# Secondary Education BSEd Science-Chemistry Emphasis

The Bachelor's of Science in Secondary Education degree prepares students to teach in secondary school settings, grades 9-12. This program requires the selection and completion of required coursework in a specific content area.

# University General Education and Graduation Requirements

B.S.Ed. degree candidates must complete the following General Education requirements and Graduation requirements of the University as outlined in this Bulletin.

The courses listed below fulfill General Education requirements and best prepare students for advanced education coursework and licensure exams.

#### Core Areas:

First Year Writing		
ENGL 1100	First-Year Writing (MOTR ENGL 200)	3
<b>Communication Proficience</b>	<b>y</b>	
EDUC 2222	Interpretation: Connecting Audiences and Meaning	3
or COMM 1040	Introduction to Public Speaking (MOTR COMM 110)	}
Math Proficiency		
MATH 1020	Contemporary Mathematics (MOTR MATH 120)	3
or MATH 1030	College Algebra (MOTR MATH 130)	
Information Literacy		
ED TECH 2230	Information Literacy	3
American History or Gove	rnment	
POL SCI 1100	Introduction to American Politics (MOTR POSC 101)	3
or HIST 1001	American Civilization to 1865 (MOTR F 101)	HIST
<b>Humanities and Fine Arts</b>		
Choose any 9 hours from ap	proved fields.	9
Social Science		
Choose any 9 hours. At least diversity requirement	t one course must meet the cultural	9
Math and Life/Natural Scie	nces	
Choose any 9 hours.		9
Junior Level Writing		
ENGL 3100	Junior-Level Writing	3
Total Hours		45

#### **Program Requirements**

All students in the B.S.Ed. in Secondary Education program are required to take the following Teacher Education courses. Each student must also

select a content area and complete the required courses and certification assessments for that area as specified by the Missouri Department of Elementary and Secondary Education.

#### **Grade Requirement**

Professional Education courses must be completed with a grade of C or better (courses completed with a grade of C- or below must be retaken).

#### **GPA** Requirement

Beginning with those students graduating in May 2017 who will also receive teaching certification, the Missouri Department of Elementary and Secondary Education requires a 3.0 GPA in professional education courses, a 3.0 GPA in the teaching content field, and a 2.75 overall GPA.

### **Assessment Requirement**

Students must pass the required DESE certification assessments to receive the B.S.Ed. degree.

#### **Preparing for the Teacher Education Program**

The following courses must be completed prior to applying for admission to the teacher education program:

Total Hours		9
ED PSY 2212	Child and Adolescent Development	3
TCH ED 2209	Foundations of Teaching in American Schools	2
TCH ED 2001	Early Clinical Experience: Schools	1
TCH ED 2000	Becoming a Professional Educator	1
TCH ED 1001	Early Clinical Experience: Community Agency	1
TCH ED 1000	Building Community, Culture, and Learning in Education	1

#### **Teacher Education Program**

The following courses are completed after acceptance into the teacher education program:

TCH ED 3001	Mid-Level Clinical Experience: Diverse Learners	1
ED PSY 3312		
TCH ED 3310	Introduction to Methods of Teaching	3
SPEC ED 3318	Inclusive Classrooms	3
TCH ED 4391	Literacy for Adolescent Learners in Content Areas	3
SEC ED 4880	Writing for Teachers <sup>1</sup>	3
Total Hours		13

SEC ED 4880 is not required for foreign language emphasis areas.

In addition to the above courses, students must complete 30-50 hours of required coursework in one specific content area (English , French K-12, Spanish K-12, mathematics, biology, chemistry, physics, or social studies), as well as the appropriate methods course:

SEC ED 4011	The Curriculum And Methods Of Teaching History And Social Studies	3
SEC ED 4240	Curriculum and Methods of Teaching Physical Sciences	3

SEC ED 4589	Curriculum and Methods of Teaching Foreign Languages	3
SEC ED 4646	The Curriculum And Methods Of Teaching Math	3
SEC ED 4885	The Curriculum And Methods Of Teaching English	3
SEC ED 4985	Curriculum and Methods of Teaching Life Sciences	3

The program will culminate in the following practicum courses:

SEC ED 4989	Practicum I: Site-Based Experience	3
SEC ED 4990	Practicum II: Site-Based Experience	12

**Total Credit Hours: 120 Minimum** 

# B.S. Ed. in Secondary Education with Emphasis in Chemistry

The B.S. Ed. is a professional education degree designed for students who wish to pursue a teaching career in secondary schools. Much of the discipline-specific coursework parallels the B.A. or B.S. degree in the discipline; however, the Missouri Department of Elementary and Secondary Education (DESE) requires specific coursework for teacher certification. Therefore, students interested in the B.S. Ed. should contact the advising office (OASIS) 314-516-5937 in the College of Education for discipline-specific requirements. *Note: To obtain teaching certification, DESE requires a 3.0 GPA in the discipline and professional education coursework, as well as a 2.75 GPA overall.* 

# B.A. or B.S. in Chemistry with Master's Level Coursework for Secondary Teacher Certification

In addition to the B.S. Ed., students may opt to complete a B.A. or B.S. degree in their discipline as an undergraduate, followed by admission to the Graduate School for Master's level teaching certification. The College of Education has a one-year accelerated program for post-graduate certification called Teach in 12, or students can choose a traditional path to certification. Graduate coursework for certification can apply towards a Master's Degree in Secondary Education, with additional coursework. Students interested in Master's Level teacher certification should contact the advising office (OASIS) 314-516-5937 in the College of Education. Note: To obtain teaching certification, DESE requires a 3.0 GPA in the discipline and professional education coursework, as well as a 2.75 GPA overall.

### **Learning Outcomes**

Upon completion of the program, graduates will be able to:

- Demonstrate professionalism through (a) reflective practice for professional growth, (b) effective communication and collaboration, and (c) commitment to upholding ethical and professional standards.
- Evaluate, design, and implement curriculum, instruction, and assessment that apply advanced understanding of (a) content and pedagogical knowledge, (b) learning science principles, and (c) equitable frameworks and inclusive practices.
- Integrate technologies to create meaningful student learning in the context of a (a) digital and (b) global society.

- Design and implement a supportive, inclusive, and culturally responsive classroom environment that nurtures the intellectual, social, and emotional development of all students.
- Partner with families and communities to develop relationships and build networks of support to enhance student learning and well-being.

## Sample Four Year Plan

First Year			
Fall	Hours	Spring	Hours
ENGL 1100	3	3 COMM 1040	3
MATH 1030	3	3 MATH 1035	2
BIOL 1012	3	3 CHEM 1111	5
HIST 1001 or 1002	3	3 TCH ED 1001	1
TCH ED 1000	1	1 TCH ED 2000	1
		EXPLORE - Humanities and Fine Arts	3
	13	3	15

Second Year						
Fall	Hours	Spring	Hours	Summer	Hours	
ED TECH 2230	3	BIOL 1831		5 TCH ED 3001		1
BIOL 1821 or 1202	3-5	CHEM 1121		5 SPEC ED 3318		3
TCH ED 2001	1	ED PSY 2212		3 EXPLORE - Social Sciences		3
TCH ED 2209	2	EXPLORE - Humanities and Fine Arts		3		
GEOL 1001	3					
EXPLORE - Social Sciences	3					
	15-17		1	16		7
Third Year						

Third Year					
Fall	Hours	Spring	Hours		
ENGL 3100 or 3160	;	3 CHEM 2622		3	
PHYSICS 1011 & 1011L	,	4 TCH ED 3312		3	
TCH ED 3310	;	3 PHYSICS 1012		3	
CHEM 2612	;	3 MATH 1100		3	
EXPLORE - Social Sciences	;	3 PHIL 3380		3	
		SEC ED 4985		3	
	10	6	1	8	

	16	18
Fourth Year		
Fall	Hours Spring	Hours
TCH ED 4391	3 SEC ED 4990	12
SEC ED 4880		
CHEM 3302	3	
CHEM 4712	3	
SEC ED 4989	3	
	12	12

Total Hours: 124-126

1

Course should also satisfy the Cultural Diversity Requirement

PLEASE NOTE: This plan is an example of what a four year plan could look like for a typical student. Placement exam scores in math as well as the completion of coursework may change the plan. It should not be used in the place of regular academic advising appointments. All students are encouraged to meet with their advisor. All requirements are subject to change.