

Curriculum in Department of Chemistry

GRADE	1				2			
	DIVISION	SUBJECT	CREDIT	TIME	DIVISION	SUBJECT	CREDIT	TIME
1	A Compulsory liberal arts course	Freshman Seminar A	1	1	A Compulsory liberal arts course	Freshman Seminar B	1	1
	A Compulsory liberal arts course	Western Philosophy : Issue and Discussion	3	3	A Compulsory liberal arts course	Writing and Presentation for Problem-solving	3	3
	A Compulsory liberal arts course	College English	2	3	A Compulsory liberal arts course	The Universe, Nature and Mankind	1	1
	A Basic liberal arts course	Basics of Software Coding	3	3	A Basic liberal arts course	Application of Advanced Programming Language	3	3
	A Basic liberal arts course	Calculus 1	3	4	A Basic liberal arts course	Calculus 2	3	4
	A Basic liberal arts course	General hemistry 1	3	4	A Basic liberal arts course	General Chemistry 2	3	4
	Major Elective	Physics for Chemists	3	3	A Basic liberal arts course	Introduction to Statistics/Biology (a choice of two)		
2	A Basic liberal arts course	Artificial Intelligence Big Data	3	3	Major Compulsory	Organic Chemistry 2	3	3
	Major Elective	Quantitative Analytical Chemistry Lavoratory	3	4	Major Compulsory	Applied Analytical Chemistry	3	3
	Major Elective	Organic Chemistry 1	3	3	Major Elective	Protein Biochemistry	3	3
	Major Elective	Quantitative Analytical Chemistry	3	3	Major Elective	Physical Chemistry 1	3	3
	Major Elective	Cosmetic Chemistry	3	3	Major Elective	Organic Chemistry Laboratory	3	4
	Major Elective	Environmental Chemistry	3	3	Major Elective	Careers in Chemistry 1	1	1
3	Major Compulsory	Inorganic Chemistry	3	3	Major Elective	Polymer Chemistry	3	3
	Major Compulsory	Physical Chemistry 2	3	3	Major Elective	Ultramicro Analysis	3	3
	Major Elective	Instrumental Analysis	3	3	Major Elective	Metal Complex Chemistry	3	3
	Major Elective	Nanochemistry	3	3	Major Elective	Inorganic Chemistry Laboratory	3	4
	Major Elective	Physical Chemistry Laboratory	3	4	Major Elective	Bioorganic Chemistry	3	3
	Major Elective	Mechanism of Organic Reaction	3	3	Major Elective	Biochemistry Laboratory	3	4
	Major Elective	Genetic Biochemistry	3	3	Major Elective	Chemistry & Software 1	3	3
	Major Elective	electrochemistry	3	3	Major Elective	Textbook and Teaching Methods in Chemistry Education	3	3
	Major Elective	Careers in Chemistry 2	1	1	Major Elective	Chemical Logic and Writing	3	3
	Major Elective	Introduction to Chemistry Education	3	3	Major Elective	Chemistry Industrial Internship 2	3	3
	Major Elective	Chemistry Industrial Internship 1	3	3				
4	Major Compulsory	Biochemistry	3	3	Major Elective	Independent Study and Career Skill/ Senior Project 2	1	1
	Major Elective	Independent Study and Career Skill/ Senior Project 1	1	1	Major Elective	Advanced Physical Chemistry	3	4
	Major Elective	Advanced Polymer Chemistry	3	4	Major Elective	Advanced Analytical Chemistry	3	4
	Major Elective	Advanced Inorganic Chemistry	3	4	Major Elective	Advanced Biochemistry	3	4
	Major Elective	Advanced Organic Chemistry	3	4	Major Elective	Spectroscopy and Laboratory	3	4
	Major Elective	Polymer Chemistry Laboratory	3	4	Major Elective	Molecular Modeling	3	4
	Major Elective	Solid-State Chemistry	3	3	Major Elective	Biophysical Chemistry	3	3
	Major Elective	New Material Chemistry	3	3	Major Elective	Energy chemistry	3	3
	Major Elective	Organic Synthesis	3	3	Major Elective	Chemical Research and Experiment 2	3	4
	Major Elective	Chemical Research and Experiment 1	3	4	Major Elective	Combined chemistry	3	3
	Major Elective	Medicinal Chemistry	3	3	Major Elective	Natural Compound Chemistry	3	3
	Major Elective	Chemistry & Software 2	3	3	Major Elective	Supramolecular Chemistry	3	3
	Major Elective	Chromatography Practice	3	4	Major Elective	Fine chemistry	3	3
					Major Elective	Chemistry in Human Life	3	3
GRADE	DIVISION	SUBJECT	CREDIT	ETC				
1-4	A Compulsory liberal arts course	Entrepreneurship 1	1	3 credits elective in 2 Subjects : Introduction to Statistics/Biology				
3-4		Employment, Start-up and Career Planning	1					
2-4	A balanced liberal arts course	Selective completion of 6 credits in 2 areas different from the affiliated department	6	6 credits elective in 2 areas: History and Thought/ Economy and Science/ culture and art				