

Michigan Technological University
Bachelor of Science Degree Audit
Major Program: Biological Sciences, Concentration: Secondary Education
 Program Code: SBL7, Academic Year 2018-19
 Total credits required for the degree: 127

Biology Requirements: 26 credits

Course	Credits
BL 1010	4
BL 1020	4
BL 2100	3
BL 2200	3
BL 3012	3
BL 3190	3
BL 3400	4
BL 3782	2

Chemistry Requirements: 19 credits

Course	Credits
CH 1150 and	3
CH 1151 and	1
CH 1153	1
CH 1160 and	3
CH 1161 and	1
CH 1163	1
CH 2410 and	3
CH 2411	1
CH 2420 and	3
CH 2421	2

Mathematics Requirements: 7 credits

Course	Credits
MA 1135	4
MA 3715	3

Physics Requirements: 8 credits

Course	Credits
PH 1110 and	4
PH 1111	
PH 1210 and	4
PH 1200	

Biology Capstone Requirement: 2 to 3 credits

Select either Biology Capstone option. Research credits in Biology (BL 4000/4001) may be taken individually and require arrangement with the instructor. Additional research credits beyond the capstone requirement count as free elective credits.

Course	Credits
BL 4510 or	2
(BL 4000 or BL 4001) and BL 4530	3

Concentration Requirements: 41 to 42 credits

Course	Credits
BL 1580	1
BL 2160	4
BL 2170	4

Select one of the following:

Course	Credits
BL 2010 and	3
BL 2011	1
BL 4140	3
BL 4370	3

Education Requirements: 29 credits

Course	Credits
ED 3210	2
ED 3410	1
ED 4110	3
ED/HU 4150	4
ED 4300	2
ED 4700	3
ED 4720	2
ED 4910	12

Note: For Michigan Teaching Certification, students must also complete a secondary teacher certification minor through the Dept of Cognitive and Learning Sciences. In addition, students must become certified by the Red Cross or American Heart Association in child and adult First Aid and CPR.

General Education Core and HASS

Courses used to complete Core and HASS requirements may not be used to complete other degree requirements. Students must complete 12 credits of Core coursework and 12 credits of Humanities, Fine Arts, and Social Science (HASS) coursework. Repeatable courses may not be repeated for general education credit. Core and HASS courses can be found on the [General Education](#) page.

Core: 12 credits

Course	Credits
UN 1015	3
UN 1025 or an upper level modern language	3
Critical and Creative Thinking	3
Social Responsibility and Ethical Reasoning	3

HASS: 12 credits

Six of the 12 HASS credits must be at the 3000 or 4000 level (an upper division language course in place of UN1025 does not meet this requirement). No more than three credits may come from the HASS Restricted course list.

Course	Credits
Communication/ Composition	Minimum 3
Humanities and Fine Arts	Minimum 3
Social and Behavioral Sciences	Minimum 3
Course from any list above or from the Restricted HASS course list	0 to 3

Co-curricular Activities: 3 credits

Required for graduation, but not included in the GPA calculation or in the overall credits required for the degree. Only courses on the co-curricular course list are eligible. Half credit (0.5) courses may be repeated to a maximum of one time for co-curricular credit. Find eligible courses on the [General Education](#) page.

Course	Credits

Free Electives: Variable

Free elective credits are usually fulfilled by the required Secondary Teaching Certification Minor* credits. The amount will vary depending on the minor selected and the minor credits being used in other areas of this degree audit.

Course	Credits

*Complete a Teaching Certification Minor Audit with the Department of Cognitive and Learning Sciences.