

Department of
Education

**Adolescent Young Adult (7-12):
Physical Sciences - Chemistry**

Program requirements:	
General Education:	Satisfactory completion of all general education requirements.
Major:	Satisfactory completion of a major in Chemistry (41 credits for a B.A. degree as described below) plus 23 credits in additional areas for a total of 64 credits.
Education:	Satisfactory completion of a minor in education (36 credits) as described below. Prior to being admitted to the Teacher Education Program, the student must meet all of the admission requirements outlined in the Undergraduate Teacher Education Handbook for Licensure, including demonstration of mathematical competency by earning a grade of C- or higher in a 4-credit course that fulfills the LO #4 Connections Curriculum requirement.

Requirements for Adolescent Young Adult Licensure:

- All courses must be passed with a grade of C- or above. See the Academic Catalog for additional requirements for admission and continuation in the program. Courses may not be offered every year. Check the department schedules for course offerings.
- Students are required to complete a capstone assessment, the edTPA, during their Student Teaching Seminar (EDUC-496) and earn a C- or higher in the course.

Required in Education (36 credits)

Entry-Level Courses (Taken prior to application to the Teacher Education Program)

Grade Earned	Course #	Course Name & Credits
or	EDUC-103	Sociological Perspectives in Education (4)—LO#2 and LO#6
	EDUC-104	Philosophical Perspectives in Education (4)—LO#2 and LO#10
	EDUC-105	Educational Psychology (2)
	EDUC-120	Introduction to Students with Special Needs (2) <i>(Concurrently with EDUC 105)</i>
	EDUC-213	Adolescent Development and Education (4)

Advanced Courses (Taken following admission to the Teacher Education Program)

_____	EDUC-312	Reading & Writing in the Content Areas (3) <i>(Spring Only)</i>
_____	EDUC-313	Practicum: Literacy (1)
_____	EDUC-332	Assessment and Inclusion (4)
_____	EDUC-348	Teaching Science in Secondary Schools (3) <i>(See Advisor for Scheduling)</i>
_____	EDUC-388	Science Practicum (1) <i>(See Advisor for Scheduling)</i>

Student Teaching Term

Application for permission to student teach must be submitted early spring term of junior year.

Other coursework, if taken, must be scheduled for late afternoon or evenings during the term and is subject to the approval of the Director of Field Placements and Outreach.

_____	EDUC-495	Student Teaching (10)—LO#1
_____	EDUC-496	Student Teaching Seminar (2)

Additional Requirement for Adolescent Young Adult Licensure

_____ Successful completion of the state-required licensure examinations.

Required in Chemistry (41 Credits)

Grade Earned	Course #	Course Name & Credits
_____	CHEM-121	Models of Chemical Systems I (5)
_____	CHEM-162	Models of Chemical Systems II (5)
_____	CHEM-201	Introduction to Organic Chemistry (5)
_____	CHEM-271	Principles of Biochemistry (4)
_____	CHEM-281	Analytical Chemistry (5)
_____	CHEM-300	Junior Seminar (1)
_____	CHEM-302	Intermediate Organic Chemistry (5)
_____	CHEM-311	Thermodynamics and Kinetics (5)
_____	CHEM-321	Inorganic Chemistry (5)
_____	CHEM-400	Senior Seminar (1)

Required in Math (8 Credits)

_____	MATH-201	Calculus I (4)
_____	MATH-202	Calculus II (4)

Required in Physics (10 Credits)

_____	PHYS-201	Physics I (5)
_____	PHYS-203	Calculus-Based Physics II (5)
or		
_____	PHYS-202	Algebra-Based Physics (5)

Required in Biology (5 Credits)

_____	BIOL-170	Concepts of Biology: Biological Information, Reproduction and Evolution (5)
or		
_____	BIOL-180	Concepts of Biology: Energy and Resources in Biology (5)

Any change(s) in this program of study must be approved by the Chairperson of the major department and the Director of Assessment & Licensure, Wittenberg University.