

Major Program Guide for a B.S.Ed. in Science Education
Concentration: Chemistry
Suggested Course Sequence for 8-semester plan[#]

Liberal Studies

Profession Education Sequence

Science Education/Chemistry

42 (33) hours (9 hours are met through major requirements in math and science)

23 hours

64 hours

120 hours

Freshman Year							
Fall				Spring			
Prefix or LS requirement	Course number	Title	Credit Hours	Prefix or LS requirement	Course number	Title	Credit Hours
CHEM	139	General Chemistry I	4	CHEM	140	General Chemistry II	4
MATH	146	Precalculus	4	MATH	153	Calculus I	4
C3: COMM	201	Foundations Comm.	3	BIOL	140	Principles of Biology I	4
1 st Year Sem.	190/191	-	3	P6	-	World Cultures	3
C1: ENGL	101	Writing and Rhetoric	3	P1	-	Social Sciences	3
			17				18
Sophomore Year							
Fall				Spring			
Prefix or LS requirement	Course number	Title	Credit Hours	Prefix or LS requirement	Course number	Title	Credit Hours
EDCI	201	Teaching Leadership & ...	3	PHYS	130 or 230	Intro or General Physics I	4
SCI	150	Intro. Secondary Sci. Educ.	1	BIOL	141	Principles of Biology II	4
CHEM	232	Quantitative Analysis	4	CHEM	241	Organic Chemistry I	4
GEOL	150	Methods in Geology	3	(P1 ULP) PSY	320	Social Sciences	3
C1: ENGL	202	Writing and Critical Inq.	3	C4	-	Wellness	3
^Complete the Core Praxis; Apply for admission to Ed Prog.							
			15				18
Junior Year							
Fall				Spring			
Prefix or LS requirement	Course number	Title	Credit Hours	Prefix or LS requirement	Course number	Title	Credit Hours
PHYS	131 or 231	Intro or General Physics II	4	CHEM	352	Physical Chemistry I	3
GEOL	145	Climate Change and...	3	SCI	301	Nature of Science	3
CHEM Elec.	242,321,etc	Chemistry Elective	2	CHEM	495	Chem Seminar	1
P4	-	Humanities	3	P3	-	History	3
SPED	240	Exceptional Child	3	EDCI	430	Classroom Management	3
			15				13
Senior Year							
Fall				Spring			
Prefix or LS requirement	Course number	Title	Credit Hours	Prefix or LS requirement	Course number	Title	Credit Hours
SCI	422	Princ. & Meth. Sci. Educ.	3	SCI	491	Supervised Teach. Science	3
CHEM	380	Research in Chemistry	2	EDSE	490	Supervised Teaching	6
GEOL	141	Earth History...	3	EDSE	495	Seminar	3
EDSE	483	Sec/Spec Sub Area Intern I	2				
P5	-	Fine & Performing Arts	3				
			14				12
[#] This plan is a suggestion that should guide registration. Variations of this plan on possible in consult with your advisor. [*] One of LS perspectives must be an upper-level, 300-400, course							

Course Check Sheet for B.S.Ed. in Science Education, Concentration in Chemistry

Term	Grade	Course	Hours
Professional Education Sequence			23
		EDCI 201 - Teacher Leadership in a Diverse Society	3
		SPED 240 - The Exceptional Child	3
		EDCI 430 - Culturally Relevant Classroom Management	3
		EDSE 483 - Secondary/Special Subject Area Internship I & Methods	2
		SCI 491 - Supervised Student Teaching in the Sciences	3
		EDSE 485 – Internship II	6
		EDSE 495 – Seminar	3

Science and Math Requirements in Chemistry Concentration			64
		SCI 150 - Introduction to Secondary Science Education	1
		SCI 301 - Nature of Science	3
		SCI 422 - Principles and Methods of Science Education	3
		MATH 146 - Precalculus	4
		MATH 153 - Calculus I	4
		BIOL 140 - Principles of Biology I	4
		BIOL 141 - Principles of Biology II	4
		CHEM 139 - General Chemistry I	4
		CHEM 140 - General Chemistry II	4
		GEOL 150 - Earth: Geology, Resources, Hazards, and Environment	3
		GEOL 141 - Earth History and Prehistorical Life	3
		GEOL 145 - Climate Change and Water Resources	3
		PHYS 130 or 230 - Introductory Physics I or General Physics I	4
		PHYS 130 or 231 - Introductory Physics II or General Physics II	4
		CHEM 232 – Quantitative Analysis	4
		CHEM 241 – Organic Chemistry I	4
		Chemistry elective (242, 321, 330, etc.)	2
		CHEM 352 – Physical Chemistry I	3
		CHEM 495 – Chemistry Seminar	1
		Capstone	
		CHEM 380 – Research in Chemistry	2

Liberal Studies (C2--Math and C5--Science core areas met with major requirements)			33
		First Year Seminar, 190 or 191	3
		C1: ENGL 101 Composition	3
		C1: ENGL 202 Composition	3
		C3: COMM 201 Intro. to Speech Communication	3
		C4: Wellness	3
		P1: Social Science, course 1	3
		P1: Social Science, course 2 (<i>must be from a different discipline than other P1 course</i>)	3
		P3: History	3
		P4: Humanities	3
		P5: Fine & Performing Arts	3
		P6: World Cultures	3
		<i>*Note: at least one of LS perspectives must be an upper-level, 300-400, course</i>	