

Biology and English, BS

In the combined biology and English degree, science courses lay the groundwork for strong basic training in mathematics, chemistry, and physics that are relevant to biology. In biology courses, students broadly explore the organization and processes of life—from molecules and cells through organs and organ systems to populations, ecosystems, and evolution. In English courses, students study the diverse historical, cultural, and aesthetic contexts of English, American, and other Anglophone literatures; analyze writing practices and related media; and practice a variety of approaches to the study of language, rhetoric, writing, and literature. The fields of biology and English are bridged with course work in different forms of science writing, as well as psychology and sociology courses exploring the acquisition of language and reading; the sociology of health and illness; and the environment, technology, and society.

Program Requirements

- Concentrations and course offerings may vary by campus and/or by program modality. Please consult with your advisor or admissions coach for the course availability each term at your campus or within your program modality.
- Certain options within the program may be *required* at certain campuses or for certain program modalities. Please consult with your advisor or admissions coach for requirements at your campus or for your program modality.

Complete all courses listed below unless otherwise indicated. Also complete any corequisite labs, recitations, clinicals, or tools courses where specified and complete any additional courses needed beyond specific college and major requirements to satisfy graduation credit requirements.

Universitywide Requirements

All undergraduate students are required to complete the Universitywide Requirements (<https://catalog.northeastern.edu/undergraduate/university-academics/university-wide-requirements/>).

NUPath Requirements

All undergraduate students are required to complete the NUPath Requirements (<https://catalog.northeastern.edu/undergraduate/university-academics/nupath/>).

Biology Requirements

Code	Title	Hours
Introduction to College		
BIOL 1000 or ENGL 1000 or INSC 1000	Biology at Northeastern English at Northeastern Science at Northeastern	1
Experiential Learning Introduction		
EESC 2000	Professional Development for Co-op	1
Biology Core Courses		
BIOL 1107 and BIOL 1108	Foundations of Biology and Lab for BIOL 1107	5
BIOL 2299	Inquiries in Biological Sciences	4
BIOL 2301 and BIOL 2302	Genetics and Molecular Biology and Lab for BIOL 2301	5
BIOL 2309	Biology Project Lab	4
BIOL 3611 and BIOL 3612	Biochemistry and Lab for BIOL 3611	5
Organismal and Evolutionary Biology Elective		
Complete one of the following:		4-5
BIOL 2327	Human Parasitology	
BIOL 3401	Comparative Vertebrate Anatomy	
BIOL 3413	Current Topics in Organismal and Population Biology	
EEMB 2302 and EEMB 2303	Ecology and Lab for EEMB 2302	
EEMB 2400	Introduction to Evolution	

EEMB 2700 and EEMB 2701	Marine Biology and Lab for EEMB 2700	
EEMB 3460	Conservation Biology	
EEMB 3466	Disease Ecology	
EEMB 3600	Animal Behavior	

Intermediate/Advanced Biology Electives

Complete one of the following: 4-5

BIOL 2327 to BIOL 3999

BIOL 4705 to BIOL 5999

Supporting Courses for Biology*Chemistry*

CHEM 1161 and CHEM 1162 and CHEM 1163	General Chemistry for Science Majors and Lab for CHEM 1161 and Recitation for CHEM 1161	5
---	---	---

CHEM 2311 and CHEM 2312	Organic Chemistry 1 and Lab for CHEM 2311	5
----------------------------	--	---

CHEM 2313 and CHEM 2314	Organic Chemistry 2 and Lab for CHEM 2313	5
----------------------------	--	---

Math

MATH 1341	Calculus 1 for Science and Engineering	4
-----------	--	---

Biostatistics

ENVR 2500 and ENVR 2501	Biostatistics and Lab for ENVR 2500	5
----------------------------	--	---

Physics

Complete 1 lecture and lab, Physics for Life Sciences recommended: 5

PHYS 1145 and PHYS 1146	Physics for Life Sciences 1 and Lab for PHYS 1145	
----------------------------	--	--

PHYS 1151 and PHYS 1152	Physics for Engineering 1 and Lab for PHYS 1151	
----------------------------	--	--

PHYS 1161 and PHYS 1162	Physics 1 and Lab for PHYS 1161	
----------------------------	------------------------------------	--

Intermediate/Advanced Science Elective

Complete one course from the following: 4-5

BIOL 2301 to BIOL 5999

CHEM 2311 to CHEM 5999

EEMB 2290 to EEMB 5999

ENVR 2310 to ENVR 5999

MATH 2280 to MATH 5999

PHYS 2303 to PHYS 5999

PSYC 2290 to PSYC 5999

Writing Requirements for the College

ENGW 1111	First-Year Writing	4
-----------	--------------------	---

ENGW 3307 or ENGW 3315	Advanced Writing in the Sciences (Preferred) Interdisciplinary Advanced Writing in the Disciplines	4
---------------------------	---	---

English Requirements

Code	Title	Hours
Foundational Courses		
ENGL 1400	Introduction to Literary Studies	4
ENGL 1160 or ENGL 1410	Introduction to Rhetoric Introduction to Research on Writing	4
ENGL 1700 or ENGL 1701	Global Literatures 1 Global Literatures 2	4

English Electives

Two of the courses chosen from the lists below must be at the 3000 or 4000 level.

Code	Title	Hours
Diversity		
Complete one course from the following. You may reuse this course to fulfill an additional English requirement below:		4
ENGL 2296	Early African-American Literature	
ENGL 2450	Postcolonial Literature	
ENGL 2455	American Women Writers	
ENGL 2470	Asian-American Literature	
ENGL 2760	Writing in Global Contexts	
ENGL 3678	Bedrooms and Battlefields: Hebrew Bible and the Origins of Sex, Gender, and Ethnicity	
ENGL 3685	Modern and Contemporary Jewish Literature	
Literary Periods		
<i>Pre-1850</i>		
Complete one course from the following:		4
ENGL 1500	British Literature to 1800	
ENGL 1502	American Literature to 1865	
ENGL 1600	Introduction to Shakespeare	
ENGL 2296	Early African-American Literature	
ENGL 2330	The American Renaissance	
ENGL 3101	Early Literatures	
ENGL 3120	17th- and 18th-Century Literatures	
ENGL 3160	Topics in 17th- and 18th-Century British Literatures	
ENGL 3619	Emerson and Thoreau	
ENGL 3678	Bedrooms and Battlefields: Hebrew Bible and the Origins of Sex, Gender, and Ethnicity	
or JWSS 3678	Bedrooms and Battlefields: Hebrew Bible and the Origins of Sex, Gender, and Ethnicity	
ENGL 4010	Topics in Shakespeare	
<i>Post-1850</i>		
Complete one of the following courses:		4
ENGL 2301	The Graphic Novel	
ENGL 2420	Contemporary Poetry	
ENGL 2430	Contemporary Fiction	
ENGL 2440	The Modern Bestseller	
ENGL 2450	Postcolonial Literature	
ENGL 2451	Postcolonial Women Writers	
ENGL 2455	American Women Writers	
ENGL 2470	Asian-American Literature	
ENGL 2600	Irish Literary Culture (Abroad)	
ENGL 3161	20th- and 21st-Century Literatures	
ENGL 3685	Modern and Contemporary Jewish Literature	
or JWSS 3685	Modern and Contemporary Jewish Literature	
ENGL 3730	20th- and 21st-Century Major Figure	
Theories and Methods		
Complete one of the following:		4
ENGL 1140	Grammar: The Architecture of English	
ENGL 1160	Introduction to Rhetoric	
ENGL 1410	Introduction to Research on Writing	
ENGL 1450	Reading and Writing in the Digital Age	
ENGL 2510	Horror Fiction	
ENGL 2520	Science Fiction	
ENGL 2620	What Is Nature?	

4 Biology and English, BS

ENGL 2690	Boston in Literature	
ENGL 3070	Literary Genres	
ENGL 3325	Rhetoric of Law	
ENGL 3381	The Practice and Theory of Teaching Writing	
ENGL 3400	Opening the Archive	
ENGL 3487	Film and Text (Abroad)	
ENGL 3700	Narrative Medicine	
ENGL 4100	Topics in Literary Criticism (reactivating for Fall 24)	
LING 1150	Introduction to Language and Linguistics	
LING 2350	Linguistic Analysis	
LING 3450	Syntax	
LING 3452	Semantics	
LING 3454	History of English	
LING 3456	Language and Gender	
LING 3458	Topics in Linguistics	

Major Seminar

ENGL 3710	Major Seminar	4
-----------	---------------	---

Writing

Complete one of the following: 4

ENGL 2700	Creative Writing	
ENGL 2710	Style and Editing	
ENGL 2730	Digital Writing	
ENGL 2740	Writing and Community Engagement	
ENGL 2760	Writing in Global Contexts	
ENGL 2770	Writing to Heal	
ENGL 2850	Writing for Social Media: Theory and Practice	
ENGL 3375	Writing Boston	
ENGL 3376	Creative Nonfiction	
ENGL 3377	Poetry Workshop	
ENGL 3378	Fiction Workshop	
ENGL 3380	Writing Seminar	
ENGL 3384	The Writer's Marketplace	

English Electives

Complete any two ENGL courses that have not already been used to fulfill another requirement. 8

Integrative Courses

Code	Title	Hours
------	-------	-------

Integrative English Course

Complete one of the following: 4

ENGL 2620	What Is Nature?	
ENGL 2650	Science Writing: Origins, Ethics, and Emerging Genres	
ENGL 2770	Writing to Heal	
ENGL 3340	Technologies of Text	

Integrative General Biological Sciences Course

Complete the following:

PSYC 3464	Psychology of Language	4
-----------	------------------------	---

Capstone Requirement

Complete one of the following capstone options:

Code	Title	Hours
------	-------	-------

Biology Capstone

Complete one of the options to fulfill the capstone requirement in biology: 1-4

BIOL 4701	Biology Capstone	
-----------	------------------	--

BIOL 4900	Biology Research Capstone (concurrent with BIOL 4991 or BIOL 4994, which may be used toward Intermediate/Advanced Biology)	
BIOL 4971	Junior/Senior Honors Project 2	
English Capstone		
ENGL 4710	Capstone Seminar	4

Biology and English Combined Major GPA Requirement

Minimum 2.000 GPA required in all BIOL courses

Minimum 2.000 GPA required in all ENGL courses

Program Requirement

128 total semester hours required

Plan of Study

Sample Plan of Study

Year 1							
Fall	Hours	Spring	Hours	Summer 1	Hours	Summer 2	Hours
BIOL 1000 or ENGL 1000		1 BIOL 2299		4 BIOL 2301		4 Vacation	
BIOL 1107		4 CHEM 2311		4 BIOL 2302			
BIOL 1108		CHEM 2312		English Writing Elective		4	
CHEM 1161		4 ENGL 1160 or 1410		4			
CHEM 1162		ENGL 1400		4			
CHEM 1163							
ENGW 1111		4					
MATH 1341		4					
		17		16		8	0
Year 2							
Fall	Hours	Spring	Hours	Summer 1	Hours	Summer 2	Hours
BIOL 2309		4 BIOL 3611		4 Intermediate/Advanced BIOL Elective with Lab		5 Co-op	0
CHEM 2313		4 BIOL 3612		General Elective		4	
CHEM 2314		PHYS 1145		4			
EESC 2000		1 PHYS 1146					
ENGL 1700 or 1701		4 Literary Period 1		4			
English Diversity Elective		4 Organismal and Evolutionary Biology Elective		4			
		17		16		9	0
Year 3							
Fall	Hours	Spring	Hours	Summer 1	Hours	Summer 2	Hours
Co-op		0 Integrative Biology Course		4 ENGW 3307		4 Co-op	0
ENGL 3710		4 Intermediate/Advanced Science Elective		English Theories and Methods Elective		4	
		Literary Period 2		4			
		English Elective		4			
		4		12		8	0
Year 4							
Fall	Hours	Spring	Hours				
Co-op		0 ENVR 2500		4			
		ENVR 2501		1			
		ENVR 2502		0			
		BIOL or ENGL Capstone		4			
		Integrative English Course		4			

English Elective	4
0	17

Total Hours: 124