

2025 - 2026 Old Dominion University Catalog

Bachelor of Science in Biochemistry with a Major in Secondary Chemistry Education (6-12) (BS) (w/ VCCS Equivalencies)

Sample four year curriculum with a suggested ordering of courses. Students may re-order as needed.

** Indicates not automatically waived with transferrable associates degree, C or better required for transfer. Courses in green are waived by the completion of an Associate degree (Not eligible for Applied Associate degrees). Associate in Science recommended for ease of transfer.*

YEAR 1 - FRESHMAN (31 CREDITS)

FALL SEMESTER (17 credits)

General Education and Major Coursework:
ENGL 110C
MATH 163
CHEM 121N/122N(4 credits)
BIOL 121N & 122N (4 credits)
Information Literacy and Research -CHEM 160G

VCCS Equivalency:
ENG 111*
MTH 162, 164 or 167*
CHM 111*
BIO 101*

SPRING SEMESTER (17-18 credits)

General Education and Major Coursework:
ENGL 211C or 231C
MATH 211 (4 credits)
CHEM 123N/124N (4 credits)
BIOL 123N & 124N (4 credits)

VCCS Equivalency:
ENG 112, 210, 115 OR 131*
MTH 173, 263 or 273*
CHM 112*
BIO 102*

Professional Education Coursework:
STEM 103 (2 credits)

YEAR 2 - SOPHOMORE (32 CREDITS)

FALL SEMESTER (18 credits)

General Education and Major Coursework:
CHEM 211-CHEM 212 (5 credits)
MATH 212 (4 credits)
COMM 101R
Human Creativity
Professional Education Coursework:
STEM 201

VCCS Equivalency:
CHM 241 & 243*
MTH 174, 264, or 274*
CST 100 or 105*
[Transfer Equivalency Guide](#)

SPRING SEMESTER (14 credits)

General Education and Major Coursework:
CHEM 213-214 or 216 (5 credits)
Literature
Philosophy and Ethics
Professional Education Coursework:
STEM 202

VCCS Equivalency:
CHM 242 & 244 or 246*
[Transfer Equivalency Guide](#)
[Transfer Equivalency Guide](#)

YEAR 3 - JUNIOR (32 CREDITS)

FALL SEMESTER (18 credits)

General Education and Major Coursework:
PHYS 231N(4 credits)
CHEM 321 and CHEM 322 (5 credits)
BIOL 293
Interpreting the Past
Professional Education Coursework:
STEM 401

VCCS Equivalency:
PHY 231 or 241*
[Transfer Equivalency Guide](#)

SPRING SEMESTER (17 credits)

General Education and Major Coursework:
PHYS 232N(4 credits)
CHEM 441
CHEM 442W (4 credits)
Human Behavior: GEOG 101S
Professional Education Coursework:
STEM 402

VCCS Equivalency:
PHY 232 or 242*
GEO 200*

YEAR 4 - SENIOR (31 CREDITS)

FALL SEMESTER (15 credits)

General Education and Major Coursework:
CHEM 331
BIOL 294
CHEM 443
CHEM 468
Impact of Technology

VCCS Equivalency:
[Transfer Equivalency Guide](#)

SPRING SEMESTER (13 credits)

General Education and Major Coursework:
CHEM 485 (1 credit)
CHEM 333
Professional Education Coursework:
STEM 485 (9 credits)

VCCS Equivalency:

This 4-year plan does not include 6 credits in Language and Culture, but this requirement may be waived; see ODU catalog.

Note: Upper division general education is satisfied through the Professional Education Core Courses.

Requirements for graduation include a minimum cumulative grade point average of 2.75 GPA, in the major area, and in the professional education core, with no grade less than a C in the major and C- in the professional education core; successful completion of the Teacher Candidate Internship and a minimum of 135 credit hours, which must include both a minimum of 34 credit hours overall and 12 credit hours in upper-level courses in the major program from Old Dominion University, completion of ENGL 110C, ENGL 211C or 221C or 231C, and a writing intensive (W) course in the major with a grade of C or better, and completion of Senior Assessment.

This four-year plan is a suggested curriculum to complete this degree program in four years. It is just one of several plans that will work and is presented only as broad guidance to students. Each student is strongly encouraged to develop a customized plan in consultation with their academic advisor. Additional information can also be found in Degree Works.