

GENERAL SCIENCE, BACHELOR OF SCIENCE

General Science, Bachelor of Science Requirements

Code	Title	Credits
GENERAL EDUCATION REQUIREMENTS - 46 Hours Required		
Minimum of "C-" required		
Fundamental Academic Skills		15
ENGL 1150	ENGLISH COMPOSITION I	
ENGL 1160	ENGLISH COMPOSITION II	
Writing in the Discipline Course		
CMST 1110	PUBLIC SPEAKING FUNDS	
or CMST 2120	ARGUMENTATION AND DEBATE	
MATH 1120	INTRODUCTION TO MATHEMATICAL AND COMPUTATIONAL THINKING	
or MATH 1100	DATA LITERACY AND VISUALIZATION	
or MATH 1130	QUANTITATIVE LITERACY	
or MATH 1140	QUANTITATIVE REASONING FOR HEALTHCARE PROFESSIONALS	
or MATH 1300	COLLEGE ALGEBRA WITH SUPPORT	
or STAT 1100	DATA LITERACY AND VISUALIZATION	
or STAT 1530	ELEMENTARY STATISTICS	
Distribution Requirements		31
Natural Science - From two disciplines and at least one lab - 7 hrs		
Social Science - From two disciplines - 9 hrs		
Humanities and Fine Arts - From two disciplines- 9 hrs		
Global Diversity - 3 hrs		
US Diversity - 3 hrs		
MAJOR REQUIREMENTS		
**Course will satisfy UNO's General Education requirement		
^Course requires pre-requisite(s)		
General Science - 49-50 Hours Required		22
Required Coursework		
BIOL 1450	BIOLOGY I (**)	
BIOL 1750	BIOLOGY II	
CHEM 1180 & CHEM 1184	GENERAL CHEMISTRY I and GENERAL CHEMISTRY I LABORATORY (**)	
CHEM 1190 & CHEM 1194	GENERAL CHEMISTRY II and GENERAL CHEMISTRY II LABORATORY (^)	
GEOL 1170	INTRODUCTION TO PHYSICAL GEOLOGY	
Select one of the following (PHYS) Physics Options		10
PHYS 1110 & PHYS 1154	GENERAL PHYSICS I and GENERAL PHYSICS LABORATORY I (**)	
PHYS 1120 & PHYS 1164	GENERAL PHYSICS II and GENERAL PHYSICS LABORATORY II	
OR		
PHYS 2110 & PHYS 1154	GENERAL PHYSICS I - CALCULUS LEVEL and GENERAL PHYSICS LABORATORY I (^)	

PHYS 2120 & PHYS 1164	GENERAL PHYSICS-CALCULUS LEVEL and GENERAL PHYSICS LABORATORY II (^)	
Mathematics and Statistics Requirement - choose one option		5-6
Option 1 - select one of the following calculus courses:		
MATH 1950	CALCULUS I (^)	
MATH 1940	CALCULUS FOR BIOMEDICINE (^)	
OR Option 2 - take both of the following courses:		
MATH 1930	CALCULUS FOR THE MANAGERIAL, LIFE, AND SOCIAL SCIENCES	
AND one advisor-approved STATISTICS course		
Select 12 additional credits of 2000-level coursework from at least two of the following subjects: Biology, Chemistry, Geology, and Physics.		12
College Breadth (choose one option)		15-30+
Option 1: Complete any UNO minor or undergraduate certificate - 15+ hours		
Option 2: Additional General Education Requirements - 19+ hours		
Additional quantitative literacy - 3 hours		
Additional Social Science Gen. Ed. from 3rd Discipline - 3 hours		
Additional Humanities Gen. Ed. from 3rd Discipline - 3 hours		
HIST 1000 and HIST 1010 - 6 hours		
Additional Nat. and Physical Science w/ Lab - 4-5 hours		
Option 3: CAS comprehensive major (50+ hours) OR any second UNO major (30+ hours)		
Bachelor of Science Cognate Requirement		15

Students in the B.S. degree program are required to complete 15 hours of cognate coursework, a field of specialization outside of their major based on their interests and/or career aspirations. Cognates are designed by the student in consultation with the undergraduate adviser.

ELECTIVES

Elective hours as required to reach a total of 120 hours

General Science, Bachelor of Science Concentrations

- Medical Laboratory Science Concentration (<http://catalog.unomaha.edu/undergraduate/college-arts-sciences/general-science/general-science-bs/medical-lab-science-conc/>)

General Science, Bachelor of Science Four Year Plan

Freshman		Credits
Fall		
BIOL 1450	BIOLOGY I (*)	5
ENGL 1150	ENGLISH COMPOSITION I (**)	3
MATH 1930	CALCULUS FOR THE MANAGERIAL, LIFE, AND SOCIAL SCIENCES (***)	3-5
or MATH 1940	or CALCULUS FOR BIOMEDICINE	
or MATH 1950	or CALCULUS I	
Humanities and Fine Arts		3

*BIOL 1450: Requires high school biology and chemistry. College level chemistry recommended. This course will count as a Natural & Physical Science Lecture/Lab course as well as major requirement.

***MATH 1930 or MATH 1940: Requires MATH 1300, 1320, or higher with minimum grade of C-, or Math ACT sub-score of 25, or appropriate Math Placement Exam score within the last two years. If taking MATH 1950 as an alternative, it will require MATH 1300/1320 + MATH 1330 OR MATH 1340 (minimum grade of C-) OR proper placement via ACT Math sub-score or Math Placement Exam within the last two years. MATH 1930/1940/1950 are higher than the general education Math/QL requirement, so would count as that and the College of Arts and Sciences QL requirement for the Add'l Gen Eds, in addition to counting as a calculus course for the major. Please know that this major requires EITHER MATH 1930 + STAT 1530 OR MATH 1940/1950. If taking MATH 1930, students will also need to take STAT 1530 (or approved alternative) for this major. Taking MATH 1940 or 1950 will not require students to also take STAT 1530 for this major.

***MATH 1930 or MATH 1940: Requires MATH 1300, 1320, or higher with minimum grade of C-, or Math ACT sub-score of 25, or appropriate Math Placement Exam score within the last two years. If taking MATH 1950 as an alternative, MATH 1300/1320 + MATH 1330 OR MATH 1340 (minimum grade of C-) OR proper placement via ACT Math sub-score within the last two years will be required. This course is higher than the general education Math/QL requirement, so would count as that and the College of Arts and Sciences QL requirement for the Add'l Gen Eds, in addition to counting as a calculus course for the major. If taking MATH 1930, students will also need to take STAT 1530 (or approved alternative) for this major. Taking MATH 1940 or 1950 will not require students to also take STAT 1530 for this major.

Credits		14-16
Spring		
BIOL 1750	BIOLOGY II (*)	5
ENGL 1160	ENGLISH COMPOSITION II (**)	3
STAT 1530	ELEMENTARY STATISTICS (***)	3
Social Science		3

*BIOL 1750: Requires BIOL 1450. This course counts as the A&S Add'l Gen Ed Natural & Physical Science Lec/Lab in addition to being a major requirement.

**ENGL 1160: Requires ENGL 1150 or appropriate placement via EPPE, AP scores or transfer credit.

***STAT 1530: Requires MATH 1210 or higher, a Math ACT sub-score of 19+, or appropriate Math Placement Exam score within the last two years. Students do not need to take STAT 1530 if MATH 1940 or MATH 1950 are chosen for the major's calculus requirement. If taking MATH 1940 or 1950, replace STAT 1530 this semester with another course from a later semester, chosen in consultation with your advisor.

Credits		14
Sophomore		
Fall		
CMST 1110 or CMST 2120	PUBLIC SPEAKING FUNDS or ARGUMENTATION AND DEBATE	3
PHYS 1110 & PHYS 1154	GENERAL PHYSICS I and GENERAL PHYSICS LABORATORY I (*)	5
Social Science		3
Humanities and Fine Arts/US Diversity		3

*PHYS 1110: Requires MATH 1220, Math 1300 or higher. Also acceptable: Math ACT sub-score of 23+, or appropriate Math Placement Exam score. This course counts as the 2nd Natural & Physical Science gen ed. Taking PHYS 1154 is also required for the major.

Credits		14
Spring		
GEOL 1170	INTRODUCTION TO PHYSICAL GEOLOGY	4
PHYS 1120 & PHYS 1164	GENERAL PHYSICS II and GENERAL PHYSICS LABORATORY II (*)	5
Social Science/Global Diversity**		3
Humanities and Fine Arts***		3
*PHYS 1120: Requires PHYS 1110		
**Social Science must come from a 2nd discipline.		
***Humanities and Fine Arts course must come from a 2nd discipline.		

Credits		15
Junior		
Fall		
CHEM 1180 & CHEM 1184	GENERAL CHEMISTRY I and GENERAL CHEMISTRY I LABORATORY (*)	4
ENGL 3980	TECHNICAL WRITING ACROSS THE DISCIPLINES (**)	3
HIST 1000 or Course towards Minor/2nd Major***		3
Advanced General Science Elective^		3
BS Cognate Course#		3
*CHEM 1180: See the catalog for the most up-to-date prerequisites. Must take CHEM 1184 concurrently.		
**ENGL 3980: Requires ENGL 1160 or appropriate placement via EPPE, AP scores or transfer credit.		
***A&S College Requirement Options.		
^Advanced General Science Electives: 12 credits minimum needed from at least 2 disciplines between BIOL, CHEM, GEOL, & PHYS. Must be at the 2000 level or higher.		
#15 credits minimum of Cognate courses needed. Cognate courses should be selected in consultation with your advisor. Ideally, courses are upper-level, to help you reach the 27 credit upper level minimum throughout the degree.		

Credits		16
Spring		
CHEM 1190 & CHEM 1194	GENERAL CHEMISTRY II and GENERAL CHEMISTRY II LABORATORY (*)	4
HIST 1010 or Minor/2nd Major Course**		3
Advanced General Science Elective***		3
BS Cognate Course^		3
BS Cognate Course^		3
*CHEM 1190: See the catalog for the most up-to-date prerequisites. Must take CHEM 1194 concurrently.		
**A&S College Requirement Options		
***Advanced General Science Electives: 12 credits minimum needed from at least 2 disciplines between BIOL, CHEM, GEOL, & PHYS. Must be at the 2000 level or higher.		
^15 credits minimum of Cognate courses needed. Cognate courses should be selected in consultation with your advisor. Ideally, courses are upper-level, to help you reach the 27 credit upper level minimum throughout the degree.		

**Transfer credit or placement exam scores may change suggested plan of study

Senior

Fall

Advanced General Science Elective*	3
Additional Humanities and Fine Arts Course for A&S or Course towards Minor/2nd Major**	3
Additional Social Science Course for A&S or Course towards Minor/2nd Major***	3
BS Cognate Course^	3
BS Cognate Course^	3

*Advanced General Science Electives: 12 credits minimum needed from at least 2 disciplines between BIOL, CHEM, GEOL, & PHYS. Must be at the 2000 level or higher.

**A&S College Requirement Options. Additional HFA must be in a 3rd discipline.

***A&S College Requirement Options. Additional SS must be in a 3rd discipline.

^15 credits minimum of Cognate courses needed. Cognate courses should be selected in consultation with your advisor. Ideally, courses are upper-level, to help you reach the 27 credit upper level minimum throughout the degree.

Credits 15

Spring

Advanced General Science Elective*	3
Elective or Minor/2nd Major Course**	3
Elective or Minor/2nd Major Course**	3
Elective or Minor/2nd Major Course**	3
Elective or Minor/2nd Major Course**	3
Elective or Minor/2nd Major Course**	1

*Advanced General Science Electives: 12 credits minimum needed from at least 2 disciplines between BIOL, CHEM, GEOL, & PHYS. Must be at the 2000 level or higher.

**Students must have a minimum of 120 credits to graduate and at least 27 credits 3000/4000 level coursework throughout the degree. Utilize electives to reach these minimums.

Credits 16

Total Credits 120-122

This roadmap is a suggested plan of study and does not replace meeting with an advisor. Please note that students may need to adjust the actual sequence of courses based on course availability. Please consult an advisor in your major program for further guidance.

This plan is not a contract and curriculum is subject to change

Additional Information About this Plan:

University Degree Requirements: The minimum number of hours for a UNO undergraduate degree is 120 credit hours. Please review the requirements for your specific program to determine all requirements for the program. In order to graduate on-time (four years for an undergraduate degree), you need to take 30 hours each year.

Placement Exams: For Math, English, Foreign Language, a placement exam may be required. More information on these exams can be found at <https://www.unomaha.edu/enrollment-management/testing-center/placement-exams/information.php>