## Department of Geography

## Academic Program Review Report

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## Preface

An Academic Program Review (APR) of the Department of Geography at Memorial University was completed in fall 2011. Following receipt of the Academic Programme Review Self-Study (September, 2011), the review committee completed on-site interviews on October 27-28, 2011. All members of the Department - faculty, staff, and those graduate and undergraduate students who accepted the invitation to attend - provided their input into the process and the results of all interviews were carefully noted by the members of the review committee. The itinerary for the visit is reprinted in the Appendix.

The review committee would like to thank Kim Myrick and Lorraine Kenny from the Centre for Institutional Analysis and Planning, the Dean of Arts, the Dean of Graduate Studies, the Chair of the Department of Geography, and all the staff and faculty of the Geography programme, together with all the students who met with or wrote to us, for their help and generous hospitality. Thanks to their efforts, this review process was a pleasure.

## I. Introduction

The Geography Department at Memorial University is offering an outstanding program that demonstrates sustained and innovative achievement in the areas of teaching, research, learning and engagement.

## 1. Teaching and Supervision

The Department of Geography clearly demonstrates a sustained commitment to undergraduate and graduate instruction. The Department completes regular assessments of its undergraduate course offerings, and these assessments have provided the impetus to alter the content of lower unit courses and to ensure that, wherever possible, these courses are presented at the most appropriate times. Recognition of the evolving expectations of its students and the growing regional expertise of its teaching cadre has led to the introduction of new, highly popular courses. The quality of instruction offered in this program is reflected in the positive assessments received by all members of the faculty.

The Department is in the midst of a large graduate student expansion. Responsive to Memorial's desire to augment the graduate programs, and the result of a renewed faculty cadre, this growth has brought with it significant space and time challenges discussed later. The undergraduate and graduate students who came before the review committee were universal in their praise of the Department. They were unanimous in their appreciation of the instruction and guidance offered to them.

## 2. Research

The Department has developed its research to an outstanding level, a salutary achievement reflected by the scholarly accomplishments of both faculty and students. Most faculty have vigorous and well-funded research programs that serve as exceptional vehicles for enhancing the research experiences of both undergraduate and graduate students. These opportunities serve as attractive forces for drawing both internal and external graduate applicants.

The research activity of faculty takes place at local, regional and global scales. There is a commendable commitment to ensuring that these research endeavours contribute to community development and well-being.

## 3. Learning

It is obvious that the Department is strongly student-focused and wholly aware of the needs of those students.

## 4. Engagement

The Department demonstrates a remarkable record of engagement in local and regional outreach, linked to major regional and global issues. Overall, the review committee was happy to note a cohesive and collegial Department; high morale and commitment to the discipline; a strong, creative, and productive Chair; and staff that is clearly effective and entirely competent. In short, it is a thriving Department that should be congratulated on its achievements and dynamism.

## II. The Department's Potential

In the Canadian context, the Memorial University Department of Geography is a relatively small department punching well above its weight category. It is the view of the review committee that, with some investment from the University, the Department has the potential to be at the forefront of geography in Canada. With a young, dynamic, cadre of innovative researchers, given adequate and sustained support the Department could have importance and impact well beyond the region and beyond Canada. At the moment, however, in the view of the review committee, its potential is limited by the following factors:

## 1. Structural Constraints: Space

The space provided for the Department is, at present, clearly inadequate. More and higherquality space is required for: (a) the office and research needs of present and anticipated faculty; (b) the storage and use of dedicated research instrumentation, as well as teaching and staffdedicated equipment (e.g., a large scanner); (c) a wet teaching laboratory; and, (d) graduate students.

In addition, the existing departmental space suffers from deficiencies that directly affect the activities of staff and faculty. We note in particular: (e) that the departmental administrative offices are distributed rather than clustered to the detriment of their efficiency; and, (f) that the majority of Faculty offices suffer from high noise levels throughout the day due to their placement along a main university thoroughfare. Ideally faculty doors should be open but this is impossible for many of the geography faculty at Memorial.

## 2. Institutional constraints: Operating Funding

We regard the base funding supplied by the University to operate the Department of Geography as desperately inadequate. Low base funding does not allow the department to plan for the future, to introduce innovative teaching methods or, even, to sustain its existing infrastructure and momentum adequately.

Rather than seeing the department worry about whether the bulbs in their projectors will burn out, the department's operating budget should be substantially enhanced. This university commitment would serve to recognize the achievements of the department and permit the immediate enrichment of their academic, teaching (ie. field courses) and outreach programs. Continuing to starve the department of the critical financial resources it needs to function, hinders its ability to function and dynamically contribute to the university.

## 3. Institutional constraints: Staff

Five staff members is an effective but absolute minimum for this Department. Since the last APR, the department has acted extraordinarily responsively to the suggestions of that previous committee. One significant change has been a substantive expansion and commitment to the departmental graduate teaching program. With this growth has come more activity (fund raising, supervision, more teaching, more collaboration) and a dramatic expansion of the department's research program.

Accompanying this growth has been the ever-increasing demand placed on all departmental staff members. We noted, in particular, how the departments' greatly expanded graduate program has not been matched by the university resources needed to fund critically-needed clerical support staff.

## 4. Institutional constraints: Office of Research Services (ORS)

Many members of faculty, and some administrators, reported to our review committee that dealing with the ORS is extremely challenging, and that bureaucratic difficulties have impacted their research programmes. It was reported to the review committee that individual faculty have given up on applying for certain types of funding due to repeated dealings with the ORS.
Specific examples of this related to the committee included obstacles introduced by the ORS that resulted in students being forced to wait months for support payments.

Our perspective is that ORS is an organization that should support and enhance the capacity of faculty to seek funding, support their students and conduct research. If this is not happening at Memorial, some reform is needed.

## 5. Institutional constraints: Workload

We discovered that the teaching workload of faculty members in the department is higher than for faculty at most Canadian geography departments. Clearly such workloads are not conducive to tri-council research competitiveness.

While we learned that workloads are recognized as an issue throughout the Faculty of Arts, and that discussions are underway as to how best to address these, it needs to be recognized that the performance of individual faculty in the department (responsible for nearly $50 \%$ of the research income generated within the Arts Faculty) is being compromised by the assigned teaching loads and the inadequate support given for these activities.

Teaching buy-outs are not a healthy solution to this problem as: they are difficult to administer and keep track of over time; they create inequalities that make it difficult for faculty to attain their potential; and, they undermine morale and collegiality. In addition, they tend to lead to a "research is more important than teaching" mentality. Faculty in the department expressed these concerns clearly.

## 6. Internal Issues: Graduate programs

(a) It is the view of the review committee, and of most faculty involved in graduate education, that the comprehensive exams as they are currently administered (for PhD students) are too laborious, time consuming, and uneven in their application. Such examinations should not delay students' research progress, but rather should help them prepare for future teaching and research responsibilities. The department knows how to rectify this issue and, in fairness to the students, should do this immediately.
(b) There are currently two mandatory graduate courses - GEOG6000 and GEOG6001, Development of Geographical Thought and Practice I and II. We wonder whether it is necessary to have two such courses. We suggest a better approach might be to offer a single common course focused on the history and philosophy of geography, and then offer a choice of a second required methodology course. One specifically tailored for Master of Arts (and human geography PhD ) students and a second directed to Master of Science (and physical geography $\mathrm{PhD})$ students.

## III. Recommendations

Following our review of the Department of Geography, the APR committee makes the following recommendations:

## 1. Hiring of New Faculty

The Department is requesting two incremental positions: one in Human Health and Security; and, a second focused on Hydro-climatology. The fundamental rationale for growth presented by the department is that effective (numerical) clustering of faculty within targeted thematic areas would enhance research synergies within and beyond the Department. The Department argues that full realization of their dynamic and competitive graduate program, requires establishment of a sustainable grouping of research and teaching faculty.

## Human Health and Security:

We agree with the department that an appointment in health and security would significantly contribute to Memorial's commitment to the North and Labrador. It would extend Memorial's expertise beyond biomedical approaches to include environmental and social change. Climate variability, exposure to contaminants, changing food consumption patterns, and lifestyle changes are all of fundamental importance to northern communities.

The Department already has capacity in the area of health, the environment, and security as evidenced by the work of four faculty members on electronic waste, environmental lead contamination in St. John's, abandoned mines in the North and the spatial mapping of health issues. An incremental appointment in the area of Human Health and Security would recognise the vulnerability of communities in these remote settings and provide readily available expertise for those concerned with building resilient households in the face of environmental and economic crises. It would also recognize health as a security issue. Healthy communities are secure and resilient to environmental and social change. By this measure many northern and Aboriginal communities are severely challenged and need urgent attention.

The review committee considers this position crucial to Memorial's development as a centre of excellence in engaged community-based research. It would enhance capacity in the form of teaching and learning for the Province and for Canada in this sector.

## Hydro-climatology:

There is a critical need in Newfoundland and Labrador for expertise in hydrology. The massive investment associated with the Muskrat Falls hydro-electric project, concerns about flooding
hazards associated with extreme rainfall events, and recent ice-jam disasters have significant social, physical, and economic impacts.

An incremental appointment in this field would strengthen Memorial's research and teaching capacity within the area of Climate and Environmental Change. Within the geography department the addition of a faculty member with this expertise would strengthen research and teaching foci in the areas of human impacts of climate change, requiring expertise in hydroclimatology.

As with the position in Human Health and Security, the review committee considers this position of strategic importance and warranted to be incremental.

## 2. Review of the Graduate Program

We recommend a review of the graduate programs in Geography at both the master's and doctoral levels. The review committee should comprise members internal and external to the Department. The Department of Geography has grown in stature and presently offers a mature disciplinary program of study. Our recommendation is that the Department look carefully at the instructional programme it currently offers its students.

The department currently offers a master's program intended to reflect the needs of individual students. While this approach has provided a successful mechanism for mentoring student research programmes, the number of current and projected students suggests to the APR committee that the department should develop a more formalized approach to their education.

We suggest that the Department should develop distinct programs for their MA- and MScfocused students. Whereas the normal practice in Canadian geography graduate programs is to ensure that each cohort completes a suite of degree-specific courses, the current departmental structure focuses on a common-suite of cross-over courses. While there is certainly value in this approach, the Master's program has grown to a size where the department needs to ensure graduates have training and skill-sets appropriate to their degree.

An approach oftentimes employed is to require a graduate-level quantitative statistics course of MSc students and a qualitative statistics course of MA students. We are not necessarily advocating a similar narrow approach, but are recommending that discussions be initiated on appropriate common skills for MA (and PhD ) and MSc (and PhD ) graduates.

One component of the doctoral program that struck the committee as odd was the format and nature of the PhD comprehensive examinations. This sentiment was reflected in comments
received from both students and faculty. We would urge the Department to review this process in the context of similar practices in other Canadian geography departments, with an aim to streamlining what is oftentimes a lengthy process into a more productive requirement respecting the research ambitions and needs of the individual PhD candidates.

## 3. Operating Budget

The review committee recommends that the operating budget of the Department be increased to an amount appropriate to the needs of the Department as outlined in this report.

## 4. Space

The review committee was informed that the University hopes to have a new Science Building within three years. Given this context, the review committee recommends that the Associate Vice-President for Academic Planning should work closely with the Geography Department to create a space plan for the Science building. Given the long time lines for design and construction, we believe that this planning work should start now. As stated above, the challenges to be met include:
a) Adequate laboratory space for present and anticipated faculty;
b) Adequate space for storage and use of equipment;
c) Adequate graduate student space;
d) Faculty and graduate student offices shielded from undue corridor noise;
e) Consolidation of administrative offices; and
f) A wet teaching laboratory.

The committee also suggests hiring a professional space consultant and executing a plan well in advance so that administrators and researchers can plan appropriately.

## 5. Staffing

The review committee recommends the appointment of an additional half-time staff position dedicated to the geography graduate program. The responsibilities assigned to this individual might also include helping to develop undergraduate research opportunities for senior undergraduates, as well as time devoted to supporting faculty in fund raising and fund management specifically to support graduate students.

## 6. Workload

Ideally, the workload of all faculty members should be reduced to $2+2$ to reflect the new demands of a growing graduate program, to support increased research activity, to foster excellence in teaching, to promote a greater equivalence between the faculties of Arts and Sciences, to reflect the standard load in research intensive geography programs across Canada, to improve workload equity within departments and to reduce the complexity of teaching program planning. The committee recognizes that this is a matter that concerns the Faculty of Arts as a whole and that discussions have been initiated to examine this question.

## 7. Relations with the Office of Research (ORS)

Evidence presented to the committee during the two days of the Program Review indicates that dealing with the Office of Research can be extremely challenging. In top flight universities this office plays a strong supporting role for researchers. The review committee therefore recommends attention to the relationship between the department and the Office of Research, with particular attention to efficiency of procedures. Improvements made could subsequently benefit all departments in the Faculty of Arts.

## 8. The Academic Review Process

The review committee would like to suggest certain changes to the Academic Review Process as the committee experienced it, namely:
(a) A confidential meeting with the Chair of the Department prior to the final exit meeting with the Dean of Record;
(b) Meetings with all Deans relevant to the programs being offered. With Geography offering programs in both Arts and Science, a meeting with the Dean of Science would have made sense;
(c) Departments should be directed to develop reports that address long-term planning in the context of the university strategic plan supported by numerical information on all components of the program. In this matter, Departments will need assistance from the Centre for Institutional Planning and Analysis, the Faculties and the Graduate School and should initiate consultation with cognate departments and other geography programs on best practices.


