

MEM50119

Diploma of Engineering – Advanced Trade (Diesel/Mechanical Fitting)



DURATION

18 months
2 days a week
over 3 semesters



DELIVERY MODEL

Face-to-Face
at Brendale

Course Overview

This qualification provides the skills and knowledge required for employment as an advanced engineering tradesperson within the metal, engineering, manufacturing & associated industries as a Mechanical Fitter and/or Diesel Fitter. Very practical in approach it allows for the development of key skills over time through the completion of job tasks in a simulated environment. It also includes an Industry Placement component for skills consolidation in the workplace.

ASG Entry Requirements

Minimum age: 18 years

Academic suitability:

- Australian Year 12 Certificate; or
- An AQF Certificate IV level qualification or higher; (or its equivalent; or overseas qualification assessed as equivalent by an approved authority)
- Successful completion of LLN assessment at ACSF Exit Level 3 or higher.
- International Baccalaureate (IB) diploma

You also need to supply your own PPE - steel cap boots, long pants & high-viz shirt.

Qualification Pathway

MEM80122 Graduate Diploma of Engineering

Employment Opportunities

On successful course completion students will be dual trade qualified as a Mechanical Engineering tradesperson, equipped to obtain employment as a:

- Diesel Fitter
- Maintenance/Mechanical Fitter

Tuition Fees:

Total Course Cost - \$ 18,997 *

(payable in 3 instalments, 1 in each semester)

You have the option to pay your fees as they become due &/or using a VET Student Loan. Eligibility criteria applies.*

*The **maximum amount of VSL** that applies to this course is **\$18,097**; so if using a VET Student Loan there is a **Gap Fee of \$900**.

Student Services

We offer a range of support services to assist you in achieving a successful course outcome. This includes tutorial support and Language, Literacy & Numeracy assistance where required. Please contact us to discuss any other individual needs.

Assessment

Assessment takes place at the end of each unit with a Knowledge Test and Practical Demonstration & throughout the course with a holistic project due at the end of each semester.

Certification

On successful course completion Australian Skills Group will award the MEM50119 Diploma of Engineering – Advanced Trade, or a Statement of Attainment for units achieved in partial completion.

VET Student Loans

- **Vet Student Loans** is an Australian Government loan program that helps eligible individuals pay their tuition fees
- **Eligibility criteria applies** – a VSL will not be approved for students who do not meet eligibility requirements
- **For more information refer to the VET Student Loans Information Booklet:**

[VET Student Loans Information Booklet - Department of Employment and Workplace Relations, Australian Government \(dewr.gov.au\)](#)

Units of Study

Unit of Study 1

MEM13015 Work safely and effectively in manufacturing and engineering
MEM16006 Organise and communicate information
MEM11011 Undertake manual handling
MEM12023 Perform engineering measurements
MEM12024 Perform computations
MEM18001 Use hand tools
MEM18002 Use power tools/hand held operations
MEM14006 Plan work activities
MEM09002 Interpret technical drawing
MEM16008 Interact with computing technology
MEM16011 Communicate with individuals and small groups
MEM16012 Interpret technical specifications and manuals
MEM16009 Research and analyse engineering information
MEM12026 Perform advanced trade calculations in a manufacturing, engineering or related environment
MEM05006 Perform brazing and/or silver soldering
MEM16014 Report technical information
MEM12025 Use graphical techniques and perform simple statistical computations

Unit of Study 2

MEM18003 Use tools for precision work
MEM18055 Dismantle, replace and assemble engineering components
MEM18006 Perform precision fitting of engineering components
MEM18011 Shutdown and isolate machines and equipment
MEM18012 Perform installation and removal of mechanical seals
MEM18005 Perform fault diagnosis, installation and removal of bearings
MEM18007 Maintain and repair mechanical drives and mechanical transmission assemblies
MEM18009 Perform precision levelling and alignment of machines and engineering components
MEM12003 Perform precision mechanical measurement
MEM12004 Perform precision electrical/electronic measurement
MEM18010 Perform equipment condition monitoring and recording
MEM18018 Maintain pneumatic system components
MEM18020 Maintain hydraulic system components
MEM18021 Maintain hydraulic systems
MEM05007 Perform manual heating and thermal cutting

Unit of Study 3

MEM27002 Test and repair compression ignition systems
MEM27004 Maintain and repair engine lubrication systems
MEM27005 Tune diesel engines
MEM27006 Diagnose and rectify batteries, low voltage sensors and circuits
MEM27007 Diagnose and rectify low voltage starting systems
MEM27010 Diagnose and rectify low voltage charging systems
MEM27013 Maintain steering system
MEM27012 Maintain mobile plant suspension systems
MEM27008 Maintain induction, exhaust and emission control systems
MEM27015 Diagnose and rectify drive line and final drives
MEM27009 Diagnose and rectify braking systems
MEM18022 Maintain fluid power controls
MSMENV272 Participate in environmentally sustainable work practices
MEM17003 Assist in the provision of on-the-job training