

40087**Develop detailed working drawings for an advanced textiles project**

Kaupae Level	4
Whiwhinga Credit	6
Whāinga Purpose	<p>This skill standard is intended for people who want to learn how to interpret customer approved concept drawings, details and related notes to develop detailed working drawings for a large or complex advanced textiles project.</p> <p>This skill standard can be used in programmes leading to the New Zealand Certificate in Advanced Textiles (Level 4) with strands in Industrial Textiles Fabrication, and Industrial Trimming [Ref: 5060].</p>

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

Hua o te ako Learning outcomes	Paearu aromatawai Assessment criteria
1. Determine job requirements for a large or complex advanced textiles project.	a. Identify and explain the type of concept drawings used.
	b. Interpret customer approved concept drawings, details and related notes to determine job requirements.
2. Establish dimensions for a large or complex advanced textiles project.	a. Perform detailed measurements required to establish dimensions, including datum points.
	b. Perform calculations, including allowance for working tolerances if required, and record results.
3. Develop detailed working drawings for a large or complex advanced textiles project.	a. Determine appropriate method for designing and drawing a product.
	b. Determine appropriate drawing parameters.
	c. Produce working drawings and add dimensions and identifying labels to drawings.
	d. Confirm working drawings meet job requirements, including orientation, proportion, dimensions, related notes.

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

The evidence presented for assessment against this skill standard must be consistent with safe working practices and be in accordance with applicable workplace requirements, industry guidelines, legislative requirements, and manufacturer's information.

Evidence must be provided of developing detailed working drawings for three different large or complex projects in accordance with job requirements.

Examples of projects that may be used include (but are not limited to) manufacture or repair of: vehicle and marine upholstery, boat covers, convertible tops, tonneau covers, protective covers, clear enclosures, carpets, tarpaulins, tents and marquees, screens and blinds, awnings, shade sails, canopy structures, tension membrane skins and textile structures.

Definitions

Complex projects – projects that have a level of complexity in their production, e.g. multiple materials to be sourced, advanced technical skills required, coordination of other agencies or contractors, multiple components or parts to the product.

Industry guidelines – those practices and procedures commonly used as standard procedures to produce items of acceptable saleable quality in the industrial textile fabrication or trimming industry such as related textbook descriptors.

Large projects – projects that have additional production requirements due to their size or volume, e.g. high quantity of material, high labour needs, large production area.

Manufacturer's information – technical information for a machine or product detailing operation; installation and servicing procedures; manufacturer instructions; technical terms and descriptions; and detailed illustrations.

Workplace requirements – instructions to staff on policy and procedures that are available in the workplace. These requirements may include – company policies and procedures, work instructions, product quality specifications and legislative requirements.

Ngā momo whiwhinga | Grades available

Achieved.

Ihirangi waitohu | Indicative content

- Types of concept drawings used such as orthographic (2D), pictorial (3D), isometric.
- The information in job requirements such as material width, fittings and attachments, seams and hems meeting functional and economic manufacturing requirements.
- Appropriate calculations such as area, circumference, angles, arcs, triangular calculations.
- Methods used for designing and drawing a product such as scale, freehand, orthographic, pictorial, computer aided design (CAD).
- Drawing parameters such as projections, views, scales, layout, baseline, geometric shapes.

Rauemi | Resources

Legislation, regulations and/or industry standards relevant to this skill standard include but are not limited to:

- Health and Safety at Work Act 2015.

Any new, amended or replacement Acts, regulations, standards, codes of practice, guidelines, or authority requirements or conditions affecting this skill standard will take precedence for assessment purposes, pending review of this skill standard.

Legislation can be accessed at: <https://www.legislation.govt.nz>.

Pārongo Whakaū Kouna | Quality assurance information

Ngā rōpū whakatau-paerewa Standard Setting Body	Hanga-Aro-Rau Engineering, Manufacturing and Logistics Workforce Development Council
Whakaritenga Rārangi Paetae Aromatawai DASS classification	Manufacturing > Industrial Textile Fabrication > Industrial Textile Fabrication Core Skills
Ko te tohutoro ki ngā Whakaritenga i te Whakamanatanga me te Whakaōritenga CMR	0014

Hātepe Process	Putanga Version	Rā whakaputa Review Date	Rā whakamutunga mō te aromatawai Last date for assessment
Rēhitatanga Registration	1	29 August 2024	N/A
Kōrero whakakapinga Replacement information	This skill standard replaced unit standards 5021 and 16704.		
Rā arotake Planned review date	31 December 2029		

Please contact Hanga-Aro-Rau Engineering, Manufacturing and Logistics Workforce Development Council at qualifications@hangaarorau.nz if you wish to suggest changes to this skill standard.