

# Facilities and Equipment Checklist

<b>Qualification:</b>	MEM20413 Certificate II in Engineering Pathways (Release 1)		
<b>School:</b>			
<b>Reviewed by:</b>		<b>Date:</b>	
<b>Qualification Description</b> <p><i>This qualification applies to a learning and assessment environment where access to structured on-the-job learning in a workplace may not be available. This qualification is only for delivery in learning institutions.</i></p> <p><i>The qualification is intended for people interested in exposure to an engineering or related working environment with a view to entering into employment in that area. This qualification will equip graduates with knowledge and skills which will enhance their prospects of employment in an engineering or related working environment.</i></p>			

## Instructions

Review and select the units being undertaken in this qualification.

### Note:

- If an alternative unit is selected that has not been listed, please contact AIET.
- Teachers and students must have access to digital devices for the purposes of capturing photographic or video evidence. This may be students' personal devices according to relevant school policy, or provided by the school.

Tick all relevant units being delivered:	Units	
<b>Core Units</b>		
✓	MEM13014A	Apply principles of Occupational Health & Safety in work environment
✓	MEMPE005A	Develop a career plan for the engineering and manufacturing industry
✓	MEMPE006A	Undertake a basic engineering project
✓	MSAENV272B	Participate in environmentally sustainable work practices
<b>Elective Units (tick all that apply)</b>		
<input type="checkbox"/>	MSAPMSUP106A	Work in a team
<input type="checkbox"/>	MEM16008A	Interact with computing technology
<input type="checkbox"/>	MEM18001C	Use hand tools
<input type="checkbox"/>	MEM18002B	Use power tools/hand held operations
<input type="checkbox"/>	MEMPE001A	Use engineering workshop machines
<input type="checkbox"/>	MEMPE002A	Use electric welding machines
<input type="checkbox"/>	MEMPE003A	Use oxy-acetylene and soldering equipment
<input type="checkbox"/>	MEMPE004A	Use fabrication equipment
<input type="checkbox"/>	MEM16006A	Organise and communicate information

## Instructions

Review the equipment requirements for the qualification. Notes on equipment in place can be included in the Notes/Details column Where possible photos should be taken to be submitted with this checklist.

- Table 1: All items in Table 1 must be checked as available
- Table 2: Please provide information related to all elective units being delivered.

### Resources unavailable:

Where the resources do not meet all the assessment conditions listed in the checklist, please note the Action Plan in place for how the requirement will be addressed. (i.e., request to alter elective units in training, arrange for students to be trained and assessed at another facility for all or part of training, equipment being ordered, installation pending etc.)

If appropriate arrangements are not able to be made, please contact the Quality and Compliance Team at AIET on Ph 03 9387 2051 or [info@aiet.edu.au](mailto:info@aiet.edu.au)

### Table 1: Equipment/Resources required for *all* units in this qualification:

Please ensure that all items listed below are available at your school in order to deliver this qualification.

Equipment requirements	Notes/Action Plan	AIET Office Use Verified
<p><b>&lt;EXAMPLE&gt;</b> <i>Safety procedures including but are not limited to, one or more of:</i></p> <ul style="list-style-type: none"><li><input type="checkbox"/> PPE</li><li><input type="checkbox"/> Handling, labelling and storing hazardous material and equipment in accordance with labels, MSDS, manufacturer instructions and workplace procedures and regulations, emergency response procedures</li><li><input type="checkbox"/> Cleaning and/or decontamination of equipment</li><li><input type="checkbox"/> machinery guards</li><li><input checked="" type="checkbox"/> signage, barriers, service isolation tags, traffic control and flashing lights, lockout and tag-out procedures</li></ul>	<p><b>&lt;EXAMPLE&gt;</b> <i>Isolation tags on order. No flashing lights installed in school lab,, when required we will simulate these with borrowed equipment from production</i></p>	<p><b>&lt;EXAMPLE&gt;</b> <i>&lt;e.g. photo&gt; &lt;e.g. sighted&gt;</i></p>
<p>Safety equipment and PPE including:</p> <ul style="list-style-type: none"><li><input type="checkbox"/> Safety glasses, face and head protection, hard hats, protective footwear, protective clothing, breathing apparatus, ear protection, gloves</li><li><input type="checkbox"/> First aid kit and evacuation plans, safety signage</li><li><input type="checkbox"/> Safety harness, screens, barriers and shielding, extraction fans, machine guards, isolation devices</li></ul>		

Equipment requirements	Notes/Action Plan	AIET Office Use Verified
<input type="checkbox"/> Access to a reliable internet connection and a computer/workstation and research resources		
<p>Access to documentation, procedures and specifications:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> Workplace instructions relating to safe work practices and addressing hazards and emergencies, Safety Data Sheets (SDS)</li> <li><input type="checkbox"/> Appropriate State safety regulations and resources about building/construction industries and job opportunities, professional industry associations</li> <li><input type="checkbox"/> Relevant workplace induction procedures and equipment manuals, workplace instructions, plans, cutting lists, drawings and designs</li> <li><input type="checkbox"/> Workplace policies and procedures/instructions including: <ul style="list-style-type: none"> <li>• legislation, protective equipment, material safety management systems, hazardous substances and dangerous goods code, local safe operating procedures, awards provisions</li> </ul> </li> </ul>		
<p>Drawing equipment and tools, materials and documentation required including:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> instructions, job sheets, cutting lists, plans, drawings and designs, sketches</li> </ul>		
<p>Tools and equipment may include but are not limited to:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> hacksaws, hammers, punches, screwdrivers, sockets, wrenches, scrapers, chisels, gouges, wood planes and files of all cross-sectional shapes and types, marking equipment, measuring equipment, jigs, cutting tools, files, spanners, scribes</li> </ul>		
<p>Waste disposal facilities</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> liquid waste disposal</li> <li><input type="checkbox"/> solid waste disposal</li> </ul>		

**Table 2: Equipment/Resources required for *individual* units in this qualification:**

The units listed below are only units that require additional resources that are not covered in the Table 1 above.

Unit Code and Title	Equipment requirements	Notes/Action Plan	AIET Office Use Verified
<b>Core Units</b>			
MEM13014A Apply principles of Occupational Health & Safety in work environment	<p>Additional resources may include:</p> <p>Safety signs /symbols including:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> Standard signage/symbols conforming to AS 1319-1994</li> <li><input type="checkbox"/> Safety signs for the occupational environment, and any other applicable Australian Standards</li> <li><input type="checkbox"/> Workplace-specific signage</li> <li><input type="checkbox"/> Typical classes of relevant signs/symbols are: <ul style="list-style-type: none"> <li>• mandatory, prohibition, danger, caution, general safety, safety information, fire safety equipment</li> </ul> </li> </ul>		
MEMPE006A Undertake a basic engineering project	<p>Additional resources may include:</p> <p>Engineering materials including:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> types of metal, thermo setting and thermo plastic polymers, fibre glass, carbon fibre, threaded fasteners, pins, circlips, rivets, welding, folded joints, adhesives</li> <li><input type="checkbox"/> shapes of metal materials including:</li> <li><input type="checkbox"/> sheet, plate, bar, angle iron, extruded forms, channel, beams</li> </ul>		
MSAENV272B Participate in environmentally sustainable work practices	<p>Additional resources may include:</p> <p>Procedures and plans including:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> workplace procedures</li> <li><input type="checkbox"/> work instructions</li> </ul> <p>Documentation and Management reports in relation to:</p> <ul style="list-style-type: none"> <li><input type="checkbox"/> production</li> <li><input type="checkbox"/> waste management/disposal</li> <li><input type="checkbox"/> overheads</li> <li><input type="checkbox"/> hazard control</li> </ul>		

Unit Code and Title	Equipment requirements	Notes/Action Plan	AIET Office Use Verified
	<input type="checkbox"/> emissions <input type="checkbox"/> invoices from suppliers <input type="checkbox"/> life cycle analysis applied to: <ul style="list-style-type: none"> <li>• energy supply</li> <li>• materials</li> <li>• transport</li> </ul> <input type="checkbox"/> Relevant industry and governments codes and standards <input type="checkbox"/> Internet access		
<b>Elective Units</b>			
MSAPMSUP106A Work in a team	Additional resources may include: <ul style="list-style-type: none"> <li><input type="checkbox"/> procedures and regulations including: <ul style="list-style-type: none"> <li>• relevant workplace procedures</li> <li>• work instructions</li> </ul> </li> <li><input type="checkbox"/> relevant industry and government codes and standards</li> <li><input type="checkbox"/> appropriate personal protective equipment</li> <li><input type="checkbox"/> access to hazards that must be managed including: <ul style="list-style-type: none"> <li>• chemicals and hazardous materials</li> <li>• gases and liquids under pressure</li> <li>• moving machinery</li> <li>• materials handling</li> <li>• working at heights, in confined spaces, or in environments subjected to heat, noise, dust or vapours</li> </ul> </li> </ul>		
MEM16008A Interact with computing technology	Additional resources may include: Access procedures including: <ul style="list-style-type: none"> <li><input type="checkbox"/> logging on procedures, security procedures, virus checks, start -up routines, application start-up</li> </ul> Technology including: <ul style="list-style-type: none"> <li><input type="checkbox"/> handheld data recording devices, screen based equipment, personal computers, bar coders</li> </ul> Applications including:		

Unit Code and Title	Equipment requirements	Notes/Action Plan	AIET Office Use Verified
	<input type="checkbox"/> word processing spreadsheets and databases, customised engineering and manufacturing applications, Material Resource Planning (MRP), warehousing inventory applications, predictive reliability and maintenance applications, production data management applications  Data output including: <input type="checkbox"/> Report, email, chart, graph, printout, data transfer, labels		
MEM18002B Use power tools/hand held operations	Additional resources may include: Power tools including: <input type="checkbox"/> electric or pneumatic/hydraulic drills, grinders, jigsaws, nibblers, cutting saws, sanders, planers, routers, pedestal drills, pedestal grinders  Clamping equipment including: <input type="checkbox"/> multigrips, vices, jigs and fixtures, clamps etc.  Procedures, regulatory requirements and resources for maintenance of power tools for routine including: <input type="checkbox"/> hand sharpening, cleaning, lubricating, tightening		
MEMPE001A Use engineering workshop machines	Additional resources may include: Appropriate machines including but not limited to: <input type="checkbox"/> milling machines, cut off saws, pedestal grinders, fixed position drilling machines, computer controlled machines, technical manuals  Measuring equipment including but is not limited to: <input type="checkbox"/> Micrometers, vernier scaled measuring devices, rules, calipers, gauges		
MEMPE002A Use electric welding machines	Additional resources may include: Welding processes including: <input type="checkbox"/> manual metal arc welding		

Unit Code and Title	Equipment requirements	Notes/Action Plan	AIET Office Use Verified
	<input type="checkbox"/> gas metal arc welding <input type="checkbox"/> tungsten metal arc welding		
MEMPE003A Use oxy-acetylene and soldering equipment	Additional resources may include: Use of heating equipment including: <input type="checkbox"/> oxy-acetylene equipment <input type="checkbox"/> LP gas equipment <input type="checkbox"/> electrically heated equipment/soldering irons <input type="checkbox"/> safe silver soldering and brazing practices including but not limited to ensuring the solder being used has no known health risks		
MEMPE004A Use fabrication equipment	Additional resources may include: Fabrication machinery including: <input type="checkbox"/> shapers, benders, rollers, cut off machines, guillotines  Measuring equipment including: <input type="checkbox"/> tape measures, vernier scaled measuring devices, rules, gauges		
MEM16006A Organise and communicate information	Additional resources may include: Relevant procedures and documents including: <input type="checkbox"/> specifications <input type="checkbox"/> standard operating procedures <input type="checkbox"/> charts <input type="checkbox"/> lists <input type="checkbox"/> computer data, bar coding and simple keyboard operations <input type="checkbox"/> Proforma reports		

## SCHOOL DECLARATION

I confirm that we have all the equipment and facilities required to deliver our chosen units of competency for this qualification.

☐ YES ☐ NO

Trainer name:	
Trainer signature:	
Date:	

## RTO APPROVAL SIGN OFF

After reviewing the checklist for each unit being delivered, the school has the required facilities and equipment to assess the units chosen?

☐ YES ☐ NO

<i>*If no, actions to be taken:</i>	
Name:	
Signature:	
Date:	