

## Bachelor of Science (Data Science)

Useful study planning/enrolment resources:

[Course and Subject Handbook](#)

[Academic Calendars](#)

[Class Registration](#)

[Enrolment Resources](#)

The information in the study planner is current at the time of creation may be subject to future change.

**Attention International Student visa holders:** To remain compliant with your enrolments requirements as a Student visa holder you are required to enrol in at least one On-Campus, Multi-Modal or WIL subject offering in each compulsory study period and you cannot enrol in more than one third (33%) of your total course load through online or distance learning. To complete your course within your CoE duration students must maintain sufficient subject enrolment.

**If you are receiving US Federal Aid,** there are further compliance considerations. Please contact [financialaid@jcu.edu.au](mailto:financialaid@jcu.edu.au) to confirm compliance of your subject selections.

**Student Resources:** If you require advice about your study plan, choosing electives, or which subjects to enrol in, please contact your major advisor or degree coordinator ([CSE Course and Major Advisors](#)). For information on available elective subject options please also refer to the Study Area guide ([2026 JCU STUDY AREA GUIDE — College of Science & Engineering](#)).

Your plan may include subjects labelled with **\*Intensive on-campus requirements**. These subjects involve mandatory on-campus or fieldwork attendance with extended hours over a dedicated face-to-face period. Please check the face-to-face dates for the subject in the [subject handbook](#) and do not enrol in subjects with overlapping face-to-face dates. For more information, see the CSE Student Guide to Succeeding in Trimester 2 Intensives on the CSE [Student Resources](#) webpage.

	TRIMESTER 1	TRIMESTER 2	TRIMESTER 3
2026			MA1020:03 Preparatory Mathematics (or any Level 1, 2, 3 or 5 subject if already satisfied via previous study)
			<b>Major</b> MA1580:03 Foundations of Data Science
			Elective <b>OR</b> Second Major Subject (Depending on chosen structure)

	TRIMESTER 1	TRIMESTER 2	TRIMESTER 3
2027	CH1020:03 Preparatory Chemistry (or any Level 1, 2, 3 or 5 subject if already satisfied via previous study)	<b>Major</b> MA1000:03 Mathematical Foundations <i>PREREQ: MA1020 or MA0020 or BR0202 or High School Senior Mathematics or equivalent</i>	SC1102:03 Modelling Natural Systems <i>PREREQ: MA1020 or MA0020 or Senior Mathematics or equivalent</i> <b>OR</b> SC1109:03 Modelling Natural Systems-Advanced <sup>^</sup> <i>PREREQ: MA1000 or MA1009</i>
	SC1101:03 Science, Technology and Truth	<b>Major</b> Select 3 credit points from <a href="#">List 1</a>	Elective <b>OR</b> Second Major Subject (Depending on chosen structure)
	Elective subject from <a href="#">List 1</a> ( <b>Breadth Subjects</b> )* <i>*Students studying Data Science as a single major must select CP1401:03 Problem Solving and Programming I</i> <b>OR</b> Second Major Subject (Depending on chosen structure)		Elective subject from <a href="#">List 1</a> ( <b>Breadth Subjects</b> )* <i>*Students studying Data Science as a single major must select CP1404:03 Programming II</i> <b>OR</b> Second Major Subject (Depending on chosen structure)

<sup>^</sup>Note: SC1109 is compulsory in the Advanced BSc Program and should be taken instead of SC1102 if you are considering that pathway.

	TRIMESTER 1	TRIMESTER 2	TRIMESTER 3
2028	SC2202:03 Quantitative Methods in Science <i>PREREQ: SC1102 or SC1109</i> <b>OR</b> SC2209:03 Quantitative Methods in Science-Advanced <i>PREREQ: MA1003 and ((SC1109 plus 6 credit points of other Level 1 subjects) or admission in 116409)</i>	<b>Major</b> Select 3 credit points from <a href="#">List 1</a>	SC3008:03 Professional Placement (TR1, TR2, TR3) <i>PREREQ: 12 credit points of second year subjects</i> <b>OR</b> SC3003:03 Science Research Internship* (TR1, TR2, TR3) <i>PREREQ: 15 credit points of Science Level 2 subjects plus a GPA of 5.5 or above</i> <i>*Students must source a supervisor for their internship before enrolment</i>
	Elective <b>OR</b> Second Major Subject (Depending on chosen structure)	Select 3 credit points of any Level 1, 2, 3 or 5 subjects* <i>*Recommend MA1003:03 Mathematical Techniques to allow selection of alternate core MA3212</i>	<b>Major</b> MA2405:03 Advanced Statistical Modelling <i>PREREQ: (MA1401 or BZ2001 or MA2401 or SC2202 or SC2209) and MA1000</i>
	Elective <b>OR</b> Second Major Subject (Depending on chosen structure)		<b>Major</b> MA3405:03 Statistical Data Mining for Big Data <i>PREREQ: MA2405 or MA2000 or SC2202 or SC2209</i>

	TRIMESTER 1	TRIMESTER 2	TRIMESTER 3
<b>2029</b>	<p><b>Major</b>            MA3831:03 Natural Language Processing, Web Scraping and Large Data Processing  <i>PREREQ: CP1404 and MA3405</i></p>	<p><b>Major</b>            MA3832:03 Neural Network and Deep Learning  <i>PREREQ: (MA3405 or MA5405) and CP1404</i>  <b>OR</b>            MA3212:03 Optimisation and Operations Research  <i>PREREQ: MA2000</i></p>	
	<p>Select 3 credit points of <a href="#">List 2 (Skills Subjects)</a>*  <i>*Recommend MA2000:03 Mathematics for Scientists and Engineers to enable selection of alternate core MA3212</i></p>	<p>Elective  <b>OR</b>            Second Major Subject  <i>(Depending on chosen structure)</i></p>	
	<p>Elective  <b>OR</b>            Second Major Subject  <i>(Depending on chosen structure)</i></p>		

**COURSE HANDBOOK**

[Bachelor of Science](#)

[Data Science Major](#)