18 April 2019

To: Sarah Mangelsdorf, Provost

From: Paul Robbins, Dean, Nelson Institute

Subject: Completion of the 5/10 year review of the Environmental Conservation Professional Master’s Program

I am pleased to report that review of the Environmental Conservation MS program (EC) has been completed. Attached please find the review of the program authored by Professors Karen Strier, Erika Marin-Spiotta, and Stephanie Tai, and the response to the review from the staff of the EC program.

First, I take the opportunity to thank the reviewers, Professors Strier, Marin-Spiotta, and Tai, for taking on this important task in addition to their many other obligations. They provided a thoughtful and very useful report.

Overall, the review was positive. The reviewers indicated that they believed that EC is a valuable program and strongly endorsed its continuation. They also identified areas where improvement might be called for, and as the response of the EC team indicates, these were seriously considered and efforts will be made to address them. Some will require continued effort over time, such as the cultivation of broader support among faculty across campus.

We draw attention to one point made in the review which has implications for all programs of this type. It concerns the desirability of growing the EC program well beyond its present size. The review team expressed reservations about doing this. They stated: “The program’s efforts to recruit incoming classes of 25 students seems appropriate, not only for sound fiscal reasons, but also because of the heavy advising commitment and challenges of matching student interests for the final projects (conducted during the last 2-3 months of the program) with those of EC partners in the conservation community.”

I am of the opinion, conversely, that we do not know what a larger cohort might mean for program strength, since new students also means increased staff resources and expanded networks. It so happens that the incoming class for summer 2019 is the largest to date at approximately 32. We at Nelson intend to use this as an opportunity to “stress test” the program and determine what kind of growth we can sustain. I am reasonably confident that we have a larger audience out there for UW-Madison training, than we are meeting at present. We will need to see what we can deliver at scale.
The success of the EC program to date is because of the staff, Nathan Schulfer, Meghan Kautzer, Sarah Graves, and Shelly Strom. I commend them for their dedicated work in managing this program with efficiency and sensitivity.

Copies: Jocelyn Milner, APIR               Nicole Wiessinger, APIR
Paul Zedler, Nelson Institute           Tara Mohan, Nelson Institute
Lynn West, Nelson Institute            Karen Strier, Anthropology
Stephanie Tai, Law School               Erika Marin-Spiotta, Geography
Nathan Schulfer, Nelson Institute      Parmesh Ramanathan, Graduate School
Bill Karpus, Graduate School
Review Committee Report for Environmental Conservation MS Program

Date submitted: 20 March 2019

Review Committee Members: Karen Strier (Chair), Erika Marin-Spiotta, and Steph Tai (GFEC representative)

SUMMARY

The Environmental Conservation (EC) MS Program is a 32-credit, 15-month professional Master's degree program designed “to train conservation leaders in practical in a blended, on- and off-campus program.” The program has been operating for 5 years, having been reconfigured from the former Conservation Biology and Sustainable Development (CBSD) Master’s degree. According to the Self-Study the EC program has trained 98 students in its first four cohorts, with 97 of them graduating, and there are 24 students in its current (fifth cohort) on target to graduate in 2019.

Based on our review of the program’s Self-Study, supporting material, and interviews with students, staff, and faculty, we applaud the EC program for its particular successes in: i) recruitment levels that permit it to bring income to support other activities at the Nelson Institute in addition to remaining financially self-sustaining; ii) establishing a strong group of project partners where students get first-hand experience in their chosen areas of environmental conservation activities for their final projects; and iii) their high post-graduate placement levels. These achievements are impressive for a budding program, and we were particularly impressed with the commitment and dedication of the full-time staff who have made these possible.

Our recommendations for strengthening the EC program include: i) developing a strategic governance plan; ii) clarifying advisor roles and project placement processes and bringing academic advisors into the process at an earlier stage; iii) increasing faculty involvement and overall integration of the EC program on campus; and iv) performing a curriculum review.

Our review begins with a summary of our process, including the activities of the review committee and materials reviewed, followed by our perception of the EC program’s strengths and weaknesses. We close with some specific recommendations for the future. Following review guidelines, we do not reiterate data provided or points made in the Self-Study unless necessary to contextualize our comments.

ACTIVITIES OF THE REVIEW COMMITTEE AND MATERIALS REVIEWED

Process: We received the Environmental Conservation (EC) MS Program’s Self-Study and our charge from Paul Robbins, Director of the Nelson Institute, on 16 January 2019, with a request for our report by 25 March 2019. We worked with Paul Zedler, Interim Chair of EC, and
especially Tara Mohan, Curricular Administration Specialist at the Nelson Institute, to set up meeting times. The committee met on 20 February 2019 to discuss additional materials to request beyond that provided, and to identify which members of the program to contact for interviews. Interim Chair Paul Zedler was unable to attend due to weather-related travel delays. We held interviews on 13 March 2019, as described below. Committee chair Karen Strier drafted the first version of this Review, with additions and revisions from GFEC representative Steph Tai and committee member Erika Marin-Spiotta. All committee members then reviewed and endorsed our final report.

**Materials reviewed:** In addition to the Self-Study, the committee reviewed:

1) The Current EC course and curriculum requirements (via existing website links);
2) Course syllabi for required courses in the program and a list of elective courses taken by students;
3) Supplemental material on academic advising in the program;
4) Additional student diversity demographics (Note that data on the Female/male student ratio [3/4 are women], and domestic/international ratio [90 of 121 students were US] were included in the Self-Study; the additional documentation showed a majority of domestic students are white, with 0-2 Hispanic/Latino, 0-1 Asian, 0-1 Hawaiian/Pacific Islanders, 0 Black/African American of annual cohorts of 14-20 domestic students).

**Interviews conducted:** On 13 March 2019, we met with the following individuals/representatives:

1) Current EC student representatives (two attended)
2) Advisors (two attended)
3) Instructors (two attended, one of whom was also present as an advisor)
4) Nathan Schulfer, Director of International & Professional Programs
5) Janet Silbernagel, Past EC Program Chair
6) Paul Zedler, Interim EC Program Chair (via conference call)

**Strengths of the EC Program**

Sustainable size: The EC program has been successful in sustaining sufficient enrollments to cover all of its costs while also bringing additional income to support other activities at the Nelson Institute. Students from the program who enroll in other UW courses also bring funds to those departments. These financial agreements currently exist for only two departments at present, Geography and Forestry and Wildlife Ecology, where faculty who teach courses with EC student enrollments are also among those who serve as much needed EC faculty advisors.

The program’s efforts to recruit incoming classes of 25 students seems appropriate, not only for sound fiscal reasons, but also because of the heavy advising commitment and challenges of matching student interests for the final projects (conducted during the last 2-3 months of the program) with those of EC partners in the conservation community. EC staff maintain strong relationships with major conservation organizations, such as Conservation International, The
Nature Conservancy, and Rainforest Alliance, but competition for obtaining placements for EC students is increasing with the growing demand from other institutions seeking summer internships for both graduate and undergraduate students. A larger EC entering class would run the risk of straining the already heavy workload of the existing staff and undermining the EC program’s current success with placing students with their project partners.

**Placements and success with project partners:** A distinguishing feature of the EC program highly valued by current students is its successful placement of students with conservation organizations that serve as hosts for the student’s final projects. These placements have been developed over time and with established personal networks among EC staff and instructors. The program has now been operating long enough to have generated EC alumni, who are further extending the network of potential placements for EC students through not only their own placement, but their larger professional networks.

**High post-graduate placement levels:** The EC program has also been extremely successful in securing post-graduate employment for its students. Their first three graduate cohorts show nearly 100% employment within 6 months of graduation (with a majority of students obtaining employment within two months of graduation), despite a generally weak market in the government sector over the last two years. Of the graduates, approximately 33% entered the non-profit sector, 33% government, 9% education, and 9% private sector; 4% elected to enter other graduate programs and the remaining 9% were listed as "other."

**Dedicated staff:** The success of the EC program is heavily dependent on two key staff, Meghan Kautzer and Nathan Schulfer, who help students with their Individual Development Plan and to finalize their MS projects and liaison with faculty advisors, as well as to negotiate the students’ projects with the project partners. Although there is a Program Committee and a faculty Chair (currently, Interim chair Paul Zedler), most of the operational activities of the program revolve around these two key staff, together with EC course instructors, and two PhD academic staff (Rob Beattie and Alberto Vargas) who advise a large number of EC students. A number of other faculty serve as individual advisors to particular students.

**Suggestions for Strengthening the EC program**

**Governance:** The EC program’s Self-Study includes among its future directives a need to “continue to expand the size and diversity of the EC program committee.” We would agree with this self-assessment and extend it to include a strategic governance plan that also includes a plan for the Program Chair succession, terms for members of the Program Committee and recruitment of new members, and periodic meetings of the Program committee for programmatic development, as well as clear expectations for the roles and duties of these positions. Currently, the EC program committee consists of a total of 10 individuals: the Program chair, seven faculty/staff, and two student representatives. Continuation on the program committee is voluntary and new members are only recruited when there are openings. However, we were told that the Program Committee exists in case issues arise but
otherwise does not have regularly scheduled meetings. There is also no clear process of Chair succession, which makes the program potentially vulnerable to leadership gaps. We suggest that regular meetings, even if only once or twice a year, would provide useful opportunities for engagement and community-building. Appointment terms, at least for faculty, could be finite (but renewable), and future chairs could be identified in advance. Recruitment of additional faculty might also help to increase the faculty advisor pool and strengthen connections between the EC program and the rest of the campus. Other more established interdisciplinary professional programs on campus (such as LaFollette) might provide good models for governance and for expanding faculty participation.

Project Placement and Advising: The individualized nature of the EC program and its success with placing students with conservation project partners were identified by students as being among its major attractions that distinguish it from other professional conservation master’s programs elsewhere. Both of these attributes of the program require extensive interaction between students and the staff, who work to identify the best partners and projects for each student’s interests. This can be a long process, depending on the clarity of the student’s interests and the fit between them and the needs of the partner organizations where they will conduct their final projects during the last summer of the degree term. Ideally, these arrangements can be made during the fall semester, but in some cases finalizing where the students will go does not occur until mid-spring. Although it may not be possible to predict when arrangements can be finalized, greater communication about timelines and about the tremendous efforts of staff to work on these arrangements might help minimize the stress to both students and staff. Students might be reassured to learn via regular feedback that their project placements are being diligently pursued on their behalf. Clearer communication about funding opportunities available to support student placement would also alleviate some of the stress involved with the process, as traditional graduate student awards are often not available to professional Master’s students enrolled in a short program. Timelines about when students should become actively involved in communicating with their partners and what staff are doing at what stages of their program might be made more explicit for each student, perhaps in a dynamic way where students can easily check on the progress of their partner placement without having to consult with the staff. This would allow students to better accommodate other timelines, such as those for travel grant applications or other forms of financial support. In addition, where students have their own contacts and experience working with conservation partners, students could be more engaged in the placement process, relieving workload for the staff and building necessary skills in students.

The current policy is to wait until project placements are established before recruiting academic advisors. This has been a deliberate policy to protect faculty time commitments, as described in the Self Study. However, offering faculty the opportunity to become involved earlier in the process is likely to be beneficial to all involved and may alleviate some of the concerns about faculty engagement and student placements. Not only would it permit faculty to become more invested in the students' outcome, but it might also be a way to tap into faculty connections and expertise in particular areas. Having faculty advisors engaged at the time students are beginning to write their practice grant proposals (i.e., start of spring semester) might be
beneficial both to students and to faculty if they have particular guidance to offer or even other faculty connections on campus to recommend. Faculty input earlier in the project placement process might also help EC students to learn about potential funding opportunities both on and off campus. Finally, early participation of faculty in the program before placements and projects are decided may be an incentive for engaging new faculty, who would be able to contribute input along the way and become more invested in student success.

Integrating the EC program across campus: The Self Study reports that 26 faculty, staff, and outside partners have served as academic advisors for 97 EC students, but that many of these individuals have few advisees and the program relies heavily on two PhD academic staff (Rob Beattie and Alberto Vargas) for many students. We suggest that the EC program continue to work toward increasing the number of faculty and academic staff who can serve as academic advisors for EC students in order to relieve workload and also enhance the professional networks and experiences of students enrolled in the program. In addition, given the success of the EC program in attracting international students from the Global South, greater integration with other academic programs on campus, and especially through broadening the participation of faculty advisors, would be an enriching experience for all involved.

One of the faculty advisors we interviewed described both the benefits and challenges of having EC advisees together with academic, research-oriented PhD students. In this case, there were some additional incentives, in the form of dollars per credit paid to the faculty member’s department for EC students enrolled in those classes, that were then applied to support PhD students to help mentor the EC student. There may be other faculty on campus who would welcome both the diverse backgrounds and perspectives of EC students, and the influx of funds to their departments and their research groups that follow EC students into their elective courses around campus. Thus, it may be possible to expand the number of faculty involved in the EC program by communicating to a larger community the kinds of opportunities that teaching and working with EC students might provide.

Curriculum: The EC program has developed an effective 15-month masters’ degree that begins in the summer, continues across the next academic year, and completes at the end of the second summer. It includes a combination of in-class and on-line learning and culminates in the final project conducted at a partner institution. Overall, we were impressed with the breadth of topics covered. This was seen as a selling point for the students we interviewed, since many of them wanted to use this program to fill in gaps in their earlier educational backgrounds. However, as might be expected in any program that attracts students with diverse backgrounds, it is difficult to find a one-size-fits-all level of instruction. This seems to be particularly the case for the first summer introductory course (Conservation of Biodiversity, ES 951), which should be a critical foundation course for the rest of the program. We suggest that some attention be paid to this course, particularly to ensuring that it is current and provides all students coming into the program with contemporary perspectives on the field. This might be enhanced with the inclusion of an additional, possibly optional module, that would provide the foundational background for students coming from other backgrounds and therefore in need of
additional preparation. Engagement with a diverse set of faculty conducting conservation-related research in the introductory course could also be considered.

We also note that the grant writing course, which students take during the spring semester, could be amended to encourage students to make contact early on with potential experts or PIs and researchers with experience at the sites in which they propose to work. Encouraging students to do this early in the grant writing process might facilitate new networks as well as minimize the risk of students proposing projects that might not be feasible for a number of reasons. Grant writing is an important skill and this seems like a great opportunity from which students could get even more if they can also use it as a way to connect to established researchers in the areas in which they hope to work.

**Miscellaneous:** One of the areas for ongoing attention identified in the Self Study was to “continue recruiting international students and diversifying domestic students.” We could not agree more, and we encourage the EC program to consult with other professional programs at UW, as well as with other EC-type programs on other campuses, about possible strategies for doing this. Greater engagement with topics of climate change and environmental justice and placements with urban conservation agencies, in addition to the more traditional conservation NGOs, such as CI, TNC and Rainforest Alliance, would be one way to broaden the appeal of the program to a more diverse community of U.S. students.

A second consideration pertained to the size of the EC program. There is strong agreement that it is currently holding at an optimal and functional size. We suggest that external pressures to expand the program should be evaluated carefully, especially in light of the challenges of finding project partnerships for a larger number of students in what seems to be an increasingly saturated partnership environment.

**Recommendations**

We commend the EC program for its success in recruiting, training, and placing students during its five years to date. We also applaud the great commitment of program staff, instructors, and advisors, upon whom the ongoing success of the program depends. We encourage the EC program to pursue the directives as outlined in the Self Study, and we propose the following additional initiatives:

- Develop a strategic governance plan that includes a plan for the Program Chair succession, terms for members of the Program Committee and recruitment of new members, and periodic meetings of the Program committee for programmatic development and overall review.

- Strengthen advising communication, including defining and conveying staff versus faculty advisor roles and when possible bringing faculty advisors into the process at an earlier stage, and provide students with ways to check on the timeline of their placement plans and what point at which they should become directly involved.
• Develop a plan for increasing faculty involvement and overall integration of the EC program [including courses and faculty] with others on campus, perhaps through recruitment events and incentives such as information about payment per credit.

• Review the curriculum with particular attention to the summer introductory course and the grant writing course.
Environmental Conservation program responses to 5/10-year Faculty Committee recommendations:

1. During summer 2019 EC staff will develop a plan for Program Chair succession, and for term lengths for committee members. This plan will be shared with the EC Program Committee during the fall 2019 meeting for review and approval. During the spring 2019 committee meeting we also discussed ways in which we can recruit new members to our program committee, including updates to our academic advising guidelines, and through increased outreach to faculty members across campus. We will also work on increasing and diversifying our committee membership during summer 2019.

2. Our team is now working on new communication documents, timelines, and guidelines that will better define advising roles for faculty, staff, and students. We will also work to bring faculty into the advising process earlier, while developing a better system for students to track the progress of their project. This system will also offer more ways for students to effectively engage in the development of their MS project.

3. Building on point #1, we will work and implement new ideas for recruiting members to our program committee, including updates to our academic advising guidelines, and through increased outreach to faculty members across campus. We believe these efforts will increase and diversify our committee membership.

4. We will continue to do annual evaluation of the EC program, as per campus rules, which includes review and assessment of all courses in the EC curriculum.