and quality of output.

Performance criteria

4.1 Output timber from a saw centre is monitored and corrective action is taken to maintain quality and quantity.

Range may include but is not limited to – blunt and damaged saws, size variations, squareness of saw cut, quality of saw cut, input timber quality variations, fence positioning.

4.2 Control information is entered into any fitted control device, and output data are monitored and interpreted.

4.3 Equipment faults and malfunctions are identified, and corrective actions taken.

Range equipment faults may be mechanical, electrical, or hydraulic.

Outcome 5

Explain and apply preventative maintenance requirements specific to a ripping saw centre.

Performance criteria

5.1 Preventative maintenance requirements are explained and carried out.

5.2 Saw changes are coordinated with other staff and saw centre readjustments are made.

5.3 Common defects caused by faulty saw blades are identified and related to their cause.

Planned review date	31 December 2024

Status information and last date for assessment for superseded versions

Process	Version	Date	Last Date for Assessment
Registration	1	18 December 2006	31 December 2014
Review	2	18 April 2013	N/A
Review	3	23 April 2020	N/A

Consent and Moderation Requirements (CMR) reference	0013

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

Comments on this unit standard

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