

# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

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No Major

								JOI
				Year	1			
S1								
S2	MATHS 1011 Mathematics IA		PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics		ELEC ENG 1102 Digital Electronics		ENG 1002 Programming (Matlab and C)	
				Year	2			
S1	MATHS 1012 Mathematics IB		COMP SCI 1102 Object Oriented Programming		^ENG 1001 Introduction to Engineering		ELEC ENG 1100 Analog Electronics	
S2	MATHS 2107 Statistics & Numerical Methods II		ELEC ENG 2103 Design & Innovation		ELEC ENG 2104 Digital Signal Processing		ELEC ENG 2106 Vector Calculus & Electromagnetics	
				Year	3			
S1	MATHS 2106 Differential Equations for Engineers II		ELEC ENG 2100 Digital Systems		ELEC ENG 2101 Electronic Circuits		ELEC ENG 2102 Electric Energy Conversion	
S2	ELEC ENG 3110 Electric Power Systems		ELEC ENG 3104 Electric Drive Systems		COMP SCI 2103 Algorithm Design & Data Structures		COMP SCI 2000 Computer Systems	
			In	iterns	ship			
	All Engineering students commencing f	rom	2019 are required to complete a minimur	n of 8	weeks of internship during the course of	their s	tudies – see note below elective table.	
				Year	4			
S1	ELEC ENG 3101 Control		ELEC ENG 3103 Engineering Electromagnetics		COMP SCI 2201 Algorithm & Data Structure Analysis		~Level II or III COMP SCI Elective	
S2	ENG 3004 Systems Engineering & Industry Practice		ELEC ENG 4105 Real-Time and Embedded Systems		E&E Engineering Elective (see elective table)		~Level III COMP SCI Elective	
				Year	5			
S1	ENG 3005 Research Method & Project Management		E&E Engineering Elective (see elective table)		~Level III COMP SCI Elective		~Level III COMP SCI Elective	
S2	ENG 4001A Research Project Part A		ELEC ENG 4100 Business Management Systems		ELEC ENG 4106 Radio Frequency Systems		COMP SCI 3006 Software Engineering & Project	
				Year	6			
S1	ENG 4001B Research Project Part B		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)	
Core	e Course Elective (see table) Dou	uble	Degree Courses					

<sup>^</sup> Unless exempted, International students are required to take ENG 1011 Introduction to Engineering - EAL in lieu of ENG 1001 Introduction to Engineering.

<sup>~</sup> COMP SCI Electives may be chosen from the courses listed in the Program Rules for the Bachelor of Mathematics and Computer Sciences: <a href="https://calendar.adelaide.edu.au/faculty/ecms">https://calendar.adelaide.edu.au/faculty/ecms</a>

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### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES								
	COMP SCI 2103	Algorithm Design & Data Structures		COMP SCI 2103	Algorithm Design & Data Structures				
	COMP SCI 3001	Computer Networks & Applications		COMP SCI 3006	Software Engineering & Project				
	ELEC ENG 3088	Computer Architecture		ELEC ENG 3108	Telecommunications Principles				
	ELEC ENG 4058	Power Quality & Condition Monitoring		ELEC ENG 3113	Principles of Medical Imaging				
S1	ELEC ENG 4063	Communications		ELEC ENG 4061	Image Processing				
31	ELEC ENG 4069	Radar Principles & Systems	S2	ELEC ENG 4067	Antennas and Propagation				
	ELEC ENG 4109	Digital Microelectronics		ELEC ENG 4087	Electricity Market and Power System Operations				
	ELEC ENG 4112	Signal Processing Applications		ELEC ENG 4107	Autonomous Systems				
				ELEC ENG 4111	Distributed Generation Technologies				
				ELEC ENG 4115	Biomedical Instrumentation				

#### **NOTES**

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**Communication Systems Major** 

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			Year	1			
S1							
S2	MATHS 1011 Mathematics IA	PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics		ELEC ENG 1102 Digital Electronics		ENG 1002 Programming (Matlab and C)	
			Year	2			
S1	MATHS 1012 Mathematics IB	COMP SCI 1102 Object Oriented Programming		^ENG 1001 Introduction to Engineering		ELEC ENG 1100 Analog Electronics	
S2	MATHS 2107 Statistics & Numerical Methods II	ELEC ENG 2103 Design & Innovation		ELEC ENG 2104 Digital Signal Processing		ELEC ENG 2106 Vector Calculus & Electromagnetics	
			Year	3			
S1	MATHS 2106 Differential Equations for Engineers II	ELEC ENG 2100 Digital Systems		ELEC ENG 2101 Electronic Circuits		ELEC ENG 2102 Electric Energy Conversion	
S2	ELEC ENG 3108 Telecommunications Principles	ELEC ENG 4054 Telecommunication Systems		COMP SCI 2103 Algorithm Design & Data Structures		COMP SCI 2000 Computer Systems	
		lr	nterns	ship			
	All Engineering students commencing from	n 2019 are required to complete a minimu	m of 8	weeks of internship during the course of	their st	tudies – see note below elective table.	
			Year	4			
S1	ELEC ENG 3101 Control	ELEC ENG 3103 Engineering Electromagnetics		COMP SCI 2201 Algorithm & Data Structure Analysis		~Level II or III COMP SCI Elective	
S2	ENG 3004 Systems Engineering & Industry Practice	COMP SCI 3006 Software Engineering & Project		~Level III COMP SCI Elective		~Level II or III COMP SCI Elective	
			Year	5			
S1	COMP SCI 3001 Computer Networks & Applications	ENG 3005 Research Method & Project Management		~Level III COMP SCI Elective		~Level III COMP SCI Elective	
S2	ENG 4001A Research Project Part A	ELEC ENG 4106 Radio Frequency Systems		ELEC ENG 4100 Business Management Systems		E&E Engineering Elective (see elective table)	
			Year	6			
S1	ENG 4001B Research Project Part B	ELEC ENG 4063 Communications		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)	
Cor	e Course Major course Ele	ctive (see table) Double Degree Co	urses				

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### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES									
	COMP SCI 3007	Artificial Intelligence		ELEC ENG 4061	Image Processing					
	ELEC ENG 3088	Computer Architecture		ELEC ENG 4067	Antennas and Propagation					
<b>S1</b>	ELEC ENG 4069	Radar Principles & Systems	<b>S2</b>	ELEC ENG 4105	Real-Time & Embedded Systems					
	ELEC ENG 4109	Digital Microelectronics								
	ELEC ENG 4112	Signal Processing Applications								

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Computer Engineering Major

	Year 1							
S1								
S2	MATHS 1011 Mathematics IA		PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics		ELEC ENG 1102 Digital Electronics		ENG 1002 Programming (Matlab and C)	
				Year	2			
S1	MATHS 1012 Mathematics IB		COMP SCI 1102 Object Oriented Programming		^ENG 1001 Introduction to Engineering		ELEC ENG 1100 Analog Electronics	
S2	MATHS 2107 Statistics & Numerical Methods II		ELEC ENG 2103 Design & Innovation		ELEC ENG 2104 Digital Signal Processing		ELEC ENG 2106 Vector Calculus & Electromagnetics	
				Year				
S1	MATHS 2106 Differential Equations for Engineers II		ELEC ENG 2100 Digital Systems		ELEC ENG 2101 Electronic Circuits		ELEC ENG 2102 Electric Energy Conversion	
S2	COMP SCI 2103 Algorithm Design & Data Structures		ELEC ENG 4105 Real-Time and Embedded Systems		ENG 3004 Systems Engineering & Industry Practice		COMP SCI 2000 Computer Systems	
			lı	nterns	ship			
	All Engineering students commencing	from	2019 are required to complete a minimu	m of 8	B weeks of <u>internship</u> during the course or	f their st	tudies – see note below elective table.	
				Year	4			
S1	COMP SCI 3001 Computer Networks & Applications		ELEC ENG 3101 Control		ELEC ENG 3103 Engineering Electromagnetics		COMP SCI 2201 Algorithm & Data Structure Analysis	
S2	COMP SCI 3004 Operating Systems		E&E Engineering Elective (see elective table)		~Level II or III COMP SCI Elective		~Level II or III COMP SCI Elective	
				Year	5			_
S1	ENG 3005 Research Method & Project Management		E&E Engineering Elective (see elective table)		~Level III COMP SCI Elective		~Level III COMP SCI Elective	
S2	ENG 4001A Research Project Part A		ELEC ENG 4100 Business Management Systems		COMP SCI 3006 Software Engineering & Project		~Level III COMP SCI Elective	
				Year	6			
S1	ENG 4001B Research Project Part B		ELEC ENG 4109 Digital Microelectronics		ELEC ENG 3088 Computer Architecture		E&E Engineering Elective (see elective table)	
Core	e Course Major course	Elec	tive (see table) Double Degree Co	ourses				

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### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES								
	COMP SCI 3007	Artificial Intelligence		COMP SCI 3006	Software Engineering & Project				
	COMP SCI 3308	Cybersecurity Fundamentals		COMP SCI 3307	Secure Programming				
C1	ELEC ENG 4112	Signal Processing Applications	S2	ELEC ENG 3104	Electric Drive Systems				
31			32	ELEC ENG 3108	Telecommunications Principles				
				ELEC ENG 4061	Image Processing				
				ELEC ENG 4106	Radio Frequency Systems				

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Cybersecurity Major

		Ye	ear	1		•		
S1								
S2	MATHS 1011 Mathematics IA	PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics		ELEC ENG 1102 Digital Electronics		ENG 1002 Programming (Matlab and C)		
		Yε	ear	2				
S1	MATHS 1012 Mathematics IB	COMP SCI 1102 Object Oriented Programming	$\supset$	^ENG 1001 Introduction to Engineering		ELEC ENG 1100 Analog Electronics		
S2	MATHS 2107 Statistics & Numerical Methods II	ELEC ENG 2103 Design & Innovation		ELEC ENG 2104 Digital Signal Processing		COMP SCI 2103 Algorithm Design & Data Structures		
		Ye	ear	3				
S1	MATHS 2106 Differential Equations for Engineers II	ELEC ENG 2101 Electronic Circuits		ELEC ENG 2102 Electric Energy Conversion		COMP SCI 2201 Algorithm & Data Structure Analysis		
S2	Vector Calculus & Electromagnetics	~Level II or III COMP SCI Elective		~Level II or III COMP SCI Elective		COMP SCI 2000 Computer Systems		
		Inte	rns	hip				
	All Engineering students commencing fro	m 2019 are required to complete a minimum o	of 8	weeks of internship during the course of the	neir s	tudies – see note below elective table.		
		Υe	ear	4				
<b>S1</b>	ELEC ENG 3101 Control	ELEC ENG 3103 Engineering Electromagnetics		ELEC ENG 2100 Digital Systems		~Level II or III COMP SCI Elective		
<b>S2</b>	COMP SCI 3307 Secure Programming	COMP SCI 3004 Operating Systems		ENG 3004 Systems Engineering & Industry Practice		~Level II or III COMP SCI Elective		
		Ye	ear	5				
<b>S1</b>	COMP SCI 3308 Cybersecurity Fundamentals	ENG 3005 Research Method & Project Management		~Level III COMP SCI Elective		~Level III COMP SCI Elective		
S2	ENG 4001A Research Project Part A	ELEC ENG 4100 Business Management Systems		COMP SCI 3006 Software Engineering & Project		~Level III COMP SCI Elective		
		Ye	ear	6				
S1	ENG 4001B Research Project Part B	E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)		
Core	re Course Major course Elective (see table) Double Degree Courses							

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### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES									
	COMP SCI 3001	Computer Networks & Applications		COMP SCI 3006	Software Engineering & Project					
	ELEC ENG 4063	Communications		ELEC ENG 3104	Electric Drive Systems					
C1	ELEC ENG 4109	Digital Microelectronics	S2	ELEC ENG 3108	Telecommunications Principles					
31			32	ELEC ENG 4061	Image Processing					
				ELEC ENG 4105	Real-Time & Embedded Systems					
				ELEC ENG 4106	Radio Frequency Systems					

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# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

**Defence Systems Major** 

							Defence bystems way	101
			,	Year	1			
S1								
S2	MATHS 1011 Mathematics IA		PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics		ELEC ENG 1102 Digital Electronics		ENG 1002 Programming (Matlab and C)	
			,	Year	2			
S1	MATHS 1012 Mathematics IB		COMP SCI 1102 Object Oriented Programming		^ENG 1001 Introduction to Engineering		ELEC ENG 1100 Analog Electronics	
S2	MATHS 2107 Statistics & Numerical Methods II		ELEC ENG 2103 Design & Innovation		ELEC ENG 2104 Digital Signal Processing		ELEC ENG 2106 Vector Calculus & Electromagnetics	
			•	Year	3			
S1	MATHS 2106 Differential Equations for Engineers II		ELEC ENG 2100 Digital Systems		ELEC ENG 2101 Electronic Circuits		ELEC ENG 2102 Electric Energy Conversion	
S2	ENG 3305 Human Factors for Decision Making		ELEC ENG 4107 Autonomous Systems		COMP SCI 2000 Computer Systems		COMP SCI 2103 Algorithm Design & Data Structures	
			Int	terns	hip			
	All Engineering students commencing fr	rom	2019 are required to complete a minimum	of 8	weeks of internship during the course of the	eir st	tudies – see note below elective table.	
			,	Year	4			
S1	ELEC ENG 3101 Control		POLIS 1104 Introduction to Comparative Politics		COMP SCI 2201 Algorithm & Data Structure Analysis		~Level II or III COMP SCI Elective	
S2	ENG 3004 Systems Engineering & Industry Practice		ELEC ENG 4106 Radio Frequency Systems		E&E Engineering Elective (see elective table)		~Level III COMP SCI Elective	
			,	Year	5			
<b>S1</b>	ENG 3005 Research Method & Project Management		ELEC ENG 3103 Engineering Electromagnetics		~Level III COMP SCI Elective		~Level III COMP SCI Elective	
	ENG 4001A Research Project Part A		ENG 4020 Complex Systems Engineering		ELEC ENG 4100 Business Management Systems		COMP SCI 3006 Software Engineering & Project	
				Year				
S1	ENG 4001B  Research Project Part B  Course Major course		ENG 4010  Defence Leadership  tive (see table)  Double Degree Cou		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)	
i mra	a course I Maior course			ILCOC				

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### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES									
	COMP SCI 2103	Algorithm Design & Data Structures		COMP SCI 2103	Algorithm Design & Data Structures					
	COMP SCI 3001	Computer Networks & Applications		ELEC ENG 3108	Telecommunications Principles					
	ELEC ENG 4063	mmunications		ELEC ENG 4061	Image Processing					
3	ELEC ENG 4069	Radar Principles & Systems	32	ELEC ENG 4067	Antennas & Propagation					
	ELEC ENG 4109	Digital Microelectronics		ELEC ENG 4111	Distributed Generation Technologies					
	ELEC ENG 4112	Signal Processing Applications								

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Core Course

Major course

## 2022 Study Plan

# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

Medical Technologies Major

		Yea		1001101081001111101
S1				
S2	MATHS 1011 Mathematics IA	PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics	ELEC ENG 1102 Digital Electronics	ENG 1002 Programming (Matlab and C)
		Yea	r 2	
<b>S1</b>	MATHS 1012 Mathematics IB	COMP SCI 1102 Object Oriented Programming	^ENG 1001 Introduction to Engineering	ELEC ENG 1100 Analog Electronics
<b>S2</b>	MATHS 2107 Statistics & Numerical Methods II	ELEC ENG 2103 Design & Innovation	ELEC ENG 2104 Digital Signal Processing	ELEC ENG 2106 Vector Calculus & Electromagnetics
		Yea	r 3	
S1	ANAT SC 1102 Human Anatomy and Physiology IA	ELEC ENG 2101 Electronic Circuits	ELEC ENG 2102 Electric Energy Conversion	MATHS 2106 Differential Equations for Engineers II
S2	ELEC ENG 3113 Principles of Medical Imaging	ELEC ENG 4115 Biomedical Instrumentation	COMP SCI 2000 Computer Systems	COMP SCI 2103 Algorithm Design & Data Structures
		Intern	ship	
	All Engineering students commencing from	n 2019 are required to complete a minimum of	8 weeks of <u>internship</u> during the course of their	studies – see note below elective table.
		Yea	r 4	
S1	ENG 3101 Introduction to Medical Technologies	ELEC ENG 3101 Control	ELEC ENG 2100 Digital Systems	COMP SCI 2201 Algorithm & Data Structure Analysis
S2	MECH ENG 4101 Biomechanical Engineering	ENG 3004 Systems Engineering & Industry Practice	E&E Engineering Elective (see elective table)	E&E Engineering Elective (see elective table)
		Yea	r 5	
S1	ENG 3005 Research Method & Project Management	ELEC ENG 3103 Engineering Electromagnetics	~Level II or III COMP SCI Elective	~Level III COMP SCI Elective
S2	ENG 4001A Research Project Part A	ELEC ENG 4100 Business Management Systems	COMP SCI 3006 Software Engineering & Project	~Level III COMP SCI Elective
		Yea	r 6	
S1	ENG 4001B Research Project Part B	E&E Engineering Elective (see elective table)	PHYSIOL 2510 Physiology IIA: Heart, Lung & Neuromuscular Systems	~Level III COMP SCI Elective

Elective (see table)

**Double Degree Courses** 

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### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES										
	ANAT SC 2006	Foundations of Human Neuroanatomy		COMP SCI 2103	Algorithm Design & Data Structures						
	ANAT SC 2109	Biology and Development of Human Tissues		ELEC ENG 3108	Telecommunications Principles						
١,	COMP SCI 2103	Algorithm Design & Data Structures	63	ELEC ENG 4061	Image Processing						
3	ELEC ENG 4063	Communications	32	ELEC ENG 4067	Antennas & Propagation						
	ELEC ENG 4109	Digital Microelectronics									
	ELEC ENG 4112	Signal Processing Applications									

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# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

Renewable Energy Major

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	Year 1											
S1												
S2	MATHS 1011	]	PHYSICS 1510	]	ELEC ENG 1102		ENG 1002					
32	Mathematics IA	Ш	Physics 1E: Mechanics & Thermodynamics	Ш	Digital Electronics		Programming (Matlab and C)					
	Year 2											
S1	MATHS 1012		COMP SCI 1102		^ENG 1001		ELEC ENG 1100					
31	Mathematics IB		Object Oriented Programming		Introduction to Engineering		Analog Electronics					
S2	MATHS 2107		ELEC ENG 2103		ELEC ENG 2104		ELEC ENG 2106					
<u> </u>	Statistics & Numerical Methods II		Design & Innovation		Digital Signal Processing		Vector Calculus & Electromagnetics					
				Year								
S1	MATHS 2106	П	ELEC ENG 2100		ELEC ENG 2101		ELEC ENG 2102					
	Differential Equations for Engineers II		Digital Systems		Electronic Circuits		Electric Energy Conversion					
S2	ELEC ENG 3104 Electric Drive Systems	П	ELEC ENG 3110		COMP SCI 2000		COMP SCI 2103					
	Electric Drive Systems		Electric Power Systems		Computer Systems		Algorithm Design & Data Structures					
				nterns	<u> </u>							
	All Engineering students commencing	from	2019 are required to complete a minimul	m of 8	weeks of <u>internship</u> during the course of	their s	tudies – see note below elective table.					
				Year	4							
<b>C</b> 4	ELEC ENG 3101 Control		ENG 3005		COMP SCI 2201		~Level II or III COMP SCI Elective					
S1			Research Method & Project Management		Algorithm & Data Structure Analysis			Ш				
	ELEC ENG 4111		CHEM ENG 4048		ENG 3004		~Level III COMP SCI Elective					
S2	Distributed Generation Technologies	Ш	Biofuels, Biomass and Wastes	Ш	Systems Engineering & Industry Practice			Ш				
	Year 5											
	ELEC ENG 3103		E&E Engineering Elective		~Level III COMP SCI Elective		~Level III COMP SCI Elective					
S1	Engineering Electromagnetics	Ш	(see elective table)		<u> </u>			Ш				
S2	ENG 4001A		ELEC ENG 4100		E&E Engineering Elective		COMP SCI 3006					
32	Research Project Part A	Ш	Business Management Systems	Ш	(see elective table)		Software Engineering & Project	Ш				
				Year	6							
S1	ENG 4001B		MECH ENG 4064		E&E Engineering Elective		E&E Engineering Elective					
<u></u>	Research Project Part B	Ш	Renewable Power Technologies		(see elective table)		(see elective table)					
					Core Course Major course Flective (see table) Double Degree Courses							

<sup>^</sup> Unless exempted, International students are required to take ENG 1011 Introduction to Engineering - EAL in lieu of ENG 1001 Introduction to Engineering.

<sup>~</sup> COMP SCI Electives may be chosen from the courses listed in the Program Rules for the Bachelor of Mathematics and Computer Sciences: <a href="https://calendar.adelaide.edu.au/faculty/ecms">https://calendar.adelaide.edu.au/faculty/ecms</a>



# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES										
	CON	MP SCI 2103	Algorithm Design & Data Structures		COMP SCI 2103	Algorithm Design & Data Structures					
	con	MP SCI 3001	Computer Networks & Applications	52	ELEC ENG 3108	Telecommunications Principles					
	ELEC ENG 4058	EC ENG 4058	Power Quality & Condition Monitoring		ELEC ENG 4087	Electricity Market and Power System Operations					
	ELE	ELEC ENG 4109	Digital Microelectronics		MECH ENG 4145	Sustainable Thermal Technologies (not offered 2022)					

#### **NOTES**

**Internships:** All Engineering students commencing from 2019 are required to complete a minimum of 8 weeks of internship during the course of their studies. Internships are self-sourced and further information can be found on the Engineering Internships web page: <a href="https://ecms.adelaide.edu.au/study-with-us/student-support/internships/engineering">https://ecms.adelaide.edu.au/study-with-us/student-support/internships/engineering</a>.

**Program Rules:** For academic program rules please refer to the following website: https://calendar.adelaide.edu.au/faculty/ecms

#### Information and Enrolment Advice:

Ask ECMS

Email: askecms@adelaide.edu.au

Website: https://ecms.adelaide.edu.au/study-with-us/student-support



# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

Smart Technologies Major

	Year 1								
S1									
S2	MATHS 1011 Mathematics IA		PHYSICS 1510 Physics 1E: Mechanics & Thermodynamics		ELEC ENG 1102 Digital Electronics		ENG 1002 Programming (Matlab and C)		
				Year	2				
S1	MATHS 1012 Mathematics IB		COMP SCI 1102 Object Oriented Programming		^ENG 1001 Introduction to Engineering		ELEC ENG 1100 Analog Electronics		
<b>S2</b>	MATHS 2107 Statistics & Numerical Methods II		ELEC ENG 2103 Design & Innovation		ELEC ENG 2104 Digital Signal Processing		ELEC ENG 2106 Vector Calculus & Electromagnetics		
				Year					
S1	MATHS 2106 Differential Equations for Engineers II		ELEC ENG 2100 Digital Systems		ELEC ENG 2101 Electronic Circuits		ELEC ENG 2102 Electric Energy Conversion		
S2	MECH ENG 3032 Micro-Controller Programming		ELEC ENG 4107 Autonomous Systems		COMP SCI 2103 Algorithm Design & Data Structures		COMP SCI 2000 Computer Systems		
			In	iterns	hip				
	All Engineering students commencing f	rom	2019 are required to complete a minimur	n of 8	weeks of internship during the course of	their s	tudies – see note below elective table.		
				Year	4				
S1	ELEC ENG 3101 Control		ELEC ENG 3103 Engineering Electromagnetics		COMP SCI 2201 Algorithm & Data Structure Analysis		~Level II or III COMP SCI Elective		
S2	ELEC ENG 3108 Telecommunications Principles		ENG 3004 Systems Engineering & Industry Practice		E&E Engineering Elective (see elective table)		~Level II or III COMP SCI Elective		
				Year	5				
<b>S1</b>	COMP SCI 3001 Computer Networks & Applications		ENG 3005 Research Method & Project Management		~Level III COMP SCI Elective		~Level III COMP SCI Elective		
S2	ENG 4001A Research Project Part A		ELEC ENG 4100 Business Management Systems		COMP SCI 3006 Software Engineering & Project		~Level III COMP SCI Elective		
				Year	6				
<b>S1</b>	ENG 4001B Research Project Part B		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)		E&E Engineering Elective (see elective table)		
Core	Core Course Major course Elective (see table) Double Degree Courses								

<sup>^</sup> Unless exempted, International students are required to take ENG 1011 Introduction to Engineering - EAL in lieu of ENG 1001 Introduction to Engineering.

<sup>~</sup> COMP SCI Electives may be chosen from the courses listed in the Program Rules for the Bachelor of Mathematics and Computer Sciences: <a href="https://calendar.adelaide.edu.au/faculty/ecms">https://calendar.adelaide.edu.au/faculty/ecms</a>

# Bachelor of Engineering (Honours) (Electrical and Electronic) with Bachelor of Mathematical and Computer Sciences – Computer Science Major - Semester 2 Start

### **Electives Table**

	CHOOSE FROM THE FOLLOWING ELECTRICAL & ELECTRONIC (E&E) ENGINEERING ELECTIVES									
	ELEC ENG 3088	Computer Architecture		COMP SCI 3006	Software Engineering & Project					
	ELEC ENG 4063	Communications		ELEC ENG 3108	Telecommunications Principles					
<b>S1</b>	ELEC ENG 4069	Radar Principles & Systems		ELEC ENG 4061	Image Processing					
	ELEC ENG 4109	Digital Microelectronics		ELEC ENG 4067	Antennas & Propagation					
	ELEC ENG 4112	Signal Processing Applications								

#### **NOTES**

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