

Course progression map for 2023 commencing students

This progression map provides advice on the suitable sequencing of units and guidance on how to plan unit enrolment for each semester of study. It does not substitute for the list of required units as described in the course 'Requirements' section of the [Handbook](#). Update version: 14 October 2025

E3002 Bachelor of Engineering (Honours) and Bachelor of Arts

Common first year

You do not have VCE Units 3 & 4 Specialist Maths >30 study score <u>and</u> VCE Units 3 & 4 Physics >25 study score: You must enrol in Foundation mathematics (ENG1090) <u>and</u> Foundation physics (PHS1001)					
Year	Sem	Units			
1	Sem 1 Feb	ENG1012 Engineering design	ENG1090 Foundation mathematics *	PHS1001 Foundation physics * <i>Corequisite: ENG1090 *</i>	Arts major
	Sem 2 July	ENG1011 Engineering methods	ENG1005 Engineering mathematics <i>Required: ENG1090 *</i>	ENG1014 Engineering numerical analysis <i>Corequisite: ENG1005</i>	Arts major
1. If you are requiring two foundation units, you will need to take the remaining core unit ENG1013 Engineering smart systems in Semester 1 of Year 2 as an overload, and increase the total credit points needed for the double by 6 points. You cannot swap the semesters of any of the units. 2. Software Engineering specialisation: If you want to complete Software Engineering, you must complete ENG1013 Engineering smart systems in Year 1 (Semester 1) and ENG1011 Engineering methods in Year 2 (Semester 1) as an overload.					

You do not have VCE Units 3 & 4 Specialist Maths >30 study score: You must enrol in Foundation mathematics (ENG1090)					
Year	Sem	Units			
1	Sem 1 Feb	ENG1012 Engineering design	ENG1013 Engineering smart systems	ENG1090 Foundation mathematics *	Arts major
	Sem 2 July	ENG1011 Engineering methods	ENG1005 Engineering mathematics <i>Required: ENG1090 *</i>	ENG1014 Engineering numerical analysis <i>Corequisite: ENG1005</i>	Arts major
Tip: You can swap the semester of ENG1013 and your semester 2 Arts unit.					

You do not have VCE Units 3 & 4 Physics >25 study score: You must enrol in Foundation physics (PHS1001)					
Year	Sem	Units			
1	Sem 1 Feb	ENG1012 Engineering design	ENG1013 Engineering smart systems	PHS1001 Foundation physics * <i>Required: ENG1090 *</i>	Arts major
	Sem 2 July	ENG1011 Engineering methods	ENG1005 Engineering mathematics <i>Required: ENG1090 *</i>	ENG1014 Engineering numerical analysis <i>Corequisite: ENG1005</i>	Arts major
Tip: You can swap the semester of ENG1013 and your semester 2 Arts unit.					

You have completed VCE Units 3 & 4 Physics >25 study score <u>and</u> VCE Units 3 and 4 Specialist Maths >30 study score: No foundation units are required					
Year	Sem	Units			
1	Sem 1 Feb	ENG1011 Engineering methods	ENG1005 Engineering mathematics <i>Required: ENG1090 *</i>	ENG1014 Engineering numerical analysis <i>Corequisite: ENG1005</i>	Arts major
	Sem 2 July	ENG1012 Engineering design	ENG1013 Engineering smart systems	First Year engineering technical elective unit	Arts major
Tip: You can swap the semester of your engineering elective and your semester 1 Arts unit.					

NOTE:

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- * Foundation units: You enrol in the foundation units ENG1090 and/or PHS1001 if you have not completed the [Australian VCE \(Units 3 & 4\) or equivalent](#) Specialist mathematics and/or Physics with the required study score.
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
- For enrolment advice, please refer to the [Course advisers webpage](#).

Course progression map for 2023 commencing students

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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts

Specialisation - Aerospace engineering

	Bachelor of Aerospace Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	MEC2402 Design methods From 2026 Replace with MMA2001	ENG2005 Advanced engineering mathematics	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	MAE2505 Aerospace dynamics From 2026 Replace with MMA2004	MAE2404 Aerodynamics 1 From 2026 See Progression plan	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	MEC2403 Mechanics of materials From 2026 Replace with MMA2002	MAE2402 Thermodynamics and gas dynamics From 2026 See Progression plan	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	MAE3408 Aerospace control In 2025 Replace with MEC3457 From 2026 Replace with MMA2005	MAE3405 Aerospace propulsion	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	MAE3401 Aerodynamics 2 See Progression plan	MAE3404 Flight vehicle dynamics In 2025 Replace with TRC3200 From 2026 Replace with MAE3002	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	MEC3456 Engineering computational analysis From 2026 Replace with MMA3001 - See Progression plan	MAE3411 Aerospace structural mechanics	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	MAE4416 Orbital mechanics and spaceflight dynamics	MEC4404 Professional practice Replace with one Professional Practice domain unit	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	MAE4426 Finite element analysis and composite structures From 2026 Replace with MMA4001	MAE4410 Flight vehicle design	Arts Professional Futures unit 4	

NOTE: Please read the [Aerospace Engineering Progression Plan](#) alongside this course map to guide your progression.

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- MAE2505** - If you have completed MAE2505 as a First Year technical elective, you must replace the core with another unit from the aerospace engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
- For enrolment advice, please refer to the [Course advisers webpage](#).

Course progression map for 2023 commencing students

This progression map provides advice on the suitable sequencing of units and guidance on how to plan unit enrolment for each semester of study. It does not substitute for the list of required units as described in the course 'Requirements' section of the [Handbook](#). Update version: 14 October 2025

E3002 Bachelor of Engineering (Honours) and Bachelor of Arts

Specialisation - Chemical engineering

	Bachelor of Chemical Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	CHM1011 Chemistry 1 or CHM1051 Chemistry 1 advanced	ENG2005 Advanced engineering mathematics	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	CHE2162 Material and energy balances	CHE2161 Mechanics of fluids	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	CHE2164 Thermodynamics 1	CHE3167 Transport phenomena and numerical methods	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	CHE2163 Heat and mass transfer	CHE3162 Process control	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	CHE3161 Chemistry and chemical thermodynamics	CHE3165 Separation processes	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	CHE3166 Process design	CHE3164 Reaction engineering	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	CHE4162 Particle technology	CHE4161 Engineer in society Replace with one Professional Practice domain unit	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	CHE4170 Design project (12 points)		Art Professional Futures unit 4	

NOTE:

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- CHM1011 or CHM1051** - If you have completed either unit as a First Year technical elective, you must replace the core with another unit from the chemical engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- CHE4164 and CHE4165 – From 2025, the integrated industrial project opportunities become part of the ENG4701 and ENG4702 Final year projects.
- CHE4170 - You should not overload in the semester when undertaking this unit.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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Course progression map for 2023 commencing students

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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts Specialisation - Civil engineering

	Bachelor of Civil Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	CIV2282 Transport and traffic engineering	CIV2206 Structural mechanics	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	ENG2005 Advanced engineering mathematics	CIV2235 Structural materials	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	CIV2263 Water systems	CIV3294 Structural design	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	CIV2242 Geomechanics 1	CIV3283 Road engineering	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	CIV4286 Project management for civil engineers <small>Replace with one Professional Practice domain unit</small>	CIV3285 Engineering hydrology	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	CIV3247 Geomechanics 2	CIV3221 Building structures and technology	Arts Professional Futures unit 2 <small>ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)</small>	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	CIV4249 Foundation engineering	CIV4280 Bridge design and assessment	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	CIV4212 Civil and environmental engineering practice	CIV4288 Water treatment	Arts Professional Futures unit 4	

NOTE:

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules. ***ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts Specialisation - Electrical and computer systems engineering

	Bachelor of Electrical and Computer Systems Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year				Arts major unit 1*
Year 1 Semester 2 July					Arts major unit 2*
Year 2 Semester 1 February	ENG2005 Advanced engineering mathematics	ECE2071 Computer organisation and programming <small>Unit title change from 2025</small>	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	ECE2072 Digital systems	ECE2191 Probability models in engineering	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	ECE2131 Electrical circuits	ECE3073 Computer systems	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	ECE2111 Signals and systems	ECE3121 Engineering electromagnetics <small>In 2024: Replace with ECE3122</small>	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	ECE3141 Information and networks	Level 4 or 5 ECE-coded core elective	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	ECE4132 Control system design	ECE3161 Analogue electronics	Arts Professional Futures unit 2 <small>ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)</small>	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	ECE3051 Electrical energy systems	ECE4099 Professional practice <small>Replace with one Professional Practice domain unit</small>	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	ECE4191 Engineering integrated design	Level 4 or 5 ECE-coded core elective	Arts Professional Futures unit 4	

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- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- ECE2072** - If you have completed the unit as a First Year technical elective, you must replace the core with another unit from the electrical and computer systems engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts Specialisation - Environmental engineering

	Bachelor of Environmental Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	BTX3100 Sustainability regulation for business	ENE2021 Energy and the environment	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	ENG2005 Advanced engineering mathematics	CHE2162 Material and energy balances From 2026 Replace with ENE2268	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	CHE2164 Thermodynamics 1	CIV2263 Water systems	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	ENE3031 Building sustainability	ENE2503 Materials properties and recycling	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	CIV3248 Groundwater and environmental geomechanics From 2025: Replace with ENE4043	CIV3285 Engineering hydrology	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	ENE3032 Fate and transport of contaminants	ENE3606 The air environment	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	ENE4042 Environment impact and risk assessment	CIV4286 Project management for civil engineers Replace with one Professional Practice domain unit	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	ENE4041 Soil remediation and solid waste management	CIV4212 Civil and environmental engineering practice	Arts Professional Futures unit 4	

NOTE:

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts Specialisation - Materials engineering

	Bachelor of Materials Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	MTE2101 Atomic-scale structure of materials	MTE2103 Mechanical properties of materials	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	MTE2201 Polymers Unit title change from 2025	ENG2005 Advanced engineering mathematics	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	MTE2102 Phase equilibria and phase transformations	MTE3103 Materials life cycle	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	MTE3101 Materials in a complex world 1: People, projects and data From 2026 Replace with MTE2204	MTE3203 Introduction to ceramics: Properties, processing and applications	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	MTE3102 Plasticity of metals and alloys	MTE2202 Functional materials 1 From 2026 Replace with MTE3104	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	MTE3202 Functional materials 2 Unit title change from 2026	MTE3201 Materials in a complex world 2: Characterisation, identification and selection	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	MTE4101 Integrated design project	MTE4102 Advanced materials processing and manufacturing	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	MTE4201 Materials in a complex world 3: Impact in society Replace with one Professional Practice domain unit	Level 4 or 5 MTE-coded materials engineering technical elective	Arts Professional Futures unit 4	

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- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts Specialisation - Mechanical engineering

	Bachelor of Mechanical Engineering (Honours)	Bachelor of Arts			
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	MEC2403 Mechanics of materials From 2026 Replace with MMA2002	ENG2005 Advanced engineering mathematics	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	MEC2401 Dynamics 1 From 2026 Replace with MMA2004 - See Progression plan	MEC3456 Engineering computational analysis From 2026 Replace with MMA3001 - See Progression plan	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	MEC2402 Design methods From 2026 Replace with MMA2001	MEC2405 Thermodynamics From 2026 See Progression plan	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	MEC2404 Mechanics of fluids From 2026 See Progression plan	MEC3457 Systems and control From 2026 Replace with MMA2005	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	MEC3455 Solid mechanics Unit title change from 2026	MEC3451 Fluid mechanics 2	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	MEC3453 Dynamics 2 Unit title change from 2026	MEC3416 Machine design Unit title change from 2026	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	MEC4404 Professional practice Replace with one Professional Practice domain unit	MEC4408 Thermodynamics and heat transfer Unit title change from 2026	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	MEC4426 Computer-aided design From 2026 Replace with MMA4001	MEC4407 Design project Unit title change from 2026	Arts Professional Futures unit 4	

NOTE: Please read the [Mechanical Engineering Progression Plan](#) alongside this course map to guide your progression.

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- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- MEC2404** - If you have completed MEC2404 as a First Year technical elective, you must replace the core with another unit from the mechanical engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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E3002 Bachelor of Engineering (Honours) and Bachelor of Arts

Specialisation – Robotics and Mechatronics engineering - *Artificial intelligence stream*

	Bachelor of Robotics and Mechatronics Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	ECE2071 Computer organisation and programming <small>Unit title change from 2025</small>	ECE2131 Electrical circuits	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	ENG2005 Advanced engineering mathematics	TRC2201 Mechanics <small>From 2026 Replace with MMA2004</small>	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	MEC2402 Design methods <small>From 2026 Replace with MMA2001</small>	TRC3200 Dynamical systems	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	ECE2072 Digital systems	ECE4078 Intelligent robotics	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	TRC3500 Sensors and artificial perception	ECE3161 Analogue electronics <small>From 2026 Replace with ECE3073</small>	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	TRC3600 Feedback control systems <small>From 2026 Replace with MMA2005</small>	ECE4179 Neural networks and deep learning	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	TRC4800 Robotics	ECE4076 Computer vision	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	ECE4191 Engineering integrated design <small>From 2026 Replace with TRC4407</small>	TRC4002 Professional practice <small>Replace with one Professional Practice domain unit</small>	Arts Professional Futures unit 4	

NOTE: Please read the [Robotics and Mechatronics Engineering Progression Plan](#) alongside this course map to guide your progression.

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- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- ECE2072** - If you have completed the unit as a First Year technical elective, you must replace the core with another unit from the robotics and mechatronics engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
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Course progression map for 2023 commencing students

This progression map provides advice on the suitable sequencing of units and guidance on how to plan unit enrolment for each semester of study. It does not substitute for the list of required units as described in the course 'Requirements' section of the [Handbook](#). Update version: 14 October 2025

E3002 Bachelor of Engineering (Honours) and Bachelor of Arts

Specialisation – Robotics and Mechatronics engineering – *Automation stream*

	Bachelor of Robotics and Mechatronics Engineering (Honours)	Bachelor of Arts			
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	ECE2071 Computer organisation and programming <small>Unit title change from 2025</small>	ECE2131 Electrical circuits	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1013 Engineering smart systems
Year 2 Semester 2 July	ENG2005 Advanced engineering mathematics	TRC2201 Mechanics <small>From 2026 Replace with MMA2004</small>	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	MEC2402 Design methods <small>From 2026 Replace with MMA2001</small>	TRC3200 Dynamical systems	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	ECE2072 Digital systems	TRC4802 Thermo-fluids and power systems <small>In 2025 only: Replace with MEC2404 or MEC2405 From 2026 Replace with MMA2003 – See Progression plan</small>	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	TRC3500 Sensors and artificial perception	ECE3161 Analogue electronics <small>In 2025 only: Complete ECE3161 or ECE3073 From 2026 Replace with ECE3073</small>	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July	TRC3600 Feedback control systems <small>From 2026 Replace with MMA2005</small>	TRC4902 Mechatronics and manufacturing <small>From 2026 Replace with ECE4179</small>	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	ENG4701 Final year project A	TRC4800 Robotics	TRC4200 Engineering cyber-physical systems <small>In Clayton in 2025 only: Replace with ECE4076 or ECE4179 From 2026 Replace with ECE4076</small>	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July	ENG4702 Final year project B	TRC4407 Automation design project <small>In 2024 and 2025 only: Replace with ECE4191</small>	TRC4002 Professional practice <small>Replace with one Professional Practice domain unit</small>	Arts Professional Futures unit 4	

NOTE: Please read the [Robotics and Mechatronics Engineering Progression Plan](#) alongside this course map to guide your progression.

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- ECE2072** - If you have completed the unit as a First Year technical elective, you must replace the core with another unit from the robotics and mechatronics engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
- For enrolment advice, please refer to the [Course advisers webpage](#).

Course progression map for 2023 commencing students

This progression map provides advice on the suitable sequencing of units and guidance on how to plan unit enrolment for each semester of study. It does not substitute for the list of required units as described in the course 'Requirements' section of the [Handbook](#). Update version: 14 October 2025

E3002 Bachelor of Engineering (Honours) and Bachelor of Arts Specialisation - Software engineering

	Bachelor of Software Engineering (Honours)		Bachelor of Arts		
Year 1 Semester 1 February	Common first year			Arts major unit 1*	
Year 1 Semester 2 July				Arts major unit 2*	
Year 2 Semester 1 February	MAT1830 Discrete mathematics for computer science	FIT2085 Introduction to computer science	Arts elective 1	Arts major unit 3*	If two foundation units are required then overload is required for ENG1011 Engineering methods
Year 2 Semester 2 July	FIT2004 Algorithms and data structures	FIT2101 Software engineering process and management	Arts elective 2	Arts major unit 4*	
Year 3 Semester 1 February	FIT2099 Object oriented design and implementation	FIT3159 Computer architecture	Arts elective 3	Arts major unit 5*	
Year 3 Semester 2 July	FIT2107 Software quality and testing	FIT2100 Operating systems	Arts elective 4	Arts major unit 6*	
Year 4 Semester 1 February	FIT3170 Software engineering practice (12 points)	FIT3077 Software engineering: architecture and design	Arts Professional Futures unit 1	Arts major unit 7*	
Year 4 Semester 2 July		FIT3171 Databases	Arts Professional Futures unit 2 ATS2992 Global immersion guarantee program (12 cp) or ATS3173 Workplace innovation project (6 cp)	Arts Professional Futures unit 3	
Year 5 Semester 1 February	FIT4002 Software engineering industry experience studio project (12 points)	FIT4701 Final year project A	FIT4165 Computer networks	Arts major unit 8*	ENG0001 Continuous Professional Development (0 credit points)
Year 5 Semester 2 July		FIT4702 Final year project B	Level 4 or 5 software engineering core elective	Arts Professional Futures unit 4	Arts Professional Futures

NOTE:

- It is important that you follow the course map unit sequence, as units are designed to build on prior knowledge. Taking units out of sequence can disrupt your progression and cause delays due to semester offerings and enrolment rules.
- *ARTS MAJORS AVAILABLE IN THE ENGINEERING/ARTS DOUBLE DEGREE:** Chinese studies, European languages (Extended major available), Indonesian studies, International relations, Japanese studies, Korean studies, Philosophy. *Please note that only these specified arts majors will meet Engineers Australia accreditation.*
- MAT1830 or FIT2085** - If you have completed either unit as a First Year technical elective, you must replace the core with another unit from the software engineering technical electives list or from one of the [engineering minors](#). The replacement unit must be of the same level as the core unit or higher.
- Engineering minors are not available in the Engineering double degree courses.
- You are required to complete at least 420 hours of Continuous Professional Development (CPD) in order to graduate. For further information refer to the [CPD webpage](#).
- Each unit requires 12 hours of work per week. A full-time study week totals 48 hours. If you are unable to commit 48 hours of study due to external commitments, please speak with a course advisor about options to study less units per semester or take some units in the summer semester.
- For enrolment advice, please refer to the [Course advisers webpage](#).