

Engineering Doctorate (ENGD) - EngD

This program is only offered to continuing students. No new admissions will be accepted. Students who are interested in this area should consider the [Doctor of Professional Engineering](#).

	External
Semester intake:	No new admissions
Fees:	Domestic full fee paying place International full fee paying place Research Training Program (RTP) - Fees Offset scheme
Standard duration:	Part-time candidates normally complete in 6 years. Students have a maximum of 8 years part-time to complete this program.

Contact us

Current students
Ask a question Freecall (within Australia): 1800 007 252 Phone (from outside Australia): +61 7 4631 2285 Email usq.support@usq.edu.au

Program aims

The aim of the Engineering Doctorate program is to enhance the skills of already high performing professional engineers in the areas of detailed technical investigation, applied research and development, innovative design and analysis. The program allows candidates to develop and demonstrate these essential skills by communicating their significant original professional technical achievements as a substantial body of work in a formal academic format. In addition, candidates are likely to acquire some additional key management knowledge and/or broad technological knowledge. The specific set of knowledge will depend on the candidate's choice of courses.

Program objectives

Students who successfully complete the Engineering Doctorate will be able to demonstrate the ability to:

- critically evaluate knowledge from the professional journals and other information sources relevant to the professional engineering field;
- analyse trends in technology;
- use research skills in the field of professional engineering;
- apply skills in detailed technical investigation of complex and unique engineering problems;
- develop innovative solutions, designs and analyses; and
- present a clear and accurate written account of an extensive and complicated body of work

Depending on the choice of Elective courses, students will also be able to demonstrate the ability to:

- apply selected fundamental management theories and practices;
- apply skills in engineering and technology business;
- evaluate the importance of technological innovation and risk in engineering business; and
- apply knowledge and skills associated with technology management in areas such as sustainable development, technical risk assessment and engineering asset management.

Australian Qualifications Framework

The Australian Qualifications Framework (AQF) is a single national, comprehensive system of qualifications offered by higher education institutions (including universities), vocational education and training institutions

and secondary schools. Each AQF qualification has a set of descriptors which define the type and complexity of knowledge, skills and application of knowledge and skills that a graduate who has been awarded that qualification has attained, and the typical volume of learning associated with that qualification type.

This program is at AQF Qualification Level 10. Graduates at this level will have systematic and critical understanding of a complex field of learning and specialised research skills for the advancement of learning and/or for professional practice.

The full set of levels criteria and qualification type descriptors can be found by visiting www.aqf.edu.au.

Admission requirements

To be eligible for admission, applicants must satisfy the following requirements:

- possess an appropriate four-year Bachelor degree in Engineering awarded by an Australian university, or an equivalent qualification awarded by an overseas institution, with a high level of academic achievement, normally having achieved a GPA of at least 5.0;
- be able to demonstrate, or be in a position to produce their own substantial, original professional contributions in an appropriate Engineering field.

The standing of degrees awarded by an overseas institution will be determined by reference to the [National Office of Overseas Skills Recognition](#) (NOOSR) or other appropriate information services. Prospective candidates should discuss their previous professional level with the Faculty of Health, Engineering and Sciences prior to applying for admission into the program.

All students are required to satisfy the applicable [English language requirements](#).

If students do not meet the English language requirements they may apply to study a University-approved [English language program](#). On successful completion of the English language program, students may be admitted to an award program.

Program fees

Domestic full fee paying place

Domestic full fee paying places are funded entirely through the full fees paid by the student. Full fees vary depending on the courses that are taken. Students are able to calculate the fees for a particular course via the [Course Fee Finder](#).

Domestic full fee paying students may be eligible to defer their fees through a Government loan called [FEE-HELP](#) provided they meet the residency and citizenship requirements.

Australian citizens, Permanent Humanitarian Visa holders, Permanent Resident visa holders and New Zealand citizens who will be resident outside Australia for the duration of their program pay full tuition fees and are not eligible for [FEE-Help](#).

International full fee paying place

International students pay full fees. Full fees vary depending on the courses that are taken and whether they are studied on-campus, via distance education/online. Students are able to calculate the fees for a particular course via the [Course Fee Finder](#).

Research Training Program (RTP) - Fees Offset scheme

All Australian citizens, Australian permanent residents and New Zealand citizens commencing a Higher Degree by Research (HDR) program will have their tuition fees paid by the Australian Commonwealth Government under the Research Training Program (RTP) Fees Offset scheme. The RTP Fees Offset scheme covers program fees for an HDR student up to a maximum period of four years for full-time study or up to eight years part-time study for a Doctoral program, and up to a maximum period of two years for full-time or four years part-time for a Masters by Research program.

As part of the enrolment process, students are required to submit proof of citizenship or permanent residency status and transcripts of all previous academic study. This documentation enables the University of Southern Queensland to determine eligibility for an RTP Fees Offset place.

If a student's RTP Fees Offset entitlement expires before completion of the program, the student will be required to pay full tuition fees.

Students eligible for an RTP Fees Offset place are those who:

- have not used RTP Fees Offset funding in the previous three years; or
- have already used RTP Fees Offset funding and have successfully completed an HDR program. Once a student completes an HDR program, full entitlements of RTP Fees Offset are restored.

The Australian Commonwealth Government's contribution to program fees must be acknowledged on all published material relating to a research project via a statement identifying the support received through the RTP Fees Offset scheme.

Program structure

This program is a 24-unit program made up of eight single-unit academic courses and 16 units of independent research.

Program completion requirements

Award of an Engineering Doctorate requires the successful external examination of the student's dissertation of research outcomes, work based research project/s and professional learning.

Required time limits

Candidates will normally complete the program within six years of part-time study. Students have a maximum of eight years (part-time) to complete this program. A pro-rata reduction in the maximum time period will apply to students who are admitted to a program with advanced standing.

IT requirements

Access to an up-to-date computer is necessary. On-campus students can access appropriately equipped laboratories, but should consider acquisition of their own computer. External students should be able to access a computer with the following [minimum standards](#) as advised by the University. All students should have access to email and the Internet via a computer running the latest versions of Internet web browsers such as Internet Explorer or Firefox. The University has a wireless network for on-campus students' computers. In order to take advantage of this facility and further enhance their on-campus learning environment, students should consider purchasing a notebook/laptop computer with wireless connectivity. A notebook/laptop may be required for some courses.

Exit points

Candidates who complete four courses from Schedule A may satisfy the requirements for the [Postgraduate Certificate of Engineering](#) program in which case they could exit the program with a [Postgraduate Certificate of Engineering](#).

Candidates who complete seven courses from Schedule A plus [ENG8001 Engineering Research Methods](#) from Schedule B may satisfy the requirements for the [Master of Engineering](#) . in which case they could exit the program with a [Master of Engineering](#) ..

Credit

Exemptions/credit will be assessed based on the [USQ Credit and Exemption Procedure](#).

Enrolment

Candidates for admission to the program should note that some of the courses specify enrolment requirements. This will mean that successful applicants may be enrolling in courses for which they do not have sufficient

pre-requisite knowledge. Applicants should refer to the [course specification](#) to determine the enrolment requirements for the courses they intend enrolling in. Candidates will be expected to rectify any deficiencies in their pre-requisite knowledge by private study, guided if necessary by the examiners of the relevant courses.

Recommended enrolment pattern

Students are able to enrol in any offered mode of a course (on-campus, external or online), regardless of the program mode of study they enrolled in.

Candidates must complete:

- seven of the single-unit courses from Schedule A
- [ENG8001 Engineering Research Methods](#) plus 16 Independent Research in Engineering and Surveying courses in Schedule B.

Within Schedule A, up to four other postgraduate courses may be approved as part of the Engineering Doctorate program. Approval for the inclusion of prior studies must be sought at the time of application for this program.

Course	Year of program and semester in which course is normally studied						Enrolment requirements	Comments
	On-campus (ONC)		External (EXT)		Online (ONL)			
	Year	Sem	Year	Sem	Year	Sem		
Schedule A — Elective Studies								
Candidates must complete seven of the following courses from Group 1 or 2:								
Group 1 — Coursework Electives								
ENG8011				1				
ENG8101 Technological Impact and its Management		1		1				
ENG8102 Towards Sustainable Development [#]				2				
ENG8103 Management of Technological Risk		2		2				
ENG8104 Asset Management in an Engineering Environment		1		1				
ENG8204 Management of Environmental Technology				2				
ENG8205 Project Management Practice		2		2				
ENG8206 Whole of Life Facilities Management				2				
ENG8207 Technological Innovation and Development				2				
Group 2 — Approved Electives								
Up to four other postgraduate courses may be approved as part of the EngD program								
Schedule B — Compulsory Studies								
Candidates must complete the following course:								
ENG8001 Engineering Research Methods	1	1,2			1	1,2		
Plus 16 units of independent research from:								
ENG9011 Engineering Research Project A[^]		1,2		1,2				One unit
ENG9021 Engineering Research Project B		1,2		1,2				Two units

Consult the Handbook on the Web at <http://www.usq.edu.au/handbook/current> for any updates that may occur during the year.
 (DISCONTINUED) Engineering Doctorate (ENGD) - EngD (2019)

Course	Year of program and semester in which course is normally studied						Enrolment requirements	Comments
	On-campus (ONC)		External (EXT)		Online (ONL)			
	Year	Sem	Year	Sem	Year	Sem		
ENG9041 Engineering Research Project D		1,2		1,2				Four units

Footnotes

This course will not be available in 2015. [ECO8012](#) can be undertaken in lieu.
 ^ students may re-enrol

Notes:

Before enrolling in any courses, candidates should read the section entitled Enrolment Requirements.

At least five courses from Schedule A must normally be completed prior to enrolling in the independent research courses.