

UNSW Engineering

Bachelor of Engineering (Honours) (Civil Engineering)

What do civil engineers do?

Civil engineers design, construct, manage, maintain and assess sustainability of modern infrastructure. They work on buildings, bridges, roads, tunnels, airfields, dams, ports, railways, new mine sites, water supply and sewerage schemes, irrigation systems and flood mitigation. Civil engineers undertake office and field work with a range of exciting and rewarding career opportunities available in Australia and abroad.

What will your study involve?

This highly sought-after UNSW degree will give you a solid foundation in civil engineering fundamentals and applications, within a framework of ethical and environmentally sustainable design practice. You'll study structural engineering, geotechnical engineering, transport engineering and water engineering, as well as construction and management. In

your fourth year, you can choose from a full suite of electives. You can also incorporate a Humanitarian Minor into your degree. The development of your thesis involves opportunities to take charge of your learning and focus on the areas that spark your passion. You'll partake in student-led projects and industrial training.

UNSW Civil & Environmental Engineering

- 1st in Australia and 24th globally for Civil and Structural Engineering (QS Subject Rankings 2025).
- We have close links with key professional, commercial and industrial organisations, allowing us to offer exciting and innovative studentled projects and industry-based training.
- Our degrees place a strong emphasis on practical design and problem-solving.

Program details

Lowest Selection Rank (2025): 92.00

Duration: Four-year embedded

honours degree

Study areas: Civil Engineering, Engineering Construction and Management, Geotechnical Engineering, Structural Engineering, Transport Engineering, Water Engineering

Assumed knowledge: HSC level Mathematics Extension 1, Physics

Portfolio Entry: UNSW offers the Faculty of Engineering Admission Scheme (FEAS) which is a pathway for students interested in studying undergraduate engineering to support their academic results, find out more at unsw.to/feas

Accreditation

Your Bachelor of Engineering (Honours) degree is recognised globally, is accredited with Engineers Australia, and is also acknowledged by the Washington Accord, which lets you work in over 20 countries across the globe upon graduation

Career options

Graduates find employment with specialist consulting firms, which vary in size from sole practitioners to major companies employing hundreds of engineers.

Career opportunities include engineering consulting, construction and large public companies, and financial and management

consultancies. Government organisations that construct, manage and maintain public utilities are big employers of civil engineers.

Student Testimonials

"UNSW offers a truly world-class engineering program, a massive amount of clubs and societies, impressive student-led projects and numerous exchange opportunities – it was a definite first choice for me. Some of the projects are tough, but I'm learning so much about the impact of modern engineering."

- George Chard Civil Engineering

Example Study Plan



Year 1		Year 2		Year 3		Year 4	
Term 1	DESN1000 Engineering Design and Innovation	Term 1	ENGG2400 Mechanics of Solids	Term 1	CVEN3203 Applied Geotechnics	Term 1	CVEN4050 (6 UoC) Thesis A <u>OR</u> CVEN4951 (4 UoC) Research Thesis A
	PHYS1121 Physics 1A <u>OR</u> PHYS1131 Higher Physics 1A		MATH2018 Engineering Mathematics 2D OR MATH2019 Mathematics 2D (2E)		CVEN3303 Steel Structures		Discipline Elective Course*
	MATH1131 Mathematics 1A <u>OR</u> MATH1141 Higher Mathematics 1A				CVEN3501 Water Resources Engineering		Discipline Elective Course*
Term 2	MATH1231 Mathematics 1B <u>OR</u> MATH1241 Higher Mathematics 1B	Term 2	DESN2000 Engineering Design & Professional Practice	Term 2	CVEN3304 Concrete Structures	Term 2	CVEN4051 (6 UoC) Thesis B <u>OR</u> CVEN4952 (4 UoC) Research Thesis B
	CVEN2101 Engineering Construction		CVEN2002 Engineering Computations		CVEN3401 Sustainable Transport & Highway Engineering		Discipline Elective Course*
	ENGG1300 Engineering Mechanics		CVEN2303 Structural Analysis and Modelling		CVEN3502 Water and Wastewater Engineering		General Education Course
Term 3	MATS1101 Engineering Materials and Chemistry	Term 3	ENGG2500 Fluid Mechanics for Engineers	Term 3	Free Elective Course	Term 3	Free Elective
	ENGG1811 Computing for Engineers		CVEN3202 Soil Mechanics		CVEN3101 Engineering Operations and Control		Discipline Elective Course*
			General Education Course				CVEN4953^ Research Thesis C (4 UoC)

NOTES

You'll be required to complete 60 days of Industrial Training throughout your degree.

This degree example is indicative only and subject to change at any time without prior notice. For the latest degree information visit the relevant UNSW Handbook page at www.handbook.unsw.edu.au.

UNSW's new 'flex-semester' calendar is scheduled to start in 2028. For more information see https://www.unsw.edu.au/academic-calendar-project.



Visit the Degree Finder page here!