

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)								
AY2025 - 2026 Intake onwards								
Track 1 (Global Immersion in WUR)								
FYP with Professional Attachment								
Programme	Year of Study	Number of Academic Units (AU)						
		Major Requirement		Interdisciplinary Collaborative Core			Broadening and Deepening Electives (BDE)	Total
		Core (C)	Major PE (MPE)	Common Core (CC)	Professional Series (PS)	Care, Serve and Learn (CSL)		
Chemistry and Biological Chemistry	1	18/19*		8			1	27/28*
	2	22		6	3	3	6	40
	3	18	6 [3]		8		9	41 [3]
	4		16				12	28
	Total	58/59*	22 [3]	14	11	3	28	136/137* [3]
BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (FF)								
Category							AU	Total AU
Interdisciplinary Collaborative Core (ICC)	Common Core (University-level)							
	CC0001 Inquiry & Communication in an Interdisciplinary World						2	14
	CC0003 Ethics & Civics in a Multi-Cultural World						2	
	ML0004 Career Design & Workplace Readiness in the V.U.C.A World						2	
	CC0015 Health & Wellbeing						2	
	CC0006 Sustainability: Society, Economy & Environment						3	
	CC0007 Science & Technology for Humanity						3	
	Professional Series (College-level)							
	HW0218 Communication Across the Sciences						2	11
	PS0002 Introduction to Data Science and Artificial Intelligence						3	
CM4082 Professional Attachment						5		
MLXXX Profession Preparation						1		
XXXXXX Care, Serve, Learn (University-level)						3	3	
Major Requirement	CHEM Core							
	CM1001	Foundations of Chemistry I					4	58/59*
	CM1002	Foundations of Chemistry II					4	
	CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering					1	
	MH1802	Calculus for the Sciences					4	
	CM1804	Mathematics for Chemistry					2	
	PH1011	Physics or PH1012* Physics A					3/4*	
	CM2021	Inorganic and Bioinorganic Chemistry					3	
	CM2011	Analytical Chemistry					3	
	CM2061	Chemistry & Biological Chemistry Laboratory 1					3	
	PS0001	Introduction to Computational Thinking					3	
	CM2031	Organic and Bioorganic Chemistry					3	
	CM2041	Physical and Biophysical Chemistry 1					3	
	CM2062	Chemistry & Biological Chemistry Laboratory 2					3	
	CB2002	Introduction to Chemical and Biological Safety					1	
	CM3011 <sup>&amp;</sup>	Chemical Spectroscopy and Applications					3	
	CM3041 <sup>&amp;</sup>	Physical and Biophysical Chemistry 2					3	
	CM3062	Chemistry & Biological Chemistry Laboratory 4					3	
	CM3031 <sup>&amp;</sup>	Organic Reaction Mechanisms and Synthesis					3	
	CM3021 <sup>&amp;</sup>	Organometallic Chemistry					3	
	CM3061	Chemistry & Biological Chemistry Laboratory 3					3	
CHEM Major Prescribed Electives (MPE)								
CM4080 Honours Project 1						10	22	
4 x MPEs						12^		
2nd Major in Future Food (FF)	Food Future Compulsory Courses							
	CH5210	Food Process Technologies and New Production Systems					3	27^
	CH5211	Data Analytics in Food Systems					3	
	CH5220	Food Standard - Food Safety & Risk Assessment					3	
	CH5222	Future Foods - Introduction to Advanced Meat					3	
	CM5101	Food Chemistry & Nutrition					3	
	Electives (Choose 5)							
4 WUR Electives						12		
1 NTU Electives^						-		
BDE	Any 1 BDE						1	1
Total								136/137*

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3011, CM3021, CM3031, CM3041 are offered in both semesters.

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

[ ] AU of courses that could be used to fulfil Core/MPE requirement and 2nd Major requirement concurrently

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)			
Suggested Study Plan for AY2025-2026 intake			
Track 1 (Global Immersion in WUR)			
FYP with Professional Attachment			
Year 1 Semester 1			
Course		Type	AU
CM1001	Foundations of Chemistry I	C	4
MH1802	Calculus for the Sciences	C	4
CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering	C	1
CC0001	Inquiry & Communication in an	CC	2
CC0015	Health & Wellbeing	CC	2
	BDE 1	BDE	1
HW0001	Introduction to Academic Communication #		
			14
Year 1 Semester 2			
Course		Type	AU
CM1002	Foundations of Chemistry II	C	4
CM1804	Mathematics for Chemistry	C	2
PH1011/	Physics <u>or</u>	C	3
PH1012*	Physics A (For students without 'A' Ethics & Civics in a Multi-Cultural World	C	4
CC0003		CC	2
ML0004	Career Design & Workplace Readiness in the V.U.C.A World	CC	2
			13/14*
# for students who have not cleared QET			
Year 2 Semester 1			
Course		Type	AU
CM2011	Analytical and Bioanalytical Chemistry	C	3
CM2021	Inorganic and Bioinorganic Chemistry	C	3
CM2061	Chemistry & Biological Chemistry Laboratory 1	C	3
PS0001	Introduction to Computational Thinking	C	3
CC0006	Sustainability: Society, Economy & Environment	CC	3
XXXXXX	Care, Serve, Learn	CSL	3
CM5101	Food Chemistry & Nutrition	BDE	3
			21
Year 2 Semester 2			
Course		Type	AU
CM2031	Organic and Bioorganic Chemistry	C	3
CM2041	Physical and Biophysical Chemistry 1	C	3
CM2062	Chemistry & Biological Chemistry Laboratory 2	C	3
CB2002	Introduction to Chemical and Biological Safety	C	1
PS0002	Introduction to Data Science and Artificial Intelligence	PS	3
CC0007	Science & Technology for Humanity	CC	3
CH5220	Food Standard - Food Safety and Risk Assessment	BDE	3
			19
Year 3 Semester 1			
Course		Type	AU
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3062	Chemistry & Biological Chemistry Laboratory 4	C	3
CM4013 <sup>^</sup>	Current Topics in Analytical Chemistry	MPE	3
	CHEM MPE 2	MPE	3
MLXXXX	Profession Preparation	PS	1
CH5210	Food Process Technologies and New Production System	BDE	3
			19
Year 3 Semester 2			
Course		Type	AU
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3061	Chemistry & Biological Chemistry Laboratory 3	C	3
CH5211	Data Analytics in Food Systems	BDE	3
CH5222	Future Foods - Introduction to Advanced Meet Alternative	BDE	3
HW0218	Communication Across the Sciences	PS	2
			22
Year 3 Special Sem			
CM4082	Professional Attachment	PS	5
			22
Year 4 Semester 1			
Course		Type	AU
	FF WUR Elective 1	BDE	3
	FF WUR Elective 2	BDE	3
	FF WUR Elective 3	BDE	3
	FF WUR Elective 4	BDE	3
			12
Year 4 Semester 2			
Course		Type	AU
CM4080	Honours Project 1	MPE	10
	CHEM MPE 3	MPE	3
	CHEM MPE 4	MPE	3
			16
Total (AU)			136/137*

This study plan is meant as a guide.

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3xxx refers to CM3011, CM3021, CM3031, CM3041 - These courses are offered in both semesters

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)								
AY2025 - 2026 Intake onwards								
Track 1 (Global Immersion in WUR)								
with Professional Internship								
Programme	Year of Study	Number of Academic Units (AU)						
		Major Requirement		Interdisciplinary Collaborative Core			Broadening and Deepening Electives (BDE)	Total
		Core (C)	Major PE (MPE)	Common Core (CC)	Professional Series (PS)	Care, Serve and Learn (CSL)		
Chemistry and Biological Chemistry	1	18/19*		8			6	32/33*
	2	22		6	5	3	6	42
	3	9	6 [3]		11		3	29 [3]
	4	9	6				18	33
	Total	58/59*	12 [3]	14	16	3	33	136/137* [3]
BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (FF)								
Category							AU	Total AU
Interdisciplinary Collaborative Core (ICC)	Common Core (University-level)							
	CC0001 Inquiry & Communication in an Interdisciplinary World						2	14
	CC0003 Ethics & Civics in a Multi-Cultural World						2	
	ML0004 Career Design & Workplace Readiness in the V.U.C.A World						2	
	CC0015 Health & Wellbeing						2	
	CC0006 Sustainability: Society, Economy & Environment						3	
	CC0007 Science & Technology for Humanity						3	
	Professional Series (College-level)							
	HW0218 Communication Across the Sciences						2	16
	PS0002 Introduction to Data Science and Artificial Intelligence						3	
	CM4081 Professional Internship						10	
	MLXXXX Profession Preparation						1	
XXXXXX Care, Serve, Learn (University-level)						3	3	
Major Requirement	CHEM Core							
	CM1001	Foundations of Chemistry I					4	58/59*
	CM1002	Foundations of Chemistry II					4	
	CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering					1	
	MH1802	Calculus for the Sciences					4	
	CM1804	Mathematics for Chemistry					2	
	PH1011	Physics <u>or</u> PH1012* Physics A					3/4*	
	CM2021	Inorganic and Bioinorganic Chemistry					3	
	CM2011	Analytical Chemistry					3	
	CM2061	Chemistry & Biological Chemistry Laboratory 1					3	
	PS0001	Introduction to Computational Thinking					3	
	CM2031	Organic and Bioorganic Chemistry					3	
	CM2041	Physical and Biophysical Chemistry 1					3	
	CM2062	Chemistry & Biological Chemistry Laboratory 2					3	
	CB2002	Introduction to Chemical and Biological Safety					1	
	CM3011 <sup>&amp;</sup>	Chemical Spectroscopy and Applications					3	
	CM3041 <sup>&amp;</sup>	Physical and Biophysical Chemistry 2					3	
	CM3062	Chemistry & Biological Chemistry Laboratory 4					3	
	CM3031 <sup>&amp;</sup>	Organic Reaction Mechanisms and Synthesis					3	
	CM3021 <sup>&amp;</sup>	Organometallic Chemistry					3	
	CM3061	Chemistry & Biological Chemistry Laboratory 3					3	
	CHEM Major Prescribed Electives (MPE)							
4 x MPEs							12^	12
2nd Major in Future Food (FF)	Food Future Compulsory Courses							
	CH5210	Food Process Technologies and New Production Systems					3	27^
	CH5211	Data Analytics in Food Systems					3	
	CH5220	Food Standard - Food Safety & Risk Assessment					3	
	CH5222	Future Foods - Introduction to Advanced Meat					3	
	CM5101	Food Chemistry & Nutrition					3	
	Electives (Choose 5)							
4 WUR Electives							12	
1 NTU Electives^							-	
BDE	Any 3 BDE						6	6
Total								136/137*

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3011, CM3021, CM3031, CM3041 are offered in both semesters.

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

[ ] AU of courses that could be used to fulfil Core/MPE requirement and 2nd Major requirement concurrently

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)			
Suggested Study Plan for AY2025-2026 intake			
Track 1 (Global Immersion in WUR)			
with Professional Internship			
Year 1 Semester 1			
Course		Type	AU
CM1001	Foundations of Chemistry I	C	4
MH1802	Calculus for the Sciences	C	4
CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering	C	1
CC0001	Inquiry & Communication in an Interdisciplinary World	CC	2
CC0015	Health & Wellbeing	CC	2
	BDE 1	BDE	3
HW0001	Introduction to Academic Communication #		
			16
# for students who have not cleared QET			
Year 2 Semester 1			
Course		Type	AU
CM2011	Analytical and Bioanalytical Chemistry	C	3
CM2021	Inorganic and Bioinorganic Chemistry	C	3
CM2061	Chemistry & Biological Chemistry Laboratory 1	C	3
PS0001	Introduction to Computational Thinking	C	3
CC0006	Sustainability: Society, Economy & Environment	CC	3
XXXXXX	Care, Serve, Learn	CSL	3
CM5101	Food Chemistry & Nutrition	BDE	3
			21
Year 3 Semester 1			
Course		Type	AU
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3062	Chemistry & Biological Chemistry Laboratory 4	C	3
CM4013 <sup>^</sup>	Current Topics in Analytical Chemistry	MPE	3
	CHEM MPE 2	MPE	3
MLxxxx	Profession Preparation	PS	1
CH5210	Food Process Technologies and New Production System	BDE	3
			19
Year 4 Semester 1			
Course		Type	AU
	FF WUR Elective 1	BDE	3
	FF WUR Elective 2	BDE	3
	FF WUR Elective 3	BDE	3
	FF WUR Elective 4	BDE	3
			12
Year 1 Semester 2			
Course		Type	AU
CM1002	Foundations of Chemistry II	C	4
CM1804	Mathematics for Chemistry	C	2
PH1011/	Physics <u>or</u>	C	3
PH1012*	Physics A (For students without 'A' Level Physics)	C	4
CC0003	Ethics & Civics in a Multi-Cultural World	CC	2
ML0004	Career Design & Workplace Readiness in the V.U.C.A World	CC	2
	BDE 2	BDE	3
			16/17*
Year 2 Semester 2			
Course		Type	AU
CM2031	Organic and Bioorganic Chemistry	C	3
CM2041	Physical and Biophysical Chemistry 1	C	3
CM2062	Chemistry & Biological Chemistry Laboratory 2	C	3
CB2002	Introduction to Chemical and Biological Safety	C	1
PS0002	Introduction to Data Science and Artificial Intelligence	PS	3
HW0218	Communication Across the Sciences	PS	2
CC0007	Science & Technology for Humanity	CC	3
CH5220	Food Standard - Food Safety and Risk Assessment	BDE	3
			21
Year 3 Semester 2			
Course		Type	AU
CM4081	Professional Internship	PS	10
			10
Year 4 Semester 2			
Course		Type	AU
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3061	Chemistry & Biological Chemistry Laboratory 3	C	3
	CHEM MPE 3	MPE	3
	CHEM MPE 4	MPE	3
CH5211	Data Analytics in Food Systems	BDE	3
CH5222	Future Foods - Introduction to Advanced Meet Alternative	BDE	3
			21
Total (AU)			136/137*

This study plan is meant as a guide.

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3xxx refers to CM3011, CM3021, CM3031, CM3041 - These courses are offered in both semesters

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)									
AY2025 - 2026 Intake onwards									
Track 2 (NTU Based)									
FYP with Professional Attachment									
Programme	Year of Study	Number of Academic Units (AU)							
		Major Requirement		Interdisciplinary Collaborative Core			Broadening and Deepening Electives (BDE)	Total	
		Core (C)	Major PE (MPE)	Common Core (CC)	Professional Series (PS)	Care, Serve and Learn (CSL)			
Chemistry and Biological Chemistry	1	18/19*		8			1	27/28*	
	2	22		6	3	3	6	40	
	3	18			8		15	41	
	4		22 [3]				6	28 [3]	
	Total	58/59*	22 [3]	14	11	3	28	136/137* [3]	
BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (FF)									
Category							AU	Total AU	
Interdisciplinary Collaborative Core (ICC)	Common Core (University-level)								
	CC0001 Inquiry & Communication in an Interdisciplinary World						2	14	
	CC0003 Ethics & Civics in a Multi-Cultural World						2		
	ML0004 Career Design & Workplace Readiness in the V.U.C.A World						2		
	CC0015 Health & Wellbeing						2		
	CC0006 Sustainability: Society, Economy & Environment						3		
	CC0007 Science & Technology for Humanity						3		
	Professional Series (College-level)								
	HW0218 Communication Across the Sciences						2	11	
	PS0002 Introduction to Data Science and Artificial Intelligence						3		
CM4082 Professional Attachment						5			
MLXXXX Profession Preparation						1			
XXXXXX Care, Serve, Learn (University-level)						3	3		
Major Requirement	CHEM Core								
	CM1001	Foundations of Chemistry I					4	58/59*	
	CM1002	Foundations of Chemistry II					4		
	CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering					1		
	MH1802	Calculus for the Sciences					4		
	CM1804	Mathematics for Chemistry					2		
	PH1011	Physics or PH1012* Physics A					3/4*		
	CM2021	Inorganic and Bioinorganic Chemistry					3		
	CM2011	Analytical Chemistry					3		
	CM2061	Chemistry & Biological Chemistry Laboratory 1					3		
	PS0001	Introduction to Computational Thinking					3		
	CM2031	Organic and Bioorganic Chemistry					3		
	CM2041	Physical and Biophysical Chemistry 1					3		
	CM2062	Chemistry & Biological Chemistry Laboratory 2					3		
	CB2002	Introduction to Chemical and Biological Safety					1		
	CM3011 <sup>&amp;</sup>	Chemical Spectroscopy and Applications					3		
	CM3041 <sup>&amp;</sup>	Physical and Biophysical Chemistry 2					3		
	CM3062	Chemistry & Biological Chemistry Laboratory 4					3		
	CM3031 <sup>&amp;</sup>	Organic Reaction Mechanisms and Synthesis					3		
	CM3021 <sup>&amp;</sup>	Organometallic Chemistry					3		
	CM3061	Chemistry & Biological Chemistry Laboratory 3					3		
	CHEM Major Prescribed Electives (MPE)								
CM4080	Honours Project 1					10	22		
4 x MPEs					12^				
2nd Major in Future Food (FF)	Food Future Compulsory Courses								
	CH5210	Food Process Technologies and New Production Systems					3	27^	
	CH5211	Data Analytics in Food Systems					3		
	CH5220	Food Standard - Food Safety & Risk Assessment					3		
	CH5222	Future Foods - Introduction to Advanced Meat					3		
	CM5101	Food Chemistry & Nutrition					3		
	Electives (Choose 5)								
4 NTU Electives						12			
1 NTU Electives^						-			
BDE	Any 1 BDE						1	1	
Total									136/137*

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3011, CM3021, CM3031, CM3041 are offered in both semesters.

^CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

[ ] AU of courses that could be used to fulfil Core/MPE requirement and 2nd Major requirement concurrently

*FYP with Professional Attachment Option*

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)									
AY2025 - 2026 Intake onwards									
Track 2 (NTU Based)									
with Professional Internship									
Programme	Year of Study	Number of Academic Units (AU)							
		Major Requirement		Interdisciplinary Collaborative Core			Broadening and Deepening Electives (BDE)	Total	
		Core (C)	Major PE (MPE)	Common Core (CC)	Professional Series (PS)	Care, Serve and Learn (CSL)			
Chemistry and Biological Chemistry	1	18/19*		8			6	32/34*	
	2	22		6	5	3	6	42	
	3	12			11		6	29	
	4	6	12 [3]				15	33 [3]	
	Total	58/59*	12 [3]	14	16	3	33	136/137* [3]	
BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (FF)									
Category							AU	Total AU	
Interdisciplinary Collaborative Core (ICC)	Common Core (University-level)								
	CC0001 Inquiry & Communication in an Interdisciplinary World						2	14	
	CC0003 Ethics & Civics in a Multi-Cultural World						2		
	ML0004 Career Design & Workplace Readiness in the V.U.C.A World						2		
	CC0015 Health & Wellbeing						2		
	CC0006 Sustainability: Society, Economy & Environment						3		
	CC0007 Science & Technology for Humanity						3		
	Professional Series (College-level)								
	HW0218 Communication Across the Sciences						2	16	
	PS0002 Introduction to Data Science and Artificial Intelligence						3		
CM4081 Professional Internship						10			
MLXXX Profession Preparation						1			
XXXXXX Care, Serve, Learn (University-level)						3	3		
Major Requirement	CHEM Core								
	CM1001	Foundations of Chemistry I					4	58/59*	
	CM1002	Foundations of Chemistry II					4		
	CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering					1		
	MH1802	Calculus for the Sciences					4		
	CM1804	Mathematics for Chemistry					2		
	PH1011	Physics or PH1012* Physics A					3/4*		
	CM2021	Inorganic and Bioinorganic Chemistry					3		
	CM2011	Analytical Chemistry					3		
	CM2061	Chemistry & Biological Chemistry Laboratory 1					3		
	PS0001	Introduction to Computational Thinking					3		
	CM2031	Organic and Bioorganic Chemistry					3		
	CM2041	Physical and Biophysical Chemistry 1					3		
	CM2062	Chemistry & Biological Chemistry Laboratory 2					3		
	CB2002	Introduction to Chemical and Biological Safety					1		
	CM3011^	Chemical Spectroscopy and Applications					3		
	CM3041^	Physical and Biophysical Chemistry 2					3		
	CM3062	Chemistry & Biological Chemistry Laboratory 4					3		
	CM3031^	Organic Reaction Mechanisms and Synthesis					3		
	CM3021^	Organometallic Chemistry					3		
	CM3061	Chemistry & Biological Chemistry Laboratory 3					3		
	CHEM Major Prescribed Electives (MPE)								
	4 x MPEs						12^	12^	
2nd Major in Future Food (FF)	Food Future Compulsory Courses								
	CH5210	Food Process Technologies and New Production Systems					3	27^	
	CH5211	Data Analytics in Food Systems					3		
	CH5220	Food Standard - Food Safety & Risk Assessment					3		
	CH5222	Future Foods - Introduction to Advanced Meat					3		
	CM5101	Food Chemistry & Nutrition					3		
	Electives (Choose 5)								
4 NTU Electives						12			
1 NTU Electives^						-			
BDE	Any 3 BDE						6	6	
Total									136/137*

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3011, CM3021, CM3031, CM3041 are offered in both semesters.

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)

[ ] AU of courses that could be used to fulfil Core/MPE requirement and 2nd Major requirement concurrently

BSc in Chemistry and Biological Chemistry with 2nd Major in Future Food (CHFF)			
Suggested Study Plan for AY2025-2026 intake			
Track 2 (NTU Based)			
with Professional Internship			
Year 1 Semester 1			
Course		Type	AU
CM1001	Foundations of Chemistry I	C	4
MH1802	Calculus for the Sciences	C	4
CB1102	Introduction to Chemistry, Chemical and Biomedical Engineering	C	1
CC0001	Inquiry & Communication in an Interdisciplinary World	CC	2
CC0015	Health & Wellbeing	CC	2
	BDE 1	BDE	3
HW0001	Introduction to Academic Communication #		
			16
Year 1 Semester 2			
Course		Type	AU
CM1002	Foundations of Chemistry II	C	4
CM1804	Mathematics for Chemistry	C	2
PH1011/	Physics <u>or</u>	C	3
PH1012*	Physics A (For students without 'A' Level Physics)	C	4
CC0003	Ethics & Civics in a Multi-Cultural World	CC	2
ML0004	Career Design & Workplace Readiness in the V.U.C.A World	CC	2
	BDE 2	BDE	3
			16/17*
Year 2 Semester 1			
Course		Type	AU
CM2011	Analytical and Bioanalytical Chemistry	C	3
CM2021	Inorganic and Bioinorganic Chemistry	C	3
CM2061	Chemistry & Biological Chemistry Laboratory 1	C	3
PS0001	Introduction to Computational Thinking	C	3
CC0006	Sustainability: Society, Economy & Environment	CC	3
XXXXXX	Care, Serve, Learn	CSL	3
CM5101	Food Chemistry & Nutrition	BDE	3
			21
Year 2 Semester 2			
Course		Type	AU
CM2031	Organic and Bioorganic Chemistry	C	3
CM2041	Physical and Biophysical Chemistry 1	C	3
CM2062	Chemistry & Biological Chemistry Laboratory 2	C	3
CB2002	Introduction to Chemical and Biological Safety	C	1
PS0002	Introduction to Data Science and Artificial Intelligence	PS	3
HW0218	Communication Across the Sciences	PS	2
CC0007	Science & Technology for Humanity	CC	3
CH5220	Food Standard - Food Safety and Risk Assessment	BDE	3
			21
Year 3 Semester 1			
Course		Type	AU
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM3062	Chemistry & Biological Chemistry Laboratory 4	C	3
MLxxxx	Profession Preparation	PS	1
CH5210	Food Process Technologies and New Production System	BDE	3
	FF NTU Elective 1	BDE	3
			19
Year 3 Semester 2			
Course		Type	AU
CM4081	Professional Internship	PS	10
			10
Year 4 Semester 1			
Course		Type	AU
CM3xxx <sup>&amp;</sup>	CHEM-Core	C	3
CM4013 <sup>^</sup>	Current Topics in Analytical Chemistry	MPE	3
	CHEM MPE 2	MPE	3
	FF NTU Elective 2	BDE	3
	FF NTU Elective 3	BDE	3
	FF NTU Elective 4	BDE	3
			18
Year 4 Semester 2			
Course		Type	AU
CM3061	Chemistry & Biological Chemistry Laboratory 3	C	3
	CHEM MPE 3	MPE	3
	CHEM MPE 4	MPE	3
CH5211	Data Analytics in Food Systems	BDE	3
CH5222	Future Foods - Introduction to Advanced Meat Alternative	BDE	3
			15
			136/137*

This study plan is meant as a guide.

\*Students without 'A' Level Physics will take 'PH1012 Physics A' (4AU).

<sup>&</sup> CM3xxx refers to CM3011, CM3021, CM3031, CM3041 - These courses are offered in both semesters

<sup>^</sup>CM4013 can be double counted towards 2nd Major in FF requirement (3AU)