SOUTH DAKOTA BOARD OF REGENTS
ACADEMIC AFFAIRS FORMS

New Site Request

Use this form to request authorization to deliver an entire existing degree program (graduate program, undergraduate major or minor, certificate, or specialization) at a new site or by distance delivery (including online delivery). Board of Regents approval is required for a university to offer programs off-campus and through distance delivery. The Board of Regents, Executive Director, and/or their designees may request additional information about the proposal. After the university President approves the proposal, submit a signed copy to the Executive Director through the system Chief Academic Officer. Only post the New Site Request Form to the university website for review by other universities after approval by the Executive Director and Chief Academic Officer.

UNIVERSITY:	NSU
DEGREE(S) AND PROGRAM:	BS Environmental Science
NEW SITE(S):	Online
INTENDED DATE OF IMPLEMENTATION:	Fall 2025
CIP CODE:	26.1301
UNIVERSITY DEPARTMENT:	Science and Mathematics
BANNER DEPARTMENT CODE:	NSCM
UNIVERSITY DIVISION:	College of Arts and Sciences
BANNER DIVISION CODE:	5A

☒ **Please check this box to confirm that:**

- The individual preparing this request has read AAC Guideline 2.3.2.4.A, which pertains to new site requests, and that this request meets the requirements outlined in the guidelines.
- This request will not be posted to the university website for review of the Academic Affairs Committee until it is approved by the Executive Director and Chief Academic Officer.

University Approval

To the Board of Regents and the Executive Director: I certify that I have read this proposal, that I believe it to be accurate, and that it has been evaluated and approved as provided by university policy.

Michael Wanous — President (or designee) of the University

11/22/2024 — Date

1. What is the need for offering the program at the new physical site or through distance delivery?

Environmental Science is a viable field. With increasing public interest and awareness of environmental issues, there is a rising demand for professionals who can address challenges in climate, pollution, and sustainable resource management. According to the United States Bureau of Labor Statistics, employment in the Environmental Science field is projected to grow 7% from 2023-2033, which is faster than the average for all occupations. It is estimated that approximately 8,500 openings for environmental scientists and specialists will occur each year over this 10-year span.[1]

[1] U.S. Bureau of Labor Statistics, 2023-2033 Occupational Employment Handbook, "Environmental Scientists and Specialists", https://www.bls.gov/ooh/life-physical-and-social-science/environmental-scientists-and-specialists.htm (site visited August 1, 2024)

Online delivery of the BS Environmental Science program supports "Goal 3: Academic Success, Student Outcomes, Educational Attainment" in the South Dakota Board of Regents Strategic Plan 2022-2027, specifically by responding to the Board's call to "Expand the type of instructional methodologies/modalities to meet the demands of students" and "promote working professionals/adult learners' completion goals."[2]

Online programs offer flexibility and accessibility, making them attractive to a broader range of students, including working professionals and those with family commitments. With the projected growth in employment in the field of environmental science, and because no other regental institutions offers an online or a general BS Environmental Science degree (see item 2 below), it is anticipated that our online program will appeal to and most benefit South Dakota residents who are geographically distanced from a regental campus as well as individuals outside of South Dakota who are looking for an affordable online option for a BS Environmental Science degree.

Additionally, according to the April 2021 Emsi report of the South Dakota Board of Regents Program Demand Gap Analysis: Economic Overview and Review of Academic Programs, there is a workforce gap for fields associated with environmental science. The programs in the Emsi report that our BS in Environmental Studies would most closely fall under are Sustainability Studies[3] and Environmental Studies,[4] and each program shows a deficit in South Dakota graduates when compared to South Dakota workforce demand (i.e. fewer graduates in a field than workforce demand). According to the Emsi report, Sustainability Studies, which the Emsi report lists as a "High Demand, Low Supply" program, is showing annual South Dakota job openings at 158 with SDBOR annual degree completions within this area totaling 8, leaving a state workforce gap of 148. Similarly, Environmental Studies also shows a gap with 13 annual South Dakota job openings and 10 SDBOR annual degree completions, leaving a state workforce gap of 3.[5]

2. **Are any other Regental universities authorized to offer a similar program at the proposed site(s) or through distance delivery? If "yes," identify the institutions and programs and explain why authorization is requested.**

   No other Regental universities are authorized to offer an online BS in Environmental Science. While Black Hills State University (BS Environmental Physical Science), South Dakota Mines (BS Atmospheric and Environmental Science) and South Dakota State University (BS Ecology and Environmental Science) offer a major in the field of environmental science on their main campus, none of these universities offers an online BS Environmental Science program.

3. **Are students enrolling in the program expected to be new to the university or redirected from other existing programs at the university? Complete the table below and explain the methodology used in developing the estimates.**

[2] "Goal 3: Academic Excellence, Student Outcomes, Educational Attainment." South Dakota Board of Regents Strategic Plan 2022-2027, page 12, https://sdbor.edu/wp-content/uploads/2023/09/StrategicPlan_22_27.pdf
[3] Emsi. "South Dakota Board of Regents Program Demand Gap Analysis: Economic Overview and Review of Academic Programs.: April 2021, page 56. https://www.bhsu.edu/Faculty-Staff/Sponsored-Programs/_docs/EmsiGapAnalysis.pdf
[4] Ibid, pages 29 and 105.
[5] Ibid, pages 38 and 43.

Northern anticipates that most of the students who seek to complete their BS Environmental Science online will be new to the university, although some may be re-directed from our on-campus program due to the flexibility of an online program, especially for those with work, family, or other commitments. Northern anticipates growth in enrollment in the BS Environmental Science program given the appeal of an online option. The methodology used is the current enrollment in the program:

	Fiscal Years			
	1st	**2nd**	**3rd**	**4th**
Estimates*	FY 26	FY 27	FY 28	FY 29
Students new to the university	7	9	12	14
Students from other university programs	5	4	3	3
=Total students in the program at the site	12	13	15	17
Program credit hours (major courses)**	120	120	120	120
Graduates		3	6	8

*These estimates are for the online program only and do not include numbers for the on-campus program, which will remain active.

**This is the total number of credit hours generated by students in the program in the required or elective program courses.

These figures were calculated by estimating that of the 52 required and elective major specific credits each major would take on average close to 12 of these credits per year with their remaining credits being taken in general education courses. These figures do not account for general education courses.

4. What is the perceived impact of this request on existing programs in the Regental system?

No impact on existing Regental programs is anticipated. Adding online delivery for the BS Environmental Science will provide flexibility and increase accessibility for students who want to pursue their education but are place bound due to current employment, family, or other commitments.

5. Complete the table and explain any special circumstances. Attach a copy of the program as it appears in the current catalog. If there are corresponding program modifications requested, please attach the associated form. Explain the delivery of the new courses and attach any associated new course request forms.

BS Environmental Science	Credit hours	Credit hours currently available from this university at this site	Credit hours currently available from other universities available at this site	Credit hours currently available via distance	Credit hours new to this university
System General Education Requirements	30	30	30	30	0
Subtotal, Degree Requirements	30	30	30	30	0
College of Arts and Sciences BS Requirements	2	2	2	2	0
Subtotal, Requirements of the Degree	2	2	2	2	0
Major Requirements	49	27	21	27	3
Major Electives or Minor	0	0	0	0	0
Subtotal, Requirements of the Proposed Major	49	27	21	27	3
Free Electives	39	39	39	39	0
Total, Degree with Proposed Major	120	98	92	98	3

Requirements for the BS Environmental Science as it will appear in the 2024-2025 Northern State University catalog, which includes the BS Environmental Science – Minor Program Modification and the BIOL 212 New Course Request passed by Northern's AAC in October 2024.

Courses Northern is currently authorized to teach online are indicated with an asterisk.

Program Requirements			
FYS	190	Freshman Seminar*	2
BIOL	130	Success in Science*	1
BIOL	211/L	Environmental Biology/Lab*	3
BIOL	212	Environmental Policy*	3
BIOL	281	Introduction to Statistics*	3
BIOL	284	Soils and the Environment*	3
BIOL	301/L	Plant Systematics/Lab	4
BIOL	311/L	Principles of Ecology/Lab	4
BIOL	377/L	Birds and Mammals/Lab	4
BIOL	436	Biogeography*	3
BIOL	454	Environmental Ethics*	3
BIOL	477/L	Wildlife Conservation and Management/Lab	4
BIOL	496	Field Experience	3
GEOG	131/L	Physical Geography: Weather and Climate/ Lab*	4
GEOG	132/L	Physical Geography: Natural Landscapes/Lab*	4
GEOG	372/L	Introduction to GIS/Lab	3

Student Learning Outcomes

- Students demonstrate the ability to analyze data and use taxonomic keys to identify organisms. *(Cross-curricular Skill: Inquiry and Analysis)*
- Students can demonstrate this by effectively communicating scientific results orally and in writing. *(Cross-curricular Skill: Critical and Creative Thinking)*
- Students can demonstrate this by identifying appropriate scientific sources and analyzing and interpreting data. *(Cross-curricular Skill: Information Literacy)*
- Students will demonstrate the ability to work as a team while completing research projects and presentations. *(Cross-curricular Skill: Teamwork)*
- Students will demonstrate the ability to design and conduct scientific research. *(Cross-curricular Skill: Problem Solving)*
- Environmental science students will establish skills in core disciplines of conservation biology, including knowledge of Geographic Information Systems and the biodiversity of plants and animals.

6. How will the university provide student services comparable to those available for students on the main campus?

Northern State University offers several degree programs, minors, and certificates in an online format. As a result, comparable services are firmly established. Student advising is provided by the Student Success Center, by the dedicated academic advisor for the Department of Science and Mathematics, and by faculty in the Department of Science and Mathematics. All student support services, along with appropriate technology resources, are available through distance technology. Additionally, Northern's Beulah Williams Library has a wealth of resources available to distance students, including online access to library resources, remote borrowing, and information and guidance regarding online research.

7. **Is this program accredited by a specialized accrediting body? If so, address any program accreditation issues and costs related to offering the program at the new site(s).**

   There is no specialized accrediting body for this program.

8. **Does the university request any exceptions to Board policy for delivery at the new site(s)? Explain requests for exceptions to Board policy.**

   We do not request any exceptions to Board policy.

9. **Cost, Budget, and Resources related to new courses at the site: Explain the amount and source(s) of any one-time and continuing investments in personnel, professional development, release time, time redirected from other assignments, instructional technology & software, other operations and maintenance, facilities, etc., needed to implement the proposed minor.**

   Northern is not requesting additional faculty or resources to deliver the BS Environmental Science program online. All courses needed for this program are offered by current faculty in their regular load, the new course will be included within the regular load of current faculty, over half (63%) of the required courses in this program are already authorized to be offered online, and Northern will be requesting online instruction for the courses that are not currently offered online. There are no additional costs to offering this program online. Tuition revenue generated from online tuition will adequately fund the program.