



Applied Thermodynamics and Fluid Mechanics skill set

State ID: GAB96

About this course

Manage thermodynamic, fluid mechanics and controllers in power and energy sectors

The skill set will develop your knowledge in carrying out mechanical design and performance analysis in fluid statics, fluid motion, heat and power exchange in steam and similar power plants, engines and refrigeration systems, to name just a few practical purposes.

This course is ideal for FIFO workers - talk to us about how you can study this course flexibly.

Gain these skills:

- Investigate and review sustainability implications, features and functions of Mechanical Engineering sector
- Software assisted techniques for applications for fluid and thermodynamic principles in engineering
- Discover the simulated working environment must be used where the range of conditions reflects realistic workplace situations.
- Reviewing sustainability implications, functions and features of fluid, thermodynamic and vacuum devices, machines and systems
- Identify and evaluate hydrodynamic and thermodynamic principles and techniques, analysis techniques, software and software validation techniques

- Operate, develop and maintain a computer/controller system/program to fulfill project requirements
- Report and document results of scoping, principles and techniques identification, evaluation of applications, calculations, component and system layouts, and functional diagrams

Dates in 2021:

Semester 1 workshop and lectures: Thursdays weekly 5pm to 8pm, from 4 February to Tuesday 24 June 2021

Requirements of the course

This course requires both on-campus practical and theory classes; and connectivity to learning management systems for self-paced study.



On-campus practical and theory classes:

For 3 hours every week, you will need to attend workshops and lectures on-campus.



Connectivity to learning management systems for self-paced study:

Once enrolled, you will receive information about how to login to our [eCampus](#). Your study will include 6 to 8 hours a week using Blackboard, where you will access learning content, assignments, lesson plans and pre-reading for classes, at your place of choice, on or off-campus. To access the full suite of software activities, you will need to use College computers at Munster campus.

Course cost:

2021 fees for this course will be published soon.

Overview

This course may be offered with a blended, flexible delivery model to enable social distancing measures to be undertaken during the COVID-19 pandemic. This approach may include a mix of online and classroom based delivery, as well as practical and work experience placements. Lecturers will provide any specific instructions if your training delivery style needs to change.

All year round, 2021

Munster - Part Time-Self Paced Onsite-Local-Skill Set



 When: **All year round**

 How: **Part Time**

Units

Core

National ID	Unit Title
MEM23003A	Operate and program computers and/or controllers in engineering situations
MEM23006A	Apply fluid and thermodynamics principles in engineering
MEM23113A	Evaluate hydrodynamic systems and system components
MEM23114A	Evaluate thermodynamic systems and components

Prerequisites

Students will need to have studied the following units prior to undertaking this skill set:

- MEM23004A - Apply technical mathematics
- MEM23006A -Apply fluid and thermodynamics principles in engineering (which is covered as part of this skill set)
- MEM16008A - Interact with computing technology

For more information, visit the [Applied Engineering and Mathematics skill set](#) page or use the enquiry form at the end of this page to discuss your skills and experience.

Study pathway



[Advanced Diploma of Engineering](#)

This skill set forms part of MEM60112 Advanced Diploma of Engineering, which provides pathways towards university entry requirements.