

RIG L4-3 Carry out intermediate rigging for complex loads

Kaupae Level	4
Whiwhinga Credit	20
Whāinga Purpose	<p>This standard recognises the skills required to carry out complex load movements using specialist lifting structures and assemblies in an intermediate rigging operation.</p> <p>This standard contributes to the New Zealand Certificate in Rigging (Level 4) [Ref: 2356].</p>
Whakaakoranga me mātua oti Pre-requisites	<p>Pre-requisites</p> <ul style="list-style-type: none"> • <i>RIG L3-2</i> – Calculate load weights and lifting capacity (Level 3, 4 credits) • <i>RIG L4-1</i> – Install temporary structural anchorages for rigging operation (Level 3, 6 credits) <p>Co-requisites</p> <ul style="list-style-type: none"> • <i>RIG L3-6</i> – Carry out rigging for regular loads and dogman work (Level 3, 15 credits), or equivalent knowledge and skills. • <i>RIG L4-2</i> – Plan intermediate rigging operation (Level 3, 15 credits), or equivalent knowledge and skills.

Hua o te ako me Paearu aromatawai | Learning outcomes and assessment criteria

Hua o te ako Learning outcomes	Paearu aromatawai Assessment criteria
1. Prepare complex load operations.	a. Sets out lift plan for intermediate rigging operation.
	b. Check and confirm calculations set out in lift plan meet specified load, load weight and movement requirements.
	c. Isolates work area in accordance with job specifications.
	d. Prepares and confirms site safety procedures and hazard controls are in accordance with site specific procedures and job specification.
	e. Sets out specialist structures or lifting, assemblies in accordance with lift plan specifications.

	f. Selects and conducts inspection of lifting moving and handling equipment.
	g. Confirms load lifting equipment is capable of safely moving the load.
	h. Securely attaches lifting, moving, and handling equipment to the load using approved methods to manage control and balance.
	i. Undertakes acceptable visual inspections of anchorages and lifting point components.
	j. Work area is checked and confirmed that lift operation can proceed.
2. Undertake safe and effective load movement control and balance during operations	a. Confirms lift plan, sequencing of lift, and communications methods with people involved in the rigging operation and people in the area of operation.
	b. Visually inspects and confirms that attached lifting equipment and lifting fixtures on loads are secure, protected and is capable of moving the load safely.
	c. Directs rigging operation in accordance with lift plan and established communication procedures.
	d. Maintains effective load control and balance through to its final position.
3. Disestablish lifting assemblies for transit	a. Disestablish lifting assembly in accordance with instructions and specifications.
	b. Inspects for damaged and/or faulty assembly components in accordance with manufacturer requirements and workplace procedures.
	c. Prepares transit loads in a way that minimises risk to people and potential damage to plant and equipment.
	d. Load is sequenced for loading and unloading and is appropriately restrained.
	e. Leaves the worksite in a safe condition.

Pārongo aromatawai me te taumata paearu | Assessment information and grade criteria

Assessment specifications:

The candidate carries out movement of complex loads, including the siting and assembly of lifting systems, confirming that the load is secure before moving, controlling operations of equipment or systems to move complex loads, and releases safely and effectively the load to its intended destination.

An intermediate rigger will be capable of consistently demonstrating the technical skills and knowledge required to safely undertake a complex and unfamiliar lift using specialist structures and lifting assemblies, including multiple lifting devices.

A complex load operation is defined by the methods and techniques needing to be applied to the movement, including lateral movement and load transfers from one device to another, and the positioning of that complex load.

A complex load will likely have one or more characteristics of unequal weight distribution, irregular shape, offset or high centre of gravity, and unknown lifting points.

For mechanical lifting, moving and handling of loads the use of gantries and mechanical devices is acceptable.

For lifts involving cranes assessment must be carried out using either a crane with a 10 tonne minimum capacity; or a tower crane or self-erecting tower crane with a 4 tonne minimum capacity.

To achieve this standard the candidate must be capable of consistently performing the requirements:

- on a jobsite or equivalent
- with plant and equipment that reflects real world scenarios
- to current and relevant legislation, standards and codes (including safety)
- to requirements set out in accordance with equipment and manufacture guidelines, engineering specifications.

Ngā momo whiwhinga | Grades available

Achieved.

Ihirangi waitohu | Indicative content

Prepare intermediate rigging operation

- Scope of work for intermediate rigging operations, including plant and equipment
- Plant and equipment to meet specified load, load weight and movement requirements for effective load control and balance
- Site coordination requirements, including communication methods for all involved parties
- Load stability and safety
- Safety considerations and setup
- Load movement
- Rigging operation documentation (log books, Job hazard analysis, site permitting. site records)

Prepare job site

- Knowledge of documentation, drawings, lift plan, and job sequencing
- Ground and site conditions, including permits, access and egress for people and equipment

- Site isolation and safety procedures – safety signage, barricades, personal protective equipment
- Hazard and risk assessment and safety controls
- Select, and inspect the lifting, moving and handling equipment – reject and tag

Move and position load

- Establish temporary lifting assemblies
- Equipment inspection for correct specification/configuration and check for serviceability
- Assemble lifting system and confirming handling equipment is correctly applied and capable of safely moving the load
- Performing test lifts - weight of load evenly distributed and secure
- Team member communications for moving lift and promptly addressing issues or concerns during the lift
- Landing the load safely

Disestablish temporary lifting assemblies for transit

- Disestablish temporary lifting assemblies to instructions and specifications
- Post use inspections for wear and faults
- Safe loading of load shifting equipment and tools - safety of persons and equipment, sequencing load for loading and unloading back to yard, securing of loads to prevent load movement
- Coordination of transit requirements, including documentation and adhering to procedures for transporting from job site.

Rauemi | Resources

Programme guidance information for the New Zealand Certificate in Rigging is available from qualifications@waihangaarau.nz.

Approved codes of practice available at www.worksafe.govt.nz:

- Approved Code of Practice for Load-lifting Rigging
- Approved Code of Practice – Cranes

Pārongo Whakaū Kounga | Quality assurance information

Ngā rōpū whakatau-paerewa Standard Setting Body	Waihanga Ara Rau – Construction & Infrastructure Workforce Development Council
Whakaritenga Rārangi Paetae Aromatawai DASS classification	Service Sector > Lifting Equipment > Core Rigging
PreKo te tohutoro ki ngā Whakaritenga i te Whakamanatanga me te Whakaōritenga CMR	0183

Hātepe Process	Putanga Version	Rā whakaputa Review Date	Rā whakamutunga mō te aromatawai Last date for assessment
Rēhitatanga Registration	1	dd Jun 2024	[dd mm yyyy]
Kōrero whakakapinga Replacement information	This skill standard replaces unit standards 4213 and 4215.		
Rā arotake Planned review date	31 December 2029		

Please contact Waihanga Ara Rau Construction and Infrastructure Workforce Development Council at qualifications@waihangaararau.nz to suggest changes to the content of this skill standard.

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