

Diploma of Engineering - Technical

Further Information

Manufacturing Skills Queensland

Phone: (07) 3364 0680

Email: msq@msq.org.au

Web: www.msq.org.au

Postal Address

Manufacturing Skills Queensland

PO Box 4012

Eight Mile Plains QLD 4113

Expectations of the school

It is expected that school will:

- appoint a VET Coordinator or other person to manage student interest, enrolment and school-based Apprenticeships and Traineeships (SAT) placement
- work with Manufacturing Skills Queensland, Construction Skills Queensland, Queensland Minerals and Energy Academy and managers of the Gateway Schools to Industry projects to secure SATs
- submit the required paperwork for students to enrol at the preferred RTO
- develop and submit the student's SAT Training Contract in consultation with the RTO, the employer and the student's parents/guardian.

How can our school participate?

1. Contact Manufacturing Skills Queensland on (07) 3364 0680.
2. Nominate a VET Coordinator.
3. Review and complete the Memorandum of Understanding with the preferred RTO
4. Promote the program to parents and students.
5. Collect Expressions of Interest and New Student Personal Details forms from students.
6. Secure SAT positions in industry for students.
7. Determine suitability of students for Diploma program.
8. Provide enrolment details to preferred RTO for students enrolment

VET in Schools - VET Coordinators information

*Start your students' career as an
engineering professional*



About the program

What is the Diploma of Engineering - Technical?

This program has been developed by Manufacturing Skills Queensland and provides Year 11 and 12 students with an opportunity to gain skills and knowledge in technical engineering and manufacturing.

For further information, please contact the program coordinator, Manufacturing Skills Queensland, on (07) 3364 0680.

Students will gain valuable skills in:

- Production design including computer-aided drafting
- applying mathematical concepts in manufacturing and engineering
- manufacturing and engineering materials and processes.

What's so great about it?

By participating in this program students will benefit from:

- Diploma-level training in conjunction with on-the-job experience while completing Year 11 and 12
- a school-based traineeship, that provides a first-hand understanding of the manufacturing and engineering, building and construction, and minerals and energy industries
- practical experience and work-ready skills
- points towards their Queensland Certificate of Education (QCE)
- credit towards further study.

Further study options

- Confirmed entry into and credit towards the Diploma of Engineering - Technical at a recognised institution
- Articulation into relevant university programs upon completion of the Diploma

How Does it work? Program

Over two years (Year 11 and 12), students will undertake:

Option 1

- Up to five competencies towards the Diploma of Engineering - Technical
- Graphics and Mathematics B subjects at school
- a school-based traineeship of 48 days per year on-the-job training.

Option 2*

- Up to eight competencies towards the Diploma of Engineering - Technical
- Graphics, Mathematics B and Engineering Technology subjects at school
- a school-based traineeship of 48 days per year on-the-job training.

The school will enter into a Memorandum of Understanding with the RTO for the delivery and assessment of the Diploma program. The school must meet the staffing and physical resource requirements of the Diploma competencies to deliver the program.

The school, in conjunction with the RTO, will deliver training at school and assess students throughout the two year program. An RTO mentor will be assigned to work with the school throughout the program, providing advice and support for delivery and assessment.

No training is required at the preferred RTO

Training Plan

Prerequisites

- Sound in Year 10 Graphics
- Sound in Year 10 Mathematics

Required Year 11 and 12 subjects

- Graphics
- Mathematics
- Engineering Technology (option 2)

*MSQ preferred Option

Benefits of participating in the Diploma program

- Diploma-level training in conjunction with on-the-job experience while completing Year 11 and 12
- earn while you learn and gain a first-hand understanding of the manufacturing and engineering industry
- practical experience and work-ready skills
- points towards your Queensland Certificate of Education (QCE)
- credit towards further study

Diploma of Engineering - Technical competencies

These competencies are delivered in conjunction with the required Year 11 and 12 subjects and within the school timetable.

Code	Title
MEM09005B*	Perform basic engineering detail drafting
MEM120255A	Use graphical techniques and perform simple statistical computations
MEM3001A*	Use computer-aided drafting (CAD) systems to produce basic engineering drawings
MEM30002A*	Produce basic engineering graphics
MEM30003A*	Produce engineering drawings
MEM30004A*	Use CAD to create and display 3D models
MEM3007A	Select common engineering materials
MEM30012A	Apply mathematical techniques in manufacturing, engineering or related situations

*Competencies associated with option 1

School-based trainee

- 48 days per year on-the-job

Pathways

- Complete Diploma of Engineering - Technical
- Advanced Diploma of Engineering
- University Programs
- Full-time employment

Career opportunities

This program can lead to an entry level para-professional position in a manufacturing and engineering, building, construction, minerals or energy environment including

- Design or Mechanical Draftsperson or Engineer
- Design Engineering Purchasing Manager
- Maintenance Engineer
- Manufacturing Operations Engineer
- Mechanical/Mechatronics Engineer
- Metallurgist
- Operations/Production/Project manager
- Quality Systems manager
- Structural Engineer

Costs

Students pay no tuition fees for the Diploma program. The school may charge a materials fee. This cost is set by the school and payable by the school.

Student eligibility

To be eligible for enrolment into the Diploma program, students must:

- have passed Year 10 Mathematics and Graphics
- be completing Year 11 and 12
- be enrolled in Mathematics B, Graphics at school for option 1 or Engineering Technology, Mathematics B Graphics for option 2
- have parental and school consent to participate
- be an Australian citizen or permanent resident residing in Queensland (due to funding arrangements for high school students).