

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

Anthropology

Date of Review: March 23 and 24 2017

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the undergraduate and graduate programs delivered by **Department of Anthropology**. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Cyclical Program Review of the Undergraduate and Graduate Anthropology Programs

In accordance with the Institutional Quality Assurance Process (IQAP), the Department of Anthropology submitted a self-study to the School of Graduate Studies in January 2017. The self-study presented the program descriptions and learning outcomes, an analytical assessment of these two programs, and program data including the data collected from a student survey along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the CVs for each full-time faculty member in the Department.

One external reviewer from Ontario, one external reviewer from Alberta and one internal reviewer were endorsed by the Dean, Faculty of Social Sciences and selected by the Associate Vice-President and Dean of Graduate Studies. The review team reviewed the self-study documentation and then conducted a site visit to McMaster University on March 23 and 24, 2017. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President, Faculty, Associate Vice-President and Dean of Graduate Studies, Dean and Associate Dean of the Faculty of Social Sciences, Chair of the department and meetings with groups of current undergraduate students, full-time faculty and support staff.

- **Strengths**

In their report (April 2017), the Review Team highlighted the following strengths of the program:

- The strengths of the Department are made evident in the report. First, the Department works at a very high rate of research productivity, as evidenced by its research output, including talks and publications. The Department also enjoys a very high success rate in CFI and Tri-Council funding.
- The Department enjoys a high success in graduate student funding, largely by Canada’s Tri-Council, but also international funding sources, including the highly prestigious Wenner-Gren and Fulbright grants.
- Although the Department consists of three subfields (archaeology, cultural anthropology, biological anthropology) that both intellectually and methodologically can hold different points of orientation, the Department enjoys a high level of collegial interconnectedness and coherence that is not self-evident in a Anthropology department of such diversity and size.

- **Areas for Enhancement or Improvement**

The Review Team noted the following areas for improvement in the program:

- The report has identified four major areas for improvement: 1) the health field, 2) course offerings on the undergraduate level, 3) course offerings on the graduate level, and 4) the relationship between the Department and the Indigenous Studies Program.
- The Department agrees with report’s recommendation for the hiring of three positions (cultural anthropology, health, and Indigenous Studies), but realizes that – most likely – these resources will not be immediately diverted from the faculty to the department level. Given this scenario, it has agreed in Department meetings and in its Strategic Research Plan to advocate first and foremost for a Cultural Anthropology position. It also would like to maintain some autonomy in relation to the way in which positions will be defined, and would like to follow – as closely as possible – the trajectory as outlined in its Strategic Plan.

Summary of the Reviewers’ Recommendations with the Department’s and Dean’s Responses

Recommendation	Proposed Follow-Up	Responsibility for Leading Follow-Up	Timeline for Addressing Recommendation
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<p>At a number of places, the report states that the department needs to determine “whether to build or eliminate the health field in both the undergraduate and graduate programs.”</p>	<p>The department’s executive committee and the department as a whole will meet to follow-up on the recommendation to build or eliminate the health field in the graduate program. As stated above, there is currently no health field in the undergraduate program.</p>	<p>The Department Chair, in conjunction with the department’s executive committee, graduate committee, and faculty members will carry the responsibility for leading the follow-up.</p>	<p>Unfortunately, in the 2017/18 academic year five faculty members will be on administrative or research leave: 3 on a six-month-leave, and 2 on a 12-month leave. Given that –as the report correctly states – decisions related to the health field are potentially contentious, the Department as a whole will start to follow up on this issues in the 2018/19 academic year. This may seem late, but since the outcome of this process will affect the entire department for years to come, it seems wise to wait until then.</p>
<p>The report advises the department to revise undergraduate course listings, especially in terms of the number of courses being offered.</p>	<p>The department will follow up on this suggestion to tighten its undergraduate program in regard to its course offerings.</p>	<p>The Undergraduate Chair, in consultation with the undergraduate committee and faculty members will lead this process.</p>	<p>This process will be initiated in the 2017/18 academic year. Given various administrative timelines, it can be completed in 2018/19.</p>
<p>The report advises the department to examine its course offerings on the graduate level, specifically with a view to the internal competition that seems to exist between the three subfields mentioned in the report: cultural anthropology, archaeology, biological anthropology.</p>	<p>The department will follow up on this suggestion. However, it is important to note that the current chair and graduate chair began this process in 2016-17 by raising pertinent issues with faculty members. The department will continue to streamline graduate courses and work on creating more</p>	<p>The Graduate Chair, in consultation with the graduate committee and faculty members will lead this process.</p>	<p>This process will be initiated in the 2017/18 academic year. Given various administrative timelines, it can be completed in 2018/19.</p>

	courses that cross-cut subfields.		
The Department takes the report's recommendation to build a "fruitful relationship" with the Indigenous Studies Program seriously.	In consultation with ISP and the FSS Dean, the Department would like to think about possibilities to initiate and sustain such a "fruitful relationship." It is pleased to recognize that the report states that "Dr. Martin-Hill's position [...] provides a wonderful bridging opportunity," and would like to reiterate its willingness to work with ISP and the Dean on this issue.	The Department Chair will carry the responsibility on following up on this suggestion.	This process can be initiated in the 2017/18 academic year.

Faculty Response:

The reviewers' overall assessment is that the Department of Anthropology offers excellent education to its undergraduate and graduate students. The department has implemented a number of important innovations in recent years and the undergraduate program in particular offers a more integrated curriculum across the sub-disciplines than do most anthropology programs in Canada. The reviewers, as directed, also identify a number of areas where the program and department could make changes to improve the programs. None of the recommendations, to the Dean's knowledge, required changes in organization, policy or governance to implement. Some require resources. Most require deliberation among departmental members and between the department and the Faculty to assess the best way to respond to the recommendations in the context of current resources and desired directions for the undergraduate and graduate programs. The Dean's response below focuses on the key recommendations offered by the reviewers, focusing first on those recommendations that raises issues of resources.

Human Resources

The reviewers make recommendations in three areas that pertain to faculty resources and one that pertains to staff resources.

Faculty

- That, should the department want to retain the health field, the Faculty consider funding a hire to contribute to it
- That the department re-think its relationship to the Indigenous Studies Program (ISP), and Dawn Martin-Hill's commitments in particular.
- That the department retain the hiring of a socio-cultural faculty member as a priority.

The Dean recognized that recent retirements and departures have weakened the health field within the department and that the department has identified the hiring a socio-cultural anthropologist as a need and priority. The ability to address these needs depends on resources available to the Faculty, and Anthropology's needs relative to other departments, schools and programs within the Faculty. It may also be possible to help address both of these priorities with a single hire of a socio-cultural anthropologies working in the area of health. While the Dean recognized these needs, the uncertainty created by the new provincial funding model for universities, and its impact on McMaster and the Faculty of Social Sciences in particular, precluded him from making any commitments regarding faculty hires.

The issue of Anthropology's relationship to the ISP, and opportunities for anthropology students to pursue interests in Indigenous history, culture and knowledge systems, extend beyond Dawn Martin-Hill's appointment. The ISP is keen to work with other programs to increase the numbers of students studying Indigenous history, culture and knowledge systems at both the undergraduate and graduate levels. This presents many opportunities to expand the options for anthropology students to pursue Indigenous-related interests. In addition, the ISP and School of Social Work are jointly developing a new graduate course on Indigenous knowledge systems open to all graduate students within the Faculty of Social Sciences. It is being offered on Dean's permission in 2017-18, and will be offered into the future if there is sufficient interest. So opportunities are expanding, and the Faculty welcomes Anthropology's participation in discussion regarding how best to expand such opportunities further at the undergraduate and graduate levels.

Staff

- Make the Archaeology Instructional Assistant a 12-month contract rather than a 10- month contract

The 10-month contract reflects the structure and timing of course offerings within the program. A shift to a 12-month contract would only make sense under a revised curriculum, with commensurate resources to fund the additional two months over the summer.

Physical Resources

The report observes that overall the current teaching labs are serving the program well, but makes a set of recommendations to restructure, reorganize and/or develop further aspects of these labs.

- Of particular importance is the Human Skeletal Biology and Bioarchaeology lab, which is a bottleneck in the undergraduate program. The Faculty will work with the department this coming year to assess what physical or scheduling changes can be made to address these concerns.
- The reviewers recommend enhanced space for the biological anthropology lab and identifies needs associated with ANTH 2D03 and ANTH 3R03. In the review of space requirements within the Faculty this past year, these needs were not identified as a priority by the department, but as part of the Faculty's continuing review of space allocation, this coming year the Dean will work with the department to consider these recommendations.
- The Dean shared the reviewer's assessment that the Sustainably Archaeology Lab provides an underdeveloped opportunity for training undergraduate and graduate students, and will work with the department, and the Lab Director, Aubrey Cannon in particular, to explore ways to facilitate its use in student training.

Financial Resources

- The report recommends that the university "enhance and/or regularize" the financial support of graduate student fieldwork. The Faculty is prepared to work with the department and the School of Graduate Studies to assess options that can address the financial needs of graduate students conducting fieldwork.

Educational Programs

The report recommends a number of actions to enhance the undergraduate and graduate programs and which that have no direct resource implications. The Faculty will work the department and its respective undergraduate and graduate committees to support changes as appropriate. Here the Dean offered comment on two issues identified by the reviewers.

- Student Advising. The report indicates that inconsistency in academic advising occurs between the department, the Faculty advising and the website. We will work with the department before the start of the Fall term to improve coordination between the department and the Faculty advisors; website issues will be addressed as part of the Faculty refresh of its website. In the longer term, the Faculty will be using strategic funding from the Provost to create an on-line academic "journey planner" that should help students understand program options and requirements.
- Teaching Opportunities for Graduate Students. Anthropology, like all departments, is allocated PhD teaching Fellow positions to enable graduate students to gain teaching experience. Further, the allocation of TA resources to the department has increased slightly in recent years. Resources to support teaching opportunities therefore are likely not the problem; it may be a matter of course designs and how TA funding is

used within the programs.

Quality Assurance Committee Recommendation

McMaster's Quality Assurance Committee (QAC) reviewed the above documentation and the committee recommends that the program should follow the regular course of action with an 18-month progress report and a subsequent full external cyclical review to be conducted no later than 8 years after the start of the last review. The committee will request an update on the strategic plan concerning the Health Studies field to be included the progress report.

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

Clinical Behavioural Sciences Graduate Diploma

Date of Review: February 20th and 21st 2018

In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the Clinical Behavioural Sciences Graduate Diploma. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Review

In accordance with the Institutional Quality Assurance Process (IQAP), the Clinical Behavioural Sciences program submitted a self-study in January 2018 to the Vice-Provost and Dean of Graduate Studies to initiate the cyclical program review of its graduate diploma. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study contained all course outlines associated with the program and the CVs for each full-time member in the department.

Two arm's length external reviewers and one internal reviewer were endorsed by the Dean, Faculty of Health Sciences and selected by the Vice-Provost and Dean of Graduate Studies. The review team reviewed the self-study documentation and then conducted a site visit to McMaster University on March 30 - 31, 2017. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President, Faculty, Associate Vice-President and Dean of Graduate Studies, Associate Dean, Grad Studies and Research, Director of the Clinical Behavioural Sciences program and meetings with groups of current students, full-time faculty and support staff.

The Director of the program and the Dean of the Faculty of Health Sciences submitted responses to the Reviewers' Report (April 2018). Specific recommendations were discussed and clarifications and corrections were presented. Follow-up actions and timelines were included.

- **Strengths**

The Diploma program has existed for many years and, over time, the program has adapted to changes in community needs and has consulted with community agencies to ensure that the educational offerings are matched to the training needs in the community. In addition to the problem-based learning approach used throughout the program, an innovative feature of the CBS Diploma program is that students are able to obtain knowledge of evidence-based services and programs and, in many instances, also obtain direct experience in the provision of these services/programs. Finally, a major strength of the program is the involvement of many highly motivated and committed program faculty members who are passionate about contributing to the program.

- **Areas for Enhancement or Improvement**

The main issue facing faculty members associated with the program is how to adapt the program to the changing needs of the community and the proposed MSc program in Psychotherapy. Once the decision about the main focus of the program has been made, it will then be possible for faculty members to prioritize options for enhancement, including (a) establishing new working relationships with health service graduate programs, health service agencies, and accrediting bodies and (b) examining options for online courses, distance learning, and the development of workshops tailored to organizational needs.

Summary of the Reviewers’ Recommendations with the Department’s and Dean’s Responses

The CBS Graduate Diploma program is in a current state of reorganization with the proposal of a Master of Science in Psychotherapy now being considered for approval, which if approved, will potentially require changes to the CBS Diploma. Thus, the Reviewers’ have outlined recommended decisions to be made or next steps to be taken to modify the structure of the program, rather than major changes to the learning objectives or curriculum, which we agree is reasonable.

Recommendation	Proposed Follow-Up	Responsibility for Leading Follow-Up	Timeline for Addressing Recommendation
1) Those charged with guiding the diploma program will need to ensure that the program continues to adapt in order to stay relevant for the community.	Survey applicants and current students to determine which courses or sequence of courses are of greatest interest to complete.	Program Director and Program Coordinator	Develop survey and submit survey to students in Fall term 2018 and Winter term 2019. Review results following Winter term 2019.
2) For some of the five study areas, the course-based format may not be the best learning option and other options, including online courses and workshops tailored to community needs, should be explored.	The program has already begun to hold workshops, which are outside the purview of this review and are separate from the Diploma program	Not applicable	Not applicable

<p>3) It is unlikely that it will be possible to continue to offer all specialized training options and, therefore, decisions will need to be made to determine which course sequences best meet the needs of the community and should be retained and further developed.</p>	<p>The program has begun to limit course offerings to those courses with a history of adequate enrollment numbers and student interest.</p> <p>Continue to review the enrollment numbers for current course offerings, in addition to the survey responses.</p>	<p>Program Director, Program Coordinator and Curriculum Committee</p>	<p>Currently ongoing and will formally review enrollment numbers in January 2019 prior to choosing courses for 2019-2020 academic year.</p>
<p>4) Decisions about courses and the manner in which offerings are delivered will vary across the five study areas will need to be made soon.</p>	<p>Continue with current practice of offering courses that have the highest enrollment rates.</p> <p>See response to item 1 and 3. Program will survey incoming and current students regarding courses of interest.</p> <p>Evaluate opportunity for students with interest in completing courses that are often offered due to low enrollment to take as an independent study course.</p>	<p>Program Director, Program Coordinator and Curriculum Committee</p>	<p>Currently ongoing; review enrollment for 2018-2019 academic year in Spring 2019</p>
<p>5) Eliminate the breadth option and only offer the Diploma as a specialized sequence of courses that provide advance training.</p>	<p>Set up a subcommittee of the steering committee to evaluate the benefits and drawbacks of eliminating the breadth stream offering.</p>	<p>Program Director and Steering Committee</p>	<p>Fall 2018</p>
<p>6) Ensure that all courses include assessments methods that allow the evaluation of the program learning outcomes of Therapy Skills and Professional Problem Solving Skills (e.g., role-plays, supervised clinical experiences, review of services provided by students).</p>	<p>Develop criteria that can be used to aid a review of current course offerings to ensure there are adequate opportunities for students to demonstrate and be evaluated on the learning outcomes.</p> <p>Ask Faculty who tutor/instruct courses to</p>	<p>Program Director and the Program Director, Curriculum Committee, Faculty Instructors</p>	<p>Evaluation of course components to begin Spring 2018. Set deadline for faculty to complete by July 2018.</p>

	<p>evaluate the courses based on the developed criteria.</p> <p>Evaluation to be reviewed by Program Director and Curriculum committee.</p>		
<p>7) Given the possibility that students in the proposed MSc program may be able to receive credit for up to two courses from the Diploma program, it will also be important to ensure that assessment methods used in the Diploma program courses are consistent with expectations/requirements for the evaluation of students in MSc program courses.</p>	<p>If the MSc in Psychotherapy is approved:</p> <p>1) Determine if any existing CBS Diploma courses will be able to count towards course requirements in the MSc (should a CBS Diploma student apply and be accepted into the MSc).</p> <p>2) If CBS Diploma course is not equivalent to a similar course in the MSc, determine if the CBS Diploma course should be modified and approved.</p>	<p>Program Director and Curriculum Committee</p>	<p>Following approval of the MSc in Psychotherapy</p>
<p>8) (a) consider the level of administrative support required by the program</p>	<p>8a) The current CBS Diploma program has sufficient administrative support; however, if the MSc is approved additional administrative support will be required. Program has developed a hiring plan with the Chair of the Department of Psychiatry and Behavioural Neurosciences.</p>	<p>a) Program Director, Chair of the Department</p>	<p>a) Following approval of the MSc in Psychotherapy</p>
<p>8 (b) Clearly define the specific roles for instructors within the program and ensure that there is equity across roles that involve stipends.</p>	<p>b) The program will review the defined roles that have been developed for the different levels of faculty involved with course instruction (e.g., tutor, lecturer) and ensure that the remuneration scale is consistent with the roles</p>	<p>b) Program Director, Chair of the Department, Program Coordinator</p>	<p>b) Fall 2018</p>

	in equivalent programs at McMaster and in the Faculty of Health Science.		
9) Routinely track application numbers, retention rates, and average time to completion.	<p>The Office of the Institutional Research and Analysis is responsible body for tracking this information on students and this tracking is ongoing. The limited data available is due to the program realigning within the Department of Psychiatry and Behavioural Neurosciences 2015.</p> <p>Request data from IRA and review.</p>	Program Director, Program Coordinator, Steering Committee	Summer 2018 and then review annually
10) Implement a program evaluation to be completed by students following completion of the program to supplement the valuable information already collected from course and instructor evaluations.	<p>The Faculty of Health Science has developed an online survey for graduates to complete.</p> <p>The program will modify this survey to include specific questions that pertain to the CBS Diploma program.</p> <p>Ask all students exiting the program to complete the survey.</p>	Program Director, Program Coordinator and CBS Steering Committee	To be developed and given to students graduating in Winter 2018.
11) Review the membership of the Steering Committee and its two sub-committees. This will be necessary in order provide efficient governance of the program in a manner that reflects the nature of the Diploma program following the changes it will undergo in its organization and educational offerings.	In conjunction with items 1 - 5, once course offerings are determined there will be a review of the membership of the steering committee and the sub-committees to ensure they are representative of the changes made to the organization of the program.	Program Director, Steering Committee	Fall 2018

Faculty Response

The Dean noted their appreciation that the reviewers recognized the alignment of the program with university priorities and strengths, including the program's highly motivated and committed faculty, the emphasis on experiential-, problem- and evidence-based learning, and the program's engagement of the community to keep the program aligned to meeting the training needs of healthcare practitioners.

They reviewed the program response to the reviewers' report and fully agreed with their plans to address the suggested improvements, including the plans to modify the CBS Diploma courses, should the Masters of Psychotherapy Program be approved.

Quality Assurance Committee Recommendation

McMaster's Quality Assurance Committee (QAC) recommends that the Clinical Behavioural Sciences Graduate diploma program should follow the regular course of action with an 18-month progress report and a subsequent full external cyclical review to be conducted no later than 8 years after the start of the last review. At the time of the 18-month progress report, the program should comment on any developments with the new program proposal.

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

Civil Engineering – Graduate Programs

Date of Review: April 24th and 25th

In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate programs delivered by Civil Engineering. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Cyclical Program Review

The Civil Engineering program submitted a self-study to the School of Graduate Studies March 2017. The self-study presented the program descriptions and learning outcomes, an analytical assessment of these two programs, and program data including the data collected from a student survey along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the CVs for each full-time faculty member in the Department.

Two arm's length external reviewers and one internal reviewer were endorsed by the Dean of the Faculty and selected by the Vice-Provost and Dean of Graduate Studies. The review team reviewed the self-study documentation and then conducted a site visit to McMaster University on April 24th and 25th, 2017. The visit included interviews with the Provost and Vice-President (Academic); Vice-Provost and Dean of Graduate Studies, Dean of the Faculty, Chair of the department and meetings with groups of current students, faculty and support staff.

- **Strengths**

- The review team noted the enthusiasm exhibited by all members of the Department
- Faculty members seem to be keen on collaborating with each other – both in terms of research within a specific area as well as cross-disciplinary research
- Students emphasized the existence of community spirit and camaraderie among them

- **Areas for Enhancement or Improvement**
 - A limited number of enhancements/improvements were suggested by the review committee, which have been listed as recommendations in the table below.

Summary of the Reviewers’ Recommendations with the Department’s and Dean’s Responses

Recommendation	Proposed Follow-Up	Responsibility for Leading Follow-Up	Timeline for Addressing Recommendation
<p>ADL space and some of the equipment needs to be modernized – this is the area where a large CFI grant may be most feasible in the next few years.</p> <p>During the tour of the ADL, the review team noted that there is an equity issue in terms of the female users not having access to lockers and showers, which are located inside the men’s changing area. The female graduate students also pointed out this issue to the review team.</p>	<p>Chair to discuss with the Associate Dean – Research about large institutional funding opportunities including CFI to address equipment and space needs and equity issues.</p>	<p>Department Chair</p>	<p>Over next 12 months with continuing evaluation of progress.</p>
<p>Transportation theme (field) does not have a critical mass, although it is noted that two hires are underway. It is not yet clear what the emphasis for this theme will be and the department should consider carefully how to define or position it. This area was described to the</p>	<p>An updated departmental hiring plan, which will include the potential to add new faculty members to achieve critical mass in this vital area, will be prepared and discussed with the Dean.</p>	<p>Department Chair</p>	<p>Over next 12 months with continuing evaluation of progress.</p>

<p>review team as “smart mobility”, but how they position should be re-considered as new faculty are hired.</p>			
<p>The water and environmental theme is small but appears to be close to critical mass, with diverse (modeling to experimental) expertise. The lab is of good quality with a good size; and the research is sustainable and heading in the right direction. The curriculum needs to be revisited to reflect the expertise and research directions of the new hires.</p>	<p>1. An updated departmental hiring plan, which will include the potential to add a new faculty member to achieve critical mass in this area, will be prepared and discussed with the Dean.</p> <p>2. Water and environmental research group will meet to discuss current graduate course offered.</p>	<p>Department Chair / Water and environmental research group</p>	<p>Over next 12 months with continuing evaluation of progress</p>
<p>The geotechnical theme has not (yet) been renewed. This theme will not sustain or enhance the graduate program in the future without such renewal.</p>	<p>The geotechnical research group will meet to identify renewal opportunities and develop renewal strategy. An updated departmental hiring plan, which will include the potential to add new faculty members, will be prepared and discussed with the Dean.</p>	<p>Department Chair / Geotechnical research group</p>	<p>Over next 12 months with continuing evaluation of progress</p>
<p>There appears to be a general lack of professional development opportunities for graduate students, who seem to be quite keen for such opportunities to be made available to them. The Department</p>	<p>Students enrolled in the program after 2015 complete a career development workshop and report.</p> <p>All graduate students will be reminded of the resources and programs offered</p>	<p>Department Chair</p>	<p>Over next 12 months with continuing evaluation of progress</p>

<p>should consider requiring its graduate students to undergo some professional development with respect to oral and written communication and give them more opportunities to test their communication skills. The students found that to be missing when they prepared for and got feedback from their annual Department Seminar Day.</p>	<p>through graduate studies.</p> <p>An email instructing the Graduate Advisor to place additional emphasis on providing feedback on communication skills in the Grad Seminar Day.</p>		
<p>The 20-month MASc is almost never completed in the stipulated 20-month period. Most students took about 24 months to completion. The Department should consider either making this a fully funded 24-month program or reduce the thesis expectations such that students can regularly complete the program in 20 months.</p>	<p>Graduate Affairs committee will investigate various funding period alternatives and thesis expectation levels. These will be presented to the department in order to identify a suitable funding period/ thesis expectation level combination.</p>	<p>Graduate Affairs Committee/ Department Chair</p>	<p>Over next 12 months with continuing evaluation of progress</p>
<p>The review team found it difficult to understand the distinction between the MEng and the MASc programs, particularly given how different it is from the other MEng programs within the Faculty of Engineering and at other engineering graduate programs in Ontario. The</p>	<p>Currently investigating a joint professional MEng program with SEPT. Representative(s) from the department will be selected to work with their counterpart(s) in SEPT to determine the viability of a joint program.</p>	<p>Department representative(s)/ Department Chair</p>	<p>Over next 12 months with continuing evaluation of progress</p>

<p>Department should consider bringing its MEng program in line with other MEng programs in the province.</p>			
<p>The review team noted that the graduate office space is a challenge for the Department, which could be limiting for any plans for its future growth.</p>	<p>This issue will be discussed with the Dean’s Office, in the context of lab space, TA resources, technician resources and other constraints.</p>	<p>Department Chair</p>	<p>Over next 12 months with continuing evaluation of progress</p>
<p>The review team feels that the technical support for the Graduate Program is inadequate. Although the technicians appear to be of high quality, recent (and planned) growth in the undergraduate program has made research support for graduate students to be inadequate during periods of high undergraduate lab usage.</p>	<p>Ongoing discussions will continue on this issue with the Dean’s Office, in the context of lab space, TA resources, technician resources and other constraints.</p>		<p>Over next 12 months with continuing evaluation of progress</p>

Faculty Response:

The reviewers in their assessment of the Department of Civil Engineering found a growing department with an eye on innovation through several major interdisciplinary research initiatives, funded by recent successes in the CREATE and CFREF programs. The graduate experience has been greatly improved by re-work of key methods of evaluation, such as comprehensive exam procedures, though the reviewers have also noted that more can be done, especially by closely reviewing the pedagogical methods employed in course delivery. The reviewers noted that the department is in an excellent position to have a large impact on the broad civil engineering field, with evidence of well thought out strategic research directions. They were also critical of the department for not yet formulating how to change the curriculum to make these emerging areas of research accessible to their students.

The department’s reply to the report outlines plans on new hires to address research areas where deficiencies were identified, review the availability of their technical staff for graduate needs, and strike

several committees to extend funding for their MASc students and improve the curriculum of the MEng program.

The Dean's office will continue to work with the department appropriately to improve the program and assist in addressing the reviewers' concerns. The Faculty is working with the department to open several new positions that certainly strengthen the transport and water areas, and add new courses to the graduate curriculum. Furthermore, the Dean's office will continue to assist the program in handling its challenges with graduate office space, having already provided significant funds for space reorganization, e.g., to follow a hoteling model. Space is overall limited however, and we will look to the department for innovative solutions to manage the needs of its graduate students. Finally, the ADL building was highlighted as a particular concern and the Faculty and University have already released funds for its renovation. The department is being encouraged to be proactive in identifying external funding opportunities to transform the interior of the ADL into a state-of-the-art facility.

Quality Assurance Committee Recommendation

McMaster's Quality Assurance Committee (QAC) recommends that the Civil Engineering Graduate program should follow the regular course of action with an 18-month progress report and a subsequent full external cyclical review to be conducted no later than 8 years after the start of the last review. At the time of the 18-month progress report, the department should comment on any pedagogical developments that have occurred since the cyclical review site visit.

FINAL ASSESSMENT REPORT
Institutional Quality Assurance Program (IQAP) Review
Electrical and Computer Engineering
At McMaster University

Date of Review: March 12 and 13, 2013

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate programs delivered by the **Department of Electrical and Computer Engineering**. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Summary of the Cyclical Program Review of the Department of Electrical and Computer Engineering

The Department of Electrical and Computer Engineering submitted a self-study for their graduate programs to School of Graduate Studies (SGS) February 2013. The self-study presented the program descriptions and learning outcomes, an analytical assessment of these graduate programs offered by the department, along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the course outlines for all courses in the program and the CVs for each full-time faculty member in the Department.

Two arm's-length external reviewers from Nova Scotia and Manitoba as well as one internal reviewer examined the materials and completed a site visit in March 2013. The visit included interviews with the Provost and Vice-President (Academic); Dean of the Faculty of Engineering; Dean of School of Graduate Studies; Chair of the Department of Engineering Physics, and meetings with groups of current students, full-time and part-time faculty and support staff.

In their report the review team found the graduate programs in the Department of Electrical and Computer Engineering, leading to the MEng, MASc, and PhD degrees, to be generally strong as compared to similar programs across Canada. They seem to be well structured and well run. The department has about 32 full-time faculty members whose teaching and research are directly related to the graduate program under review. Many of the faculty members are nationally and internationally recognized for their research work and have been awarded research chairs as well as fellowships of leading professional societies.

The Chair of the Department of Electrical and Computer Engineering and the Dean of the Faculty of Engineering submitted responses to the Reviewer's Report (October 2013). Specific recommendations were discussed and clarifications/corrections were presented. Follow-up actions were included. McMaster's Quality Assurance Committee (QAC) reviewed the documentation associated with the review and determined the program be allowed to continue on the normal review cycle and that at the 18 month report particular attention should be paid to the health of the M.Eng. program.

- **Strengths**
 - **Graduate Student Morale**
 - **Research Output**
 - **Quality of Professors**
- **Weaknesses**
 - **Relationships with Industry**
 - **IT support**
 - **Common space for Graduate Students**

Summary of the Reviewers' Recommendations with the Department's and Dean's Responses

Recommendations

1. Hiring Priorities

The department should focus on research areas of strength, rather than attempting to be comprehensive.

Department response: At the behest of the new Dean of Engineering, the Department is embarking on a refinement of its recent self-assessments. Based on current discussions, it appears likely that the Department will specify four areas in which it would seek to expand its faculty complement over the next five years.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

2. CREATE

The department should consider the development of resources for offering unique educational programs in their research areas of strength. NSERC's CREATE program is one potential source of such resources.

Department response: The Department concurs with the reviewers suggestion and identified the development of group research proposal as a shared responsibility.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

3. Industrial Interaction

The department would benefit from greater industrial interaction on behalf of both faculty members and graduate students.

Department Response: The Department concurs with this suggestion and believes with the combination of input from the external advisory board (to be developed at the request of Dean Puri), the further development of internship opportunities, and direct collaboration with industry significantly enrich the graduate programs, provide broader career options to their graduands, and enhance the stature of the Department. They are activities that they plan to enhance over the next five years.

Dean's Response: In alignment with the reviewers' comments about increased industry involvement, the Dean has requested that all Departments in the Faculty have in place an external advisory board by the end of 2013. One of the intended effects of this board would be greater awareness and greater interactions with local and broader industry.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

4. Colloquium

The department should consider hosting a regular colloquium or specialized seminar series. Students have indicated that seminars and presentations by industrial partners on topics such as “life after Ph.D.” would be very beneficial and helpful for most of the students who would pursue careers in industry.

Department response: The Department is well aware that insightful talks from distinguished researchers have the potential to enrich the intellectual life of the Department as a whole, and that it has been quite an oversight for us not to have such a formal seminar series. This is something that the Department has been beginning to address, in a somewhat ad-hoc way, by trying to increase the number of Distinguished Lecturers from IEEE Societies that it brings to McMaster. The Department also sees value in seminars by research collaborators in industry, and in seminars in the “general interest” and “life after Ph.D.” style. In particular, they view the significant number of adjunct professors in the Department as being a group who would be in a good position to offer lectures in these styles. Emeritus Professors are another group.

Dean’s response: As noted, the development of Colloquium series with both industry and distinguished academic speakers has already enriched the graduate student experience in the Department.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

5. Modest number of technical staff and shared resources

Due to the small number of staff there can be delays with respect to resolving IT issues at peak times. The department should also develop strategies for sharing equipment and software between research groups.

Department response: The Department has recently added a student to its IT area on a part-time basis. It is hoped that the student will be able to assist with some smaller scale tasks and by doing so, free up time for some of their full-time staff to tackle larger issues. One of these larger issues was identified in the report: the development of a strategy to fund the upgrading of the Department’s computational cluster.

With respect to equipment sharing, the Department notes that in the past, equipment and software has been shared between research groups on an ad-hoc basis, without a formal framework being established by the department leadership. Upon reflection, they think that one reason why this point arose might have been the fact that graduate students and their supervisors are not always aware of the equipment and software that is available to share. One step that the Department could take to rectify this would be to create a database of equipment and software that faculty members are willing to share, or rent, and to make this database available to grad students. That way, students and their supervisors can initiate informal sharing arrangements without the need for departmental intervention.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

6. Common Space

The reviewers noted that graduate students would like to have a common space for social gathering.

Department Response: The Department sees great value in having a common space, and would

like to be able to provide it. They note the difficulties of finding an appropriate space but have reserved one of our seminar rooms, ITB A311, for two hours in the middle of the day so that it can serve as the Department's lunch room. They will work with the students in their programs to evaluate the suitability of this room, and will adjust plans accordingly. To further foster relationships between graduate students who work in different areas, between students who grew up in different cultures, and between graduate students and the Department as a whole, the Department is exploring whether our graduate students would be interested in forming a club with a leadership group that would help to organize a variety of technical and social events.

Dean's Response: The need for communal space both within the Department and in the Faculty as a whole has been raised by the graduate students in other discussions, and the Dean is currently working with the Associate Dean (Graduate Studies) to overcome this problem.

Responsibility for Leading Follow Up: Department/Department Chair/Faculty Dean

Timeline for Addressing Recommendation: Update at 18 month follow-up report

7. Courses

The reviewers noted that graduate students would like to be consulted on the graduate courses to be offered.

Department Response: While the range of courses that can be taught is largely dependent on the interests and expertise of the professors, the Department would be happy to entertain suggestions from the student body or from individual students.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

8. Poster Days

The students indicated that the "Poster Days" were not considered sufficiently seriously by faculty, and therefore by the students themselves.

Department Response: The Department is well aware that our Poster Day events are not achieving their goals of developing our students' communication and presentation skills. Furthermore, these events are not stimulating the exchange of ideas between students to the extent that they had hoped. Inviting some of our adjunct members to our graduate student Poster Days, and perhaps having them judge the quality of the presentations (even if the material being presented is beyond their area of expertise) might help to invigorate our graduate Poster Days.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

9. Ph.D. Comprehensive Exam

The PhD comprehensive exam is very unique and innovative, involving an oral examination on a topic somewhat removed from a student's knowledge base, and giving a fixed period over which to prepare.

There was however some confusion on the part of students on what would be required of them for the exam. It is a suggestion that the process undergo some fine tuning in terms of planning, scheduling, and making sure that students are well aware of what is required for them to pass.

Department Response: In response to the issues raised by the reviewers the Department has discussed options for modifying their procedures and process of communicating our expectations to the students. A variety of proposals for modifying the procedures have been suggested. In the end, they decided that for now they would take the small step of providing the questions to the students three weeks before the exam rather than the previous two. They are also improving the way in which we communicate the purpose of the exam to the students and the way in which they outline the expectations regarding the level of sophistication of the students' presentations and the responses to the questions that they are asked in the exam.

10. M.Eng. Program

There have been recent surges in the domestic student enrollment in the MEng program. This has secured additional financial resources from the provincial government with a resulting benefit in the operations of the graduate programs as a whole; but, it has also caused some confusion amongst students and faculty regarding the objectives of the MEng program and some concern about the quality of the students enrolling in the MEng program. Articulating more clearly the role of this program would be helpful. As well, close monitoring is suggested to ensure that the increased enrollment does not negatively impact on the overall quality of the graduate programs.

Department Response: In several places in their report, the reviewers highlight contrasting opinions among faculty members, and even among students, regarding our M.Eng. program. These contrasts are not a surprise to the department leadership because the opinions were widely aired when the M.Eng. program was initially proposed. The contrasting opinions are not destructive in any way. They simply represent different perspectives on how the Department should best allocate its resources. Furthermore, when contrasting opinions have been stated, they have always been stated in a collegial manner.

One reason why the negative opinions of the M.Eng. program may have resurfaced is the uncertainty regarding the funding model. The incentives that encouraged the Department to invest its own resources in expanding the M.Eng. program are no longer in place. In the short term, the Department has negotiated some alternative incentives, but, by necessity, these were not as valuable to the Department as the initial incentives. The broad understanding of these issues has led to more informed debate, but in the absence of a stable funding model, support within the Department for the program is not universal.

Dean's Response: While enrollment remains high, the perception that the students in the program are less able intellectually than their counterparts and a lack of understanding on the part of faculty members of the relational for this program must be addressed. In particular, the financial health of the program, given changes in the funding model, have been an area of significant concern. The Faculty is in agreement with the view of the Department that these students enrich the program overall and that the MEng program plays a key role in the education of engineering graduates. The Faculty will continue to work with the Department to ensure that the health of the program is enhanced in the future and that a more stable funding structure can be developed.

Responsibility for Leading Follow Up: Department/Department Chair/Faculty Dean

Timeline for Addressing Recommendation: Update at 18 month follow-up report

Quality Assurance Committee Recommendation

McMaster's Quality Assurance Committee (QAC) reviewed the documentation associated with the review and determined the program be allowed to continue on the normal review cycle and that at the 18 month report particular attention should be paid to the health of the M.Eng. program.

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

Department of English and Cultural Studies

Date of Review: April 29-30, 2013

Review Team Members: John C. Ball, Department of English, University of New Brunswick

Heather Murray, Department of English, University of Toronto

Michele George, Department of Classics, McMaster University

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the undergraduate programs delivered by the **Department of English and Cultural Studies**. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Cyclical Program Review of the Department of English and Cultural Studies Undergraduate and Graduate Programs

In accordance with the Institutional Quality Assurance Process (IQAP), the Department of English and Cultural Studies submitted a self-study in March 2013 to the Associate Vice President Academic and Dean of Graduate Studies to initiate the cyclical program review of its undergraduate and graduate programs. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study contained all course outlines associated with the program and the CVs for each full-time member in the Department.

Two arm's-length external reviewers (Dr. John C. Ball, Professor and Associate Dean of Arts English, University of New Brunswick and Dr. Heather Murray, Professor, University of Toronto) and one internal reviewer (Dr. Michele George, Professor of Classics), selected from a set of proposed reviewers,

examined the materials and completed a site visit on April 29 – 30, 2013. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President (Academic); Associate Vice-President and Dean of Graduate Studies; Dean of Humanities, Associate Dean (Graduate Studies and Research), Faculty of Humanities, and the Chair of English and Cultural Studies. The reviewers met with the English and Cultural Studies Committee, Undergraduate Curriculum Committee, and the Teaching and Learning Committee as well as meeting with faculty members, departmental administrative staff and current undergraduate and graduate students.

The Chair of the Department of English and Cultural Studies and the Dean of the Faculty of Humanities submitted responses to the Reviewers' Report (July/August 2013). Specific recommendations were discussed and clarifications and corrections were presented. Follow-up actions and timelines were included. McMaster's Quality Assurance Committee (QAC) reviewed the above documentation and the committee agreed with the reviewers that faculty complement planning for the future is essential for the continued success of the existing graduate and undergraduate programs and that, unless additional hirings are made, the launching of new programs is inadvisable. At the same time, QAC shared the reviewers' sense that this remains a "high-achieving" department with "a satisfied and quite successful student body." The QAC recommend that there is no further action required until the program comes up for review during the regular cycle. The Final Assessment Report was prepared by the QAC to be submitted to Undergraduate Council and Graduate Council and Senate (December 2014).

In their report (May 2013), the Review Team provided feedback that describes how the Department of English and Cultural Studies meets the Institutional Quality Assurance Process (IQAP) evaluation criteria and are consistent with the University's mission and academic priorities. The Review Team was very impressed with the clear and thorough documentation provided, as well as the thoughtful engagement of departmental administrators, faculty, students, and staff. The Department has undertaken significant planning exercises in the 18 months between the release of Forward with Integrity (FWI) and the submission of its review materials, and has proposed (and in some cases already begun implementing) a number of promising changes to the undergraduate curriculum and structures. In some significant areas (interdisciplinarity, internationalization, and community engagement, in particular) the Department already had anticipated the curricular directions FWI is designed to implement. The Review Team noted that in articulated learning outcomes for its undergraduate programs and mapping the outcomes onto the entire undergraduate curriculum, the department has gained an extraordinarily detailed (and enviable) understanding of what it assumes, teaches, and evaluates in each course. The Review Team's overall impression was of a collegial, high-achieving department that takes its instructional mission, both at the undergraduate and graduate level, very seriously, and that functions as an effective community in liaison with its staff and graduate students to offer strong undergraduate programs.

The Dean of the Faculty of Humanities, in consultation with the Department Chair shall be responsible for monitoring the Implementation Plan. The details of the progress made will be presented in the 18-month Follow Up Report and filed in the School of Graduate Studies.

The Review Team noted some strengths and weaknesses of the program below:

Strengths

- The Department's pedagogies and curricular orientations to the study of English literature and of culture and critical theory already positioned it (and several of its members in particular) well along the road to a practice of interdisciplinarity and internationalization as understood in FwI, and these practices can be expected to continue and to deepen.
- Community engagement, another FwI priority, is woven into many faculty members' teaching, research, and outreach activities, and self-directed learning is supported by the independent research students are trained to do.
- The curriculum in both streams is progressive, visionary, and in tune with leading-edge research in both disciplines, the co-existence of the two streams in a medium-sized department that also supports three graduate programs has put some pressure on both of the undergraduate programs.
- The Department is populated with effective, innovative, and committed teachers who use a variety of pedagogical approaches suggest that the Department is reinforcing its pedagogical goals with appropriate teaching and assessment modes and also striving to accommodate students with different learning styles and/or skill sets.
- Student satisfaction with courses and quality of supervisory and supervisory committee support is very high in the graduate programs
- Impressive time to completion rates for MA and PhD students

Weaknesses

- Experiential learning is an area that has not been fully developed in the Department
- There appears to be unresolved tension between considering English and Cultural Studies and Critical Theory (CSCT) as separate streams and considering them as integrated
- Cultural Studies courses tend to be clustered at the contemporary end of the spectrum, with some notable exceptions (e.g. strong courses in 18th Century literatures and cultures)
- The continued pressure to grow graduate programs could compromise undergraduate education (and the priority given to it by FwI) further. Undergraduate students commented frequently on the non-availability of courses of interest and/or the concurrent timetabling of courses they needed or hoped to take.

Summary of the Reviewers' Recommendations with the Department's and Dean's Responses

Recommendations for Undergraduate Programs

- 1. The Review Team recommended that consideration be given to loosening the BA English coverage requirements, to more firmly structuring the CSCT curriculum, and to developing new non-cross listed CSCT courses.**

Response: The Department outlined that over the 2013-14 academic year, the Curriculum Committee will work to rationalize and balance the programs. The Department recognized that the English offerings could be reduced and coverage requirements could be loosened. The Department noted that mounting new non-cross-listed CSCT courses could be a challenge due to the size of the program; however savings made through restructuring the English BA offerings may help to support CSCT, but only if the Faculty would permit the offering of some smaller classes.

The Dean highlighted that the Faculty is asking all Departments to review program requirements to ensure that they provide students with a quality education while not making unnecessary demands on the teaching and supervisory capacity of the Department.

Responsibility for Following Up: Department Chair and Curriculum Committee

Timeline: Follow up at 18-month report

2. The Review Team recommended reviving the proposal for the Creative Writing and Community Engagement specialization.

Response: The Department advised that it would work with the new Acting Dean in 2013-14 to establish this specialization. The Department will work on ways to support the new specialization through savings in its English undergraduate offerings and by seeking other sources of funding. The Acting Dean will work with members of the Department to make the model sustainable and he noted that he sees the potential for the proposal to be expanded beyond the English Department so as to engage and benefit students in other programs.

Responsibility for Following Up: Department Chair with Acting Dean

Timeline: Follow up at 18-month report

3. The Review Team recommended that further consideration be given to development of experiential learning opportunities (e.g. the creative writing specialization, internships, cross-listings with courses offering practicum components).

Response: The Department highlighted that the CWCE specialization has internship and practicum components. The Department also noted that it will work to develop a 6-unit, level 3 or 4 Experiential Education Course, building on ties with the Hamilton Public Library and the Hamilton/Wentworth District School Board. The Department and Acting Dean both advised that the Department will work in tandem on this with the new Humanities Target Learning and Experiential Education Centre, which is mandated to develop these opportunities across the Faculty.

Responsibility for Following Up: Department Chair with the Humanities Target Learning and Experiential Education Centre

Timeline: Follow up at 18-month report

4. The Review Team recommended that efforts be made to plan and make known its course offerings (however provisionally) on a two-year cycle, and to avoid timetabling conflicts.

Response: The Department advised that it would be in a better position to commit, in the Timetable and Calendar to a provisional two-year cycling of undergraduate offerings following the reduction and restructuring of the English BA offerings.

The Dean noted that the Faculty will work with the Department to help establish the two-year cycling course offerings and to see whether they can identify key timetabling conflicts that may be of particular concern to students.

Responsibility for Following Up: Department Chair and Office of the Dean

Timeline: Follow up at 18-month report

Recommendations for Graduate Programs

- 1. The Review Team recommended that a “theory and methods of cultural studies” half course be developed for MA and PhD students entering from more traditional English programs.**

Response: The Department outlined that the Graduate Studies Committee, the CSCT Executive, and Graduate Caucus will work together to survey new graduate students to determine the demand for such a course, to be offered in Term 1 each year. If there is sufficient interest to fill a class, we will design and pilot such a course for 2014-15.

Responsibility for Following Up: Department in collaboration with Graduate Studies Committee, CSCT Executive and Graduate Caucus

Timeline: Follow up at 18-month report

- 2. The Review Team recommended that a credit/non-credit “professionalization” half-course be developed for third year doctoral students.**

Response: The Department advised that it would survey the graduate students about repackaging the professionalization seminars into a pass/fail doctoral 3-unit course.

Responsibility for Following Up: Department Chair

Timeline: Follow up at 18-month report

- 3. The Review Team recommended that (subject to staffing), the historical depth of the cultural studies courses be extended.**

Response: The Department responded that that the Graduate Chair would work with graduate instructors to enhance the historical depth of the course offerings. The Department noted that some courses on medieval and early modern culture take on issues of gender, sexuality and class in light of contemporary cultural theory. The Acting Dean suggested that perhaps more could be done to alert students in the Cultural Studies and Critical Theory program about the number of courses dealing with medieval and early modern culture.

Responsibility for Following Up: Graduate Chair

Timeline: Follow up at 18-month report

- 4. The Review Team recommended that efforts be made to facilitate the cross-appointment of faculty members from related units (e.g. Theatre and Film Studies, Communication Studies and Multimedia, Music, and Art History).**

Response: The Department advised that it will press annually for the loan of faculty from elsewhere, many of whom have expressed strong interest in teaching for the program.

The Acting Dean noted that it is very interested in facilitating the interaction of programs that can contribute to one another's undergraduate and graduate teaching. The Acting Dean suggested that the Faculty would do what it can to support faculty members design courses that can meet the requirements of students in several programs.

Responsibility for Following Up: Office of the Dean and Department Chair

Timeline: Follow Up at 18-month Report

Recommendations for Undergraduate and Graduate Programs

1. The Review Team recommended that serious attention be given to complement planning for DEC, given impending retirements, and to replacements in core areas (e.g. Early Modern and African diasporic literatures/cultures).

Response: The Department noted that it has prepared a list of hiring priorities as part of its five-year plan of 2012. The Department is keen to work with the new Acting Dean on complement planning. The Acting Dean suggested that the Department should be thinking about complement planning at the same time as it considers making changes to the structure of its undergraduate programs.

2. **The Review Team recommended that further efforts be made to create teaching fellowships for senior PhD students.**

Response: The Department highlighted that it remains active in pressing for Teaching Fellowships for senior PhD candidates.

The Acting Dean noted that the University was in the process of negotiating an agreement with CUPE Unit 2 (representing sessional instructors) and that he hopes that the contract will better accommodate the hiring of current PhD students as instructors. The Faculty will continue to work with Departments to find ways to provide students with this crucial professional development experience.

3. **The Review Team recommended that a senior Teaching Assistant be appointed annually to train and advise newer Teaching Assistants.**

Response: The Department advised that beginning in September 2013, it will dedicate a .5 senior teaching assistant annually to lead Term 1 TA training and to serve as a resource and support person to all new TAs.

The Acting Dean noted that the Faculty will explore this and other proposals to improve the uses of tutorials and teaching assistants.

Responsibility for Following Up: Department Chair

Timeline: Follow Up at 18-month Report

4. **The Review Team recommended that the Department retain control of its communal spaces (e.g. seminar rooms and lounge).**

Response: The Department advised that it saw no immediate danger of losing its valuable communal work and teaching spaces.

FINAL ASSESSMENT REPORT
Institutional Quality Assurance Program (IQAP) Review
Engineering Physics

Date of Review: November 26th and 27th 2013

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate programs delivered by the **Engineering Physics**. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Review

In accordance with the Institutional Quality Assurance Process (IQAP), the Department of Engineering Physics submitted a self-study in October 2013 to the School of Graduate Studies to initiate the cyclical program review of its Diploma, M.Eng, M.A.Sc. and Ph.D. programs. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study included a summary of the Ph.D. exit survey, the results of a confidential online survey circulated to all graduate students and the CVs for each full-time member in the Department.

Two arm's-length external reviewers from Saskatchewan and Quebec and one arm's length internal reviewer examined the materials and completed a site visit November 26 – 27, 2013. The visit included interviews with the Provost and Vice-President (Academic); Dean of the Faculty of Engineering; Dean of School of Graduate Studies; Chair of the Department of Engineering Physics, and meetings with groups of current students, full-time and part-time faculty and support staff. The review team also had the opportunity to tour the lab and facilities.

The Review Team wrote that Engineering Physics Department of McMaster is a good mix of well accomplished senior faculty of high repute and ambitious young faculty. The department has adapted its major research directions to the evolving needs of society and changes in the industry landscape by updating and enhancing its research facilities with multi-million dollars grants from CFI, NSERC and other sources for material synthesis and characterizations as well as targeted, dynamic hires. This bodes well for the future of the diversity and high quality of the graduate programs at both Masters and Ph.D. levels, which currently achieve the goals of providing a high quality, timely education. The faculty and staff have very good working relationships and the atmosphere in the department is very collegial and of mutual respect. The review team noted that graduate students raised several important issues for consideration and provided a number of suggestions and recommendations for consideration, particularly where graduate student experience is concerned.

The Chair of the Department of Engineering Physics and the Dean of the Faculty of Engineering submitted responses to the Reviewer's Report (February/March 2013). Specific recommendations were discussed

and clarifications/corrections were presented. Follow-up actions were included. McMaster's Quality Assurance Committee (QAC) reviewed the documentation associated with the review and determined that the external reviewer's report as well as the program response was positive and that no further action was required until the program comes up for review during the regular cycle.

- **Strengths**
 - **Major Research Directions**
 - **Composition of Faculty**
 - **Quality of Supervision**
- **Weaknesses**
 - **Space**
 - **Available Courses**
 - **Graduate Student Financial Support**

Summary of the Reviewers' Recommendations with the Department's and Dean's Responses

Recommendations

1. Space

The department should take steps to resolve the issue of graduate student spaces as it is currently inadequate and spread over a few buildings, leading many students to work from home and, in turn, having a negative effect of distancing them from their peers and department.

Department Response: To aid in addressing this issue, the department is first gathering more detailed information by surveying the graduate students on their opinions of the existing office space, how it is used, and what they consider important in terms of the quality of space. This information will be used to form a strategy for dealing with the space deficit. The department is considering a conversion of its existing student office space in the ETB building into a shared facility where some students might share desks in a common area.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

2. Graduate Student Financial Support

The top priority, also identified by the department, is to review the minimum stipend for domestic and Visa students. This is a major concern for many students, a possible important reason for the 15% drop out rate and a challenge when attracting the best students who have many options of excellent, competing similar programs in Ontario.

Department Response:

The department has done a comparison of graduate student pay among all engineering departments, including the supervisor paid portion (Table 2). Visa salaries are higher in order to compensate the higher tuition for these students. We believe the department's rates are comparable to most other departments. Nevertheless, the department is currently reviewing these rates and considering an increase in the student pay, and possible relief of the supervisor paid portion for scholarship recipients.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

3. TA Assignments

The department might consider allowing students some input to the courses they will TA. Generally, some graduate students expressed the wish to have access to more training in how to be a TA – teaching, pedagogy etc.

Department Response:

The Engineering Faculty is responsible for allocating the number of TA positions available to each department. The current TA allocation to Engineering Physics is insufficient to provide every graduate student with a full TA (130 hrs per term). The department has responded to this situation by mandatory supervisor-paid TA buyouts in the final term of every graduate student, in addition to a half TA clawback from those students who are awarded scholarships (NSERC, OGS, etc). In addition, domestic students are typically allocated 260 TA hours per year (130 hours per term), while Visa students are typically only allocated 130 hours per year. This inequity in TA assignments is partly responsible for the dissatisfaction among graduate students.

To address this issue, the department is considering revising its TA allocation by assigning all graduate students a single TA (130 hrs each) regardless of status. The department will hire undergraduate students into TA positions to provide some additional support for its programs.

The department has formalized the allocation of TA positions by issuing a form to course instructors in July, prior to the start of the academic term. The form is used by instructors to specify the number of TA positions required and any special skill sets required. Graduate students also receive a form in June where they can request their desired courses for the TA in order of preference.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

4. Two-part Comprehensive Exam

For students passing directly from a Masters to a PhD [the part 2 comprehensive exam] can, however, lead to some frustration, as they will spend 2 terms essentially preparing for the Master Thesis and then the comprehensive exam. As a consequence some graduate students feel that they spend too much time preparing for exams instead of doing research ... The 2nd part of the Comprehensive thus seems redundant to many graduate students; they question the value and purpose of 2nd exam. Several students pointed out that they essentially spend many months learning for the prelim, preparing for the 2nd Comprehensive and then a few months later for a supervisory meeting. This cuts into research time and thus time to completion.

Department Response:

The department has performed a comparison of comprehensive exam policy among the engineering departments as well as the Physics and Astronomy Department. Chemical, Mechanical, Electrical, and Physics and Astronomy have a requirement for a single comprehensive exam, while Civil, Computing and Software, Materials, and Engineering Physics have two comprehensive exams.

In Engineering Physics, Part 1 of the comprehensive exam tests the student's undergraduate knowledge, while part 2 tests the student's background knowledge for his/her specific thesis. Thus, the two exams

serve a very different and important function. To clarify the role of these exams, the department will provide an information session at the beginning of each academic term to inform students of the exam purpose, format of the exam, and provide a Q&A.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

5. Graduate Course Offerings

The department should be encouraged to expand on the collaborative teaching with the physics and astrophysics department to other departments on campus and elsewhere as well as investigate new developments in teaching. The ongoing initiatives for collaborative graduate level programming, allowing the pooling of resources with the department of Physics and Astronomy are highly encouraged. Finally, courses being offered by other departments that are suitable Engineering Physics graduate courses should be listed to give students a clearer message of what is available.

Department Response:

The department is exploring methods of becoming more efficient in its undergraduate teaching, to free more resources for graduate course offerings. The reviewer's suggestion to explore cross-listing of Engineering Physics and Physics courses is already being examined by the department. The department already lists course offerings from other departments in the graduate calendar; however, these courses were not listed in the department website. This oversight has been corrected.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

6. M.Eng Program

After careful analysis the department is considering canceling this program, although it may be worthwhile to figure out if alternate modes of deliveries or different program requirements would make it more attractive for potential candidates...The department may want to reflect how to position and modify this program and investigate potential market needs not covered by other similar programs in the region before deleting this program.

Department Response:

The department is discussing how it might re-align the M.Eng. program to be more attractive to both students and faculty. We believe a course-based Master's option (in place of the current project-based M.Eng.) might be more attractive to students and would alleviate the challenges in finding suitable industrial projects. Feedback from graduate students on this issue will be sought.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

7. Nuclear Technology Diploma

The University should support the morphing of the current Nuclear Technology Diploma to a program delivered by UNENE. Delivering this program off-site will allow many more students to take these courses; they would still receive a McMaster degree.

Department Response:

The department has been working with UNENE and University administration to transfer ownership of the Nuclear Technology Diploma from Engineering Physics to UNENE. We expect to have this completed by January, 2015.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

8. Student Engagement

The students do not seem to feel that they belong to the department, nor that they have a voice in the way things are run in the department. The creation of a specific Engineering Physics Graduate Student Association would build cohesion among the graduate students.

Department Response:

The department has formed a Graduate Student Advisory Council with a current membership of ~10 graduate students (we expect membership to grow over time). The Council is already planning a department colloquium, a summer workshop, as well as providing input into department administration, including all of the issues raised in this report.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

9. Time-to-completion

Reviewers' Comments:

The students are expected to complete their degree in 6 terms (2 years), after which they lose their office and funding but for the supervisor's RA support. Given these realities the department might want to consider if this policy is optimal from a student, humane and (both student and university) fiscal point of view.

Department Response:

Most of the delays in the time-to-completion are associated with procrastination in the thesis writing. In response to this problem, the department is planning an annual thesis writing workshop to provide advice to graduate students on the planning and writing of a thesis. The course will be offered in April/May of each year, with a first offering in 2014, at the time when students should be preparing to write their thesis. The department will continue to monitor the time-to-completion to assess the effectiveness of this approach.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

10. Graduate Student Recruitment

It was noted that the department does not seem to have a coherent graduate student recruitment Strategy. It is surprising that the direct entry option to the Ph.D. program is not being used often for the best students.

Department Response:

Although the normal route to the Ph.D. is through completion or transfer from the Master's program, the department does not have any formal policy forbidding entry to the Ph.D. directly from the Bachelor's. To improve recruitment into the Ph.D. and other programs, the department will form a recruitment committee with faculty and graduate student representation. As part of its recruitment activities, the department will make a greater effort to invite graduate program applicants to visit the department in order to attract these applicants to McMaster.

Responsibility for Leading Follow Up: Department/Department Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

Dean's Response to Reviewers Recommendations and Program Response:

Dean Puri noted that the issue of graduate sitting space is a concern for several departments in the Faculty and will take time and resources to solve. The department's benchmarking reveals that the financial support for graduate students is commensurate with the rest of the Faculty. The Dean noted that overall the department's response to the issues raised was constructive and practical and that he was pleased that the department has been proactive and initiated strategies for improvements in several cases.

Quality Assurance Committee Recommendation

McMaster's Quality Assurance Committee (QAC) reviewed the documentation associated with the review and determined the program be allowed to continue on the normal review cycle and that a follow up report will be due in 18 months.

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

Materials Science and Engineering – Graduate Programs

Date of Review: February 6th and 7th 2018

In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate programs delivered by Materials Science and Engineering. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Review

In accordance with the Institutional Quality Assurance Process (IQAP), the Materials Science and Engineering program submitted a self-study in December 2017 to the Vice-Provost and Dean of Graduate Studies to initiate the cyclical program review of its graduate programs. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study contained all course outlines associated with the program and the CVs for each full-time member in the department.

Two arm's length external reviewers and one internal reviewer were endorsed by the Dean, Faculty of Engineering and selected by the Vice-Provost and Dean of Graduate Studies. The review team reviewed the self-study documentation and then conducted a site visit to McMaster University on March 30 - 31, 2017. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President, Faculty, Associate Vice-President and Dean of Graduate Studies, Associate Dean, Grad Studies and Research, Chair of the department and meetings with groups of current students, full-time faculty and support staff.

The Chair of the department and the Dean of the Faculty of Engineering submitted responses to the Reviewers' Report (April 2018). Specific recommendations were discussed and clarifications and corrections were presented. Follow-up actions and timelines were included.

- **Strengths**

The Reviewers have highlighted the following as clear strengths of the Department's Graduate Program: (i) reputation for research excellence and achievement, (ii) world class resources housed within the Department's research centres (CCEM, SRC and CAMC) and (iii) quality of the student experience. The global reputation for research excellence and achievement is based on two key aspects. First, is the Department's record of research excellence awards, as contributed by both graduate students and faculty members. Second, is the Department's healthy and sustainable funding lever per full-time equivalent, which is viewed as being above average for a Materials Science and Engineering program in Canada. The world class resources are based on the state-of-the-art research instrument and tools that have been acquired over the past decade and half as part of successful capital grants applications along with the associated modernized space that is available for graduate research. The quality of the student experience is based on the generous level of financial support that is provided along with the incorporation of graduate students into the Department's administrative functions.

An emerging strength recognized by the Reviewers is the set of recent faculty hires at both the assistant and associate levels, as these hires have both expanded the breadth of research offerings in the department and increased the gender diversity of the faculty. The biomaterials hires in particular were called as having significant potential for expansion into biomedical research by coupling with the School of Medicine, which is a globally recognized area of strength for the University.

- **Areas for Enhancement or Improvement**

The Reviewers have highlighted the following relevant areas for enhancement: (i) future hires, (ii) career planning initiatives and (iii) additional course offerings. A future hire in the field of computational materials science would strengthen this under represented areas at the Department and serve to enhance the breadth and depth of research expertise available. Expanding the career planning initiative to include follow up activities and incorporate industry involvements will serve to enhance the quality of the quality of the student experience. Leveraging courses offered at other universities via video link will serve to provide increased coursework options such that the associated program learning objectives can be realized in more student-specific manner.

The Reviewers have highlighted the following areas for improvement: (i) website, (ii) removal of the Materials Science degree designation and (iii) modification of the graduate seminar course. An improved website will serve as an effective tool to better promote the Department's programs and research opportunities that are possible taking advantage of world class faculty and research infrastructure whilst enjoying a high-quality student experience. A simplified offering of two, rather than four, core degree programs (one at the Master's level and the other at the PhD level) will remove a "quirk" that is not typical of Materials Science and Engineering programs worldwide and, thus avoid confusion for potential graduate students. A modified graduate seminar course will ensure that the both the "speaker" (feedback assessment) and "audience" (active learning) roles are indeed aligned with the program learning objectives, as indicated on the Department's curriculum map.

Summary of the Reviewers' Recommendations with the Department's and Dean's Responses

Recommendation	Proposed Follow-Up	Responsibility for Leading Follow-Up	Timeline for Addressing Recommendation
Update website and make it more exciting for potential graduate students	-Work with Faculty web masters to share resources to decide on layout and acquire content for updated website	Department Leadership (Chair, Associate Chair - Undergraduate and Associate Chair - Graduate)	Summer Term 2018
Remove Materials Science Degree (at both Master's and PhD level)	-Held Department meeting in March to discuss this specific recommendation -Consensus to offer one degree each at level (Master's and PhD): Materials Science and Engineering	Department Leadership (Chair and Associate Chair - Graduate)	-Prepare and submit necessary paper work to GCPC during 2018-2019 academic year
Modify graduate seminar course	-Strike a Department committee to examine the recommendation in detail and then propose a solution strategy	Associate Chair – Graduate to chair the Department committee	<ul style="list-style-type: none"> - Committee meetings to be held during Summer and Fall Terms - Decision early in Winter Term - Prepare and submit necessary paper work to GCPC during before deadline for 2019-2020 academic year
Future hire in computation materials	Already identified as priority area in Department's strategic hiring plan	Department Chair	<ul style="list-style-type: none"> - Discussions are ongoing with local industry to develop and industrial research chair in this area. - Our hiring plan also aligns with the Faculty's <i>Smart Systems</i> priority area. We will submitting a proposal for hiring in the area of AI.
Expand career planning initiatives	-The Faculty of Engineering is already in the process of releasing online career planning modules.	Associate Chair - Graduate	Summer Term 2018

	-Work to promote these modules and encourage graduate students to complete them.		
Additional course offerings through video-link	Strike a Department committee to examine the recommendation in detail and possible pathways forward	Associate Chair – Graduate to chair the Department committee	- Committee meetings to be held during summer term as trail run could be offered as Special Topics course in 2018-2019 academic year

Faculty Response:

The Faculty extended its gratitude to the reviewers, department staff, graduate students and faculty members who carried on this important task. Materials Science and Engineering (MSE) is the oldest department in the Faculty and represents a strong foundation upon which the Faculty has built its international reputation. The Faculty accepted the report as a very positive indicator of the high quality academic programs it offers and the open, collaborative social environment it creates for its graduate students.

The faculty has undergone substantial growth over the past four years, with MSE hiring four tenure track professors in areas of biomaterials and materials processing/characterization. Requests for future hires will be accommodated in the fullness of time as student demand requires, but for the moment the Faculty will be unable to cover the requested computational faculty position. Neither the program nor reviewers are identifying computational research as a knowledge deficit impairing the quality of the programs or reputation of the institution, and so they will accept the recommendation as meant for future discussions with the department on their strategic plan.

The overlap in degree requirements between the science and engineering degrees (both Master's and Doctoral) has been a recent source of confusion and the Faculty was happy to acknowledge that the department will be eliminating the science degrees. The Associate Dean will assist the department in moving these changes, along with the course changes, through the mechanisms of the university starting in the fall of this year.

Quality Assurance Committee Recommendation:

McMaster's Quality Assurance Committee (QAC) recommends that the Materials Science and Engineering graduate programs should follow the regular course of action with an 18-month progress report and a subsequent full external cyclical review to be conducted no later than 8 years after the start of the last review.

FINAL ASSESSMENT REPORT
Institutional Quality Assurance Program (IQAP) Review
Chemistry (MSc and Ph.D.)

Date of Review: April 25 – 26, 2013

Review Team Members: Dr. Lars Konerman, University of Western
Dr. Douglas Stephen, University of Toronto
Dr. Turlough Finan, McMaster University

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate Chemistry programs delivered by the **Department of Chemistry and Chemical Biology**. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

**Executive Summary of the Cyclical Program Review of the Graduate Chemistry Programs in
the Department of Chemistry and Chemical Biology**

In accordance with the Institutional Quality Assurance Process (IQAP), the Department of Chemistry and Chemical Biology submitted a self-study in March 22, 2013 to the Associate Vice President and Dean of Graduate Studies to initiate the cyclical program review of its graduate programs. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study contained all course outlines associated with the program and the CVs for each full-time member in the Department.

Two arms-length reviewers (Dr. Lars Konerman, Professor, Department of Chemistry, University of Western Ontario and Dr. Douglas Stephan, Department of Chemistry, University of Toronto) and one internal reviewer (Dr. Turlough Finan, Department of Biology), selected from a set of proposed reviewers, examined the materials and completed a site visit on April 25 – 26, 2013. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President and Dean of Graduate Studies; Associate Dean of Health Science; Chair and Associate Chair of Graduate Studies in

the Department of Chemistry and Chemical Biology and meetings with a group of current Ph.D. and MSc students, full-time faculty and support staff. The Review Team also had an opportunity to tour the NMR, Mass Spectrometry, and X-Ray facilities.

The Chair of the Department of Chemistry and Chemical Biology and the Dean of the Faculty of Science submitted responses to the Reviewers' Report (July/August 2013). Specific recommendations were discussed and clarifications and corrections were presented. Follow-up actions and timelines were included. McMaster's Quality Assurance Committee (QAC) reviewed the above documentation and the committee determined that the external reviewers report was extremely positive in its assessment of this program. The QAC recommend that there is no further action required until the program comes up for review during the regular cycle. The Final Assessment Report was prepared by the QAC to be submitted to Graduate Council and Senate (November 2014).

In their report (March 2013), the Review Team provided feedback that describes how the Ph.D. and MSc Chemistry programs meet the Institutional Quality Assurance Process (IQAP) evaluation criteria and are consistent with the University's mission and academic priorities. The Review Team wrote that the graduate program in Chemistry is an effective program that provides students with a solid background in chemistry via graduate courses, hands-on training and extensive research experience. The delivery of course information is performed via an innovative module structure, and the research experience is augmented with an excellent colloquium program. The level of student satisfaction is very high. The students expressed very high levels of satisfaction with their professors, the program structure, and with the research infrastructure available to them. The Review Team noted that the graduate students raised several minor issues prompting some recommendations as delineated below, however, they also noted that it is clear that the department is making every effort to be responsive with the concern for the graduate student experience being of paramount importance to faculty and staff. In general, the review team was highly impressed with the program, the response of the students, and the attitude of the faculty. This very strong department is clearly one that is targeting an even stronger future with plans for significant growth. The Review Team made a number of suggestions and recommendations for future consideration.

The following program strengths and weaknesses were noted:

Strengths

- High level of student satisfaction in the graduate program
- Strong research culture among students
- Faculty is well respected with a number of internationally renowned senior faculty and a strong national presence among the younger faculty
- Course curriculum is delivered in an innovative manner of dividing content into 6-week modules. This module approach appears effective at providing good coverage of "core" material and also provides current information via a large number of special topics from across the discipline.

Weaknesses

- Some older lab spaces are in need of renewal renovations for both aesthetic and safety concerns
- Time to completion is long and could benefit from some adjustments
- Chemical Stores are often short on common inventory items

The Chair of the Department of Chemistry and Chemical Biology submitted a response to the Reviewers' Report (July 2013). The Dean of the Faculty of Science submitted his response to the Reviewers' Report and the Program's Response on August 29, 2013. Specific recommendations were discussed, along with follow-up actions to aid in addressing the recommendations.

The Dean of the Faculty of Science, in consultation with the Department Chair shall be responsible for monitoring the recommendation implementation plan. The details of the progress made will be presented in the 18-month Follow Up Report and filed in the School of Graduate Studies.

Summary of the Reviewers' Recommendations with the Department's and Dean's Responses

Recommendations

- 1. Older sections of the ABB physical space are in need of renewal. Updated labs could help the department compete in the recruiting of students, postdoctoral fellows and faculty. Updates could also introduce infrastructure cost savings by reducing energy costs.**

Response: The Department is in the process of obtaining blueprints for renovation of the research space in ABB.

The Dean advised that several new large initiatives are currently being developed and that the Faculty of Science will continue to work with the department to develop long-range planning and fundraising initiatives to aid in space renewal.

Responsibility for Following Up: Dean, Faculty of Science and Department Chair

Timeline: Update at 18-month follow up report

- 2. Older lab spaces are in need of renovations for both aesthetic and safety concerns.**

Response:The Department has met with representatives of the Environmental and Occupational Health Support Services and the Director of Energy Management and Utilities to discuss the issue and plan for solutions.

The Dean advised that the Research and Facilities Administrator from the Dean's Office would keep in close contact with the department to ensure appropriate modifications are brought forward as soon as possible.

Responsibility for Following Up: Department Chair and Research Facilities Administrator from the Dean's Office

Timeline: Update at 18-month follow up report

3. Increase information available to students on career paths other than that leading to academia. Current students expressed interest in more interaction with visiting speakers from industry for career advice.

Response: The Dean indicated that his office would encourage the graduate leaders from the department, as well as, other graduate units in Science, to work with the School of Graduate Studies to increase outreach to alumni and industry partners that might offer information on career alternatives to students.

Responsibility for Following Up: Dean's Office/Graduate Leaders

Timeline: Update at 18-month report

4. Improvements to communication within certain areas of the department could be improved upon, specifically surrounding the Chemical Stores.

Response: The department agreed with the report that there are concerns about Chemical Stores meeting the needs of graduate students. The department requested that the Faculty and central administration consider these issues and work with the department and other stakeholders to make Stores a more efficient and valuable facility.

The Dean noted that his office would work together with the department and the Office of the Vice President Administration to identify issues and develop solutions.

Responsibility for Following Up: Department Chair/Dean's Office

Timeline: Follow up at 18-month report

5. The departmental website would benefit from an overhaul. It is essential that the website be updated regularly and that it is visually appealing.

Response: The department agreed with the review team that the website is an area that can be improved upon significantly. The department noted that a major update to the graduate studies page would be coming prior to the next recruiting season. The improved website will hopefully help to attract more domestic students, as well as allow for better communication with graduate students.

Responsibility for Following Up: Department Chair

Timeline: Follow up at 18-month report

6. Increase feedback on teaching performance to Teaching Assistants (TAs). It was suggested that the undergraduate reviews of teaching assistants be passed on to the TAs, at least for the larger enrolment undergraduate courses.

Response: The department has begun to develop a TA evaluation form and process that will be universal across all chemistry courses, and will provide direct feedback to the graduate students. The TA evaluations will also be used in selecting individuals for TA awards.

Responsibility for Following Up: Department Chair

Timeline: Update at 18-month report

7. Enhance the seminar program and increase attendance by encouraging student input into the seminar speaker selection process.

The department proposed making it clear to students that they can suggest speakers for the seminar program, as long as their supervisor agrees with the selection. The department has also begun to strongly consider increasing the number of industrial speakers and giving students the opportunity to interact with these speakers.

Responsibility for Following Up: Department Chair working with supervisors

Timeline: Follow up at 18-month report

8. Decrease the length of the time to completion for both MSc and Ph.D. degrees.

Response: In the past, the department has been financially supportive of overtime students. The department will reconsider its policy for financial support of overtime students, with the intention of encouraging students to finish MSc degrees within 24 months and Ph.D. degrees within five years.

Responsibility for Following Up: Department Chair working with the Associate Chair of Graduate Studies

Timeline: Follow up at 18-month report

9. Change the name of the comprehensive exam to “comprehensive examination and research proposal”.

Response: The department does not feel that this change is necessary, as an information session about the exam, which specifically explains the proposal portion, is given each year so students are aware of what is expected of them.

10. Encourage faculty to consult with predecessors in a regularly offered graduate course to ensure that changes to evaluation strategies are not dramatic.

Response: The department noted that there is always consultation between faculty that teach a particular course from one year to next, but different faculty have different teaching styles and it is difficult to standardize evaluation methods when faculty changes.

FINAL ASSESSMENT REPORT
Institutional Quality Assurance Program (IQAP) Review
Master of Communications Management

Date of Review: February 19th and 20th, 2013

In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate program delivered by Communication Management. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the Review

The Communication Management program submitted a self-study to the School of Graduate Studies February 2013. The self-study presented the program descriptions and learning outcomes, an analytical assessment of these two programs, and program data including the data collected from a student survey along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the CVs for each full-time faculty member in the Department.

Three arm's-length external reviewers from Ontario (Canada), North Carolina (USA) and Massachusetts (USA) and one arm's length internal reviewer examined the materials and completed a site visit February 19th and 20th, 2013. The visit included interviews with the Provost and Vice-President (Academic); Dean of the Faculty of Humanities; Dean of School of Graduate Studies; Chair of the Department of Communication Studies & Multimedia, the Program Director and meetings with groups of current students, full-time and part-time faculty and support staff.

In their report the review team found that the concept, design and delivery of McMaster University's Master of Communications Management (MCM) program appears to be consistent with McMaster University's academic strategic plan and supports the Self-Study conclusion that "The MCM does in professional communication what McMaster University programs in health sciences and engineering do for their fields." The Review Team agreed with the program self-study conclusion suggesting that the MCM program "delivers an innovative-graduate experience that connects research and teaching directly to the needs of the professions and the communities it serves." The program also met the standards identified in the October 2012 report of the Commission on Public Relations Education, *Standards for a Master's Degree in Public Relations: Educating for Complexity*. It was their assessment that the MCM curriculum is appropriate, is consistent with professional standards in communications management, both in Canada and globally, and indeed is stronger than most master's programs in communications management. A major concern is what will happen when the large number of current first-year students in the program progress to their capstone or thesis projects. Will there be enough MCM faculty members to adequately teach and assess these projects? Even before these students reach the capstone level, their numbers will force a change in the way that courses are currently taught (e.g., group discussions) and how assignments are evaluated (teaching assistants probably will be needed).

The head of the Master of Communication Management program and the Dean of the Faculty of Humanities submitted responses to the Reviewer's Report (August/September 2013). Specific recommendations were discussed and clarifications/corrections were presented. Follow-up actions were included. McMaster's Quality Assurance Committee (QAC) reviewed the documentation associated with the review and determined the program proceed with their 18 month report and in light of serious concerns raised around the governance model that the program should have another external review in 4 years instead of the normal cyclical review.

- **Strengths**
 - **Program Delivery**
 - **Curriculum**
- **Weaknesses**
 - **Governance**
 - **Logistics of reading lists/textbook availability**
 - **Management of relatively large class sizes**

Summary of the Reviewers' Recommendations with the Program's and Dean's Responses

Recommendations

1. Governance

It is the unanimous opinion of this Review Team that governance is the most pressing problem being faced by the MCM program. Despite the huge success of this program in all of the above categories, and despite the program's ability to sustain itself without any financial assistance from the provincial government, the MCM program lacks its own home within the University.

Program Response: The program agrees with the review team's recommendation that the most pressing issue for the MCM program is its lack of a clearly defined and stable institutional home. They believe it is clear from the information that is presented in this report that the MCM program is not wanted or welcome in the Communication Studies and Multimedia department. Therefore it is incumbent that the governance of the MCM be rectified immediately. Failing to do so puts both the students and untenured faculty at risk. The MCM should be nurtured and developed so that McMaster's leadership position can be maintained and strengthened.

Dean's Response: As the reviewers rightly point out, the institutional position of the MCM program is confusing, and needs to be clarified. They received conflicting information as to its relationship to the Department of Communication Studies and Multimedia (CSMM), and concluded: "Understandably, the lack of clarity about MCM's administrative relationship within the University is a source of uncertainty, frustration, strained relationships and tension among faculty and staff." The fact that the Dean's Office invited the director of the program and not the Department Chair to respond to this IQAP review suggests that it is an independent program, yet this policy has not been clearly communicated or even consistently applied by the Dean's Office.

The MCM IQAP reviewers were not the first to note organizational problems and confusion in CSMM. The University's Quality Assurance Committee already had recommended that the Faculty of Humanities initiate a Department Review, following the IQAP review report of the undergraduate and graduate programs in Communication Studies (CMST) and Multimedia (MM). The Department has been reviewed, and the report as well as the response of the Department and Faculty, are being submitted to the Departmental Reviews Committee.

The MCM IQAP reviewers suggested that the program be given a separate institutional home, and the program director makes an impassioned case for it to be an autonomous program. In contrast, the Department reviewers suggested that the MCM program be separated from the Department, but only on a temporary basis, with the intention that the program might eventually return to the Department. I have reached a somewhat different conclusion. As the MCM IQAP reviewers noted, the lack of organizational clarity appears to have contributed to the tension in the Department, breeding misunderstanding and mistrust. So, as an experiment, the Dean's Office intends to clarify the position of the MCM program by clearly establishing and treating it as a graduate program run within the Department of Communication Studies and Multimedia. Its director will report to the Department Chair and the Department, just as the director of the MA in CSMM does. The staff of the MCM will report to the administrative coordinator of the Department, and will be part of the staff of CSMM.

It is the Faculty's hope that, while MCM continues to develop its own program identity, it will also become an integral part of what both IQAP and Department reviewers have identified as a Department housing a very strong group of researchers and teachers. We are hopeful that the MCM IQAP reviewers were correct in thinking that administrative confusion bred mistrust in the department. Those who expressed hostility to the program to the IQAP reviewers will come to appreciate the program once they better understand and have responsibility for it, and those members who have been teaching in the MCM program will come to appreciate just how much colleagues within their own Department can contribute to the program.

Responsibility for Leading Follow Up: Dean/Department Chair/Program Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

2. Logistics

Logistical issues concerning reading lists and textbook availability need to be addressed.

Program Response: We have already begun to address the logistic challenges. The dramatic increase in class sizes has caused both instructors and administrators to review the manner in which learning materials and instruction are delivered to the class. The hiring of teaching assistants and of additional administrative staff has relieved this situation. However, staff resources remain stretched.

Responsibility for Leading Follow Up: Faculty/Department Chair/Program Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

3. Timely Feedback to Students

Now that instructors are serving larger classes for the first-year students, more attention should be directed to providing feedback earlier when possible and to managing the logistics of large discussion groups. The first-year students, themselves, have suggested that it might be desirable to split their large class into smaller groups for discussion purposes and that perhaps certain "rules of engagement" could be agreed upon to avoid situations where everyone's email inboxes become flooded with discussion threads.

Program Response: One of the innovations this year was the hiring of TAs for each of the first year classes. This helped the instructors to more effectively deliver the content and respond to student questions in a timelier manner. They are also actively examining how to scale up the MCM pedagogy to meet the increasing popularity of the program. The MCM Retreat we have planned will be the beginning of a research and development project to gather evidence and then evaluate that evidence within their process of continuous improvement. We will also compile a guidebook of best practices, roles and responsibilities for the various aspects of the MCM student and faculty experience the three components

of the MCM pedagogy: in-class learning during residency, webinar tutorials (Adobe Connect), asynchronous on-line learning (A2L)

Responsibility for Leading Follow Up: Faculty/Department Chair/Program Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

4. E-Learning Tools

The use of A2L and Adobe Connect should be re-evaluated.

Program Response: They are actively re-evaluating the value of the e-learning solutions that we use in the MCM, with a view of optimizing the student and faculty experience within our hybrid learning model.

Responsibility for Leading Follow Up: Faculty/Department Chair/Program Chair

Timeline for Addressing Recommendation: Update at 18 month follow-up report

Dean's Response to Recommendations related to Teaching:

The proposal to develop a guidebook on best practices, particularly directed to assisting instructors and students in making the most of the in-class, webinar and asynchronous sessions, is a good one. The program members are also proposing to review the platform used to deliver online education; the Faculty will ensure that, in undertaking this review, they work closely with the expert support staff in the Humanities Media and Computing Centre as well as the McMaster Institute for Innovation in Teaching and Learning. The program director has responded to some of the issues raised by hiring teaching assistants and additional staff. The Faculty will work with the Department Chair and director of the program to review and monitor these solutions, to ensure that resources are allocated effectively, and to ensure that students are receiving the educational experience that they expect from this program.

Quality Assurance Committee Recommendation

McMaster's Quality Assurance Committee (QAC) reviewed the documentation associated with the review and determined the program proceed with their 18 month report and in light of serious concerns raised around the governance model that the program should have another external review in 4 years instead of the normal cyclical review.

FINAL ASSESSMENT REPORT
Institutional Quality Assurance Program (IQAP) Review
School of Rehabilitation Science Graduate Programs

Date of Review: October 16 - 17, 2013

Review Team Members: Dr. Martin Bilodeau, University of Ottawa
Dr. Lili Liu, University of Alberta
Dr. Robert Wilton, McMaster University

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate programs delivered by the **School of Rehabilitation Science**. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

**Executive Summary of the Cyclical Program Review of the Graduate Programs in the
School of Rehabilitation Science**

In accordance with the Institutional Quality Assurance Process (IQAP), the School of Graduate Studies submitted a self-study in September 2013 to the Associate Vice-President and Dean of Graduate Studies to initiate the cyclical program review of its graduate programs. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study contained all course outlines associated with the program and the CVs for each full-time member in the Department.

Two arm's length external reviewers (Dr. Martin Bilodeau, Director and Professor, School of Rehabilitation Science, Associate Dean, Faculty of Health Sciences, University of Ottawa and Dr. Lili Liu, Professor and Chair, Department of Occupational Therapy, University of Alberta) and one internal reviewer (Dr. Robert Wilton, Professor, School of Geography and Earth Sciences) were selected by the Associate Vice-President (Academic), Health Sciences and Associate Vice-President and Dean of Graduate Studies. They reviewed the self-study documentation and then conducted a site visit to

McMaster University on October 16-17, 2013. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President and Dean of Graduate Studies; Associate Vice-President (Academic) Health Sciences, Associate Dean, Graduate Studies (Health Sciences), Associate Dean School of Rehabilitation Science; Assistant Dean, School of Rehabilitation Science and meetings with groups of current Ph.D. and MSc students, full-time faculty and support staff. The Review Team also had an opportunity to tour the School of Rehabilitation Science.

The Assistant Dean, Rehabilitation Graduate Program and the Associate Vice-President, Academic, Faculty of Health Sciences, submitted responses to the Reviewers' Report (January/February 2014). Specific recommendations were discussed and clarifications and corrections were presented. Follow-up actions and timelines were included. McMaster's Quality Assurance Committee (QAC) reviewed the above documentation and the committee determined that the external reviewers report was extremely positive in its assessment of this program. The QAC recommend that there is no further action required until the program comes for review during the regular cycle. The Final Assessment Report was prepared by the QAC to be submitted to Graduate Council and Senate (December 2014).

In their report (November 2013), the Review Team provided feedback that describes how the graduate programs in the School of Rehabilitation Science meet the Institutional Quality Assurance Process (IQAP) evaluation criteria and are consistent with the University's mission and academic priorities. The Review Team members were consistently impressed by the graduate programs offered within the School of Rehabilitation Science (SRS). The faculty and students who make up the program are highly productive with respect to research and have good rates of success with external research funding. Faculty members enjoy a strong reputation nationally and internationally and this is demonstrated through the program's ability to attract a strong pool of both domestic and international applicants. With respect to curriculum and teaching, SRS was quick to respond to the opportunities presented by the online course-based MSc and has developed a program that appeals to both those in the OT/PT field and in other allied professions. With respect to thesis-based programs, there is no doubt that SRS offers a rigorous, research-intensive graduate experience with strong emphasis on problem-based learning and knowledge translation. The Review Team also noted that SRS offers a supportive and collegial work environment. Mentoring – among faculty and between faculty and students – was emphasized repeatedly and there appear to be effective lines of communication among and between faculty, administrative staff, and graduate students.

The following program strengths and weaknesses were noted:

Strengths

- Excellence of faculty and the quality of graduate supervision provided
- Diversity and interdisciplinary of curriculum and trainees
- High rate of external success of students. External fellowships are exceptionally successful and Ph.D. graduates have been successful in moving into funded postdoctoral fellowships and academic positions.

- Positive mentorship between faculty and students and effective communication amongst faculty, administration, and graduate students
- Trainees at all levels are completing on time

Weaknesses

- Funding package for graduate students could be revised
- Minimal opportunities for students to gain teaching experience
- Distribution of students per supervisor is not balanced

The Assistant Dean, Rehabilitation Science Graduate Program submitted a response to the Reviewers' Report (January 23, 2014). The Associate Vice-President, Academic submitted her response to the Reviewers' Report and the Program's Response on February 26, 2014. Specific recommendations were discussed, along with follow-up actions to aid in addressing the recommendations. The Associate Vice-President, Academic, in consultation with the Associate Dean, Rehabilitation Sciences and Director of the School of Rehabilitation Sciences shall be responsible for monitoring the recommendations implementation plan. The details of the progress made will be presented in the 18-month Follow Up Report and filed in the School of Graduate Studies.

Summary of the Reviewers' Recommendations with the Department's and Associate Vice-President, Academic's Responses

Recommendations

- 1. The funding package for graduate students is a concern, and although the Assistant Dean is credited for innovative ways of creating funding packages for thesis route students, the School of Rehabilitation Science needs to develop more long-term strategies for both MSc and PhD students.**

Response: The Department plans to consult with the Associate Dean of the School of Rehabilitation Science in developing a plan for teaching assistantships within the SRS.

The Department will also develop a process for the Master's course-based degree option courses to use PhD students as instructors, (to be offered as a teaching assistantship for selected students), to increase Teaching Assistant opportunities while maintaining high quality education within the online option. Finally, the Department plans to develop a strategy for international trainees with clinical backgrounds to more quickly obtain their permanent resident status to improve the feasibility of enrolling international trainees.

The Associate Vice-President, Academic acknowledged that there have been significant challenges in today's funding environment and that the School of Rehabilitation Science is keenly aware of these challenges and has undertaken a review of additional internal funding opportunities, such as teaching assistantships. The AVP Academic also noted that the monies for funding Rehabilitation Science program students, aside from centrally allocated and external scholarship supports, will likely need to come from within the School of Rehabilitation Science.

Responsibility for Following Up: Assistant Dean, Rehabilitation Science Graduate Program in consultation with Associate Dean of School of Rehabilitation Science

Timeline: Follow up at 18-month report

2. Upcoming retirement of senior faculty members will require a transition plan to ensure the on-going quality of supervision and level of productivity.

Response: The Assistant Dean has been proactively engaging new faculty in mentorship to prepare them to take on a greater role in supervision. All new faculty members have been placed on committees, as a means of providing director mentorship on supervision. The Assistant Dean also meets individually with new faculty about their development as a supervisor and regular luncheons are scheduled where senior and junior faculty meet to discuss issues on graduate supervision. The Associate Vice-President, Academic noted that the program has discussed an effective process by which junior faculty become engaged and thoroughly support while gaining experience in supervision of trainees. The Associate Vice-President, Academic expressed her confidence in the department's assessment that the program is able to provide excellent and ongoing supervision to its graduate students.

Responsibility for Following Up: Assistant Dean, Rehabilitation Science Graduate Program

Timeline: Follow up at 18-month report

3. The Review Team encouraged the program and students to consider focusing on meaningful teaching experiences as a way of developing their teaching dossier.

Response:

The Program has suggested developing a database of skills/areas of content expertise that students wish to make themselves available for internal guest lectures/teaching sessions. This would then be circulated to faculty to let them know which students could be contacted for guest lectures or other requested educational experiences.

The Program also proposes to amend the comprehensive process to allow those interested in education to make their knowledge translation component be an educational project (evaluation of curriculum, development of a course outline/resources, and in-depth development of an educational module/resource)

Finally, the Program will invite McMaster's Institute for Innovation and Excellence in Teaching and Learning (MIETL) to do an annual presentation in the Rehabilitation Science Skills Series that would address development as an educator.

Responsibility for Following Up: Assistant Dean, Rehabilitation Science Graduate Program

Timeline: Follow up at 18-month report

4. The Review Team recommended obtaining balance between offering a diversity of courses to meet all the trainees' needs and not overextending faculty teaching assignments.

Response: The Rehabilitation Curriculum Committee will continue to review the enrolment of all courses annually and will discuss implications for the course offerings.

The Program will continue to obtain feedback from trainees through the monthly training meeting, and specifically request an annual discussion on curriculum offerings.

Responsibility for Following Up: Assistant Dean, Rehabilitation Science Graduate Program working with Program and Faculty curriculum committees

Timeline: Follow up at 18-month report

5. The Review Team suggested clarifying expectations of program requirements for both students coming from internal and external Master's programs, as some trainees who have come from external Master's programs felt disadvantaged because the expectations or program requirements were different for them.

Response:

The Program noted that the expectations/requirements are no different for students who continue into the Ph.D. program from McMaster's Master's program in comparison to those who have done their training elsewhere. Some applicants with a Master's degree from an external university may not have taken a previous theory course, so they would be required to complete those courses upon entering the program. The Program noted that they think this idea is a misconception among students and will not require any change in the current practice; however, they will investigate further.

The Associate Vice-President, Academic advised that the program has indicated that it is currently reviewing their comprehensive examination process and MSc to PhD transfer process, in addition to a review of the program fields. These changes are expected to be reviewed by program and Faculty curriculum committees in the coming months, and will aid in further clarifying program expectations for students and hone existing program strengths.

Responsibility for Following Up: Assistant Dean, Rehabilitation Science Graduate Program

Timeline: Follow up at 18-month report

6. The Review Team recommended looking at formal opportunities for students to be involved in guiding the program.

Response: The Department plans to develop, in consultation with students, a number of topics that they should be providing feedback to the program on during the course of the monthly meetings. These topics would include: curriculum, software needs, space/resources, topics for the skill series, and any other issues identified by trainees.

Responsibility for Following Up: Assistant Dean, Rehabilitation Science Graduate Program

Timeline: Follow up at 18-month report

FINAL ASSESSMENT REPORT
Institutional Quality Assurance Program (IQAP) Review
History
Undergraduate and Graduate Programs

Date of Review: April 9 - 10, 2015

*In accordance with the University Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the undergraduate and graduate programs delivered by the **Department of History**. This report identifies the significant strengths of the programs, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.*

The report includes an Implementation Plan that identifies who will be responsible for approving the recommendations set out in the Final Assessment Report; who will be responsible for providing any resources entailed by those recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations and who will be responsible for acting on those recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

**Executive Summary of the Cyclical Program Review of the
Undergraduate and Graduate History Programs**

In accordance with the Institutional Quality Assurance Process (IQAP), the Department of History submitted a self-study in February 2015 to the Associate Vice-President, Faculty and School of Graduate Studies to initiate the cyclical program review of its undergraduate and graduate programs. The approved self-study presented program descriptions, learning outcomes, and analyses of data provided by the Office of Institutional Research and Analysis. Appendices to the self-study contained all course outlines associated with the program and the CVs for each full-time member in the department.

Two arm's length external reviewers, one from Ontario and one from Quebec and one internal reviewer were endorsed by the Dean of Humanities, and selected by the Associate Vice-President, Faculty and Associate Vice President and Dean of Graduate Studies. The review team reviewed the self-study documentation and then conducted a site visit to McMaster University on April 9 – 10, 2015. The visit included interviews with the Provost and Vice-President (Academic); Associate Vice-President, Faculty, Associate Vice-President and Dean of Graduate Studies, Chair of the department and meetings with groups of current undergraduate and graduate students, full-time faculty and support staff.

The Chair of the department and the Dean of the Faculty of Humanities submitted responses to the Reviewers' Report (June 2015). Specific recommendations were discussed and clarifications and corrections were presented. Follow-up actions and timelines were included.

The Final Assessment Report was prepared by the QAC to be submitted to Undergraduate Council, Graduate Council and Senate (January 2017).

In their report (May 2015), the Review Team noted that the programs in History are strong ones, offered by a corps of dedicated and talented scholars and teachers. The Review Team highlighted that the department has a distinguished history, and enjoys excellent library and archival resources.

The following program strengths and areas for improvement were noted:

Strengths

The Review Team noted key strengths of the department and its program include the quality of each individual professor; the collective collegiality of the faculty; the resources of the Wilson Institute for Canadian History; and the ability to recruit students who are already in-course to stay with the department for a more intensive program.

Areas for Improvement

The Review Team’s report raised some concerns that the faculty complement is shrinking with recent retirements and further ones impending. The report noted that the immediate challenges are: undergraduate recruitment in the face of declining enrolments and the faculty complement in the face of impending retirements and the way this connects with the shape and future of the graduate program.

The Dean of the Faculty of Humanities, in consultation with the Chair of the Department of History shall be responsible for monitoring the recommendations implementation plan. The details of the progress made will be presented in the 18-month Follow Up Report and filed in the Associate Vice-President, Faculty’s office and the School of Graduate Studies.

Summary of the Reviewers’ Recommendations with the Department’s and the Dean’s Responses

Recommendations for Undergraduate Program

Recommendation	Proposed Follow-Up	Responsibility for Leading Follow-Up	Timeline for Addressing Recommendation
Reconsider decision to introduce Level 1 seminars, in light of the resource commitment it involves	Review the Level 1 seminars after they have been given a proper trial run of three years. Faculty will encourage Department to consider alternative modes of delivering such a course, such as	Department	Within 2 years

	in a larger active learning classroom		
Ensure instructors are familiar with and adopt “inquiry” methods in courses		Department	Within 2 years
Experiment with a popular Level I course, such as “History of the internet”, both to increase service teaching and as a way of recruiting more students to the program	Review the success of the relatively new Level I lecture courses	Department	Within 2 years
More service courses, given the nature of the budget model	Introduce a new Level II course that is both traditional and innovative – The Second World War: A Global History – as a service course Willingness to develop online courses	Department	Ongoing review of service teaching
Increase offerings in non-western history and in western history prior to the modern era	Associate Dean to work with the department to ensure some balance in course offerings and encourage the department to review its course list requirements	Department and Associate Dean	Within 18 months
Expansion of the history practicum and offerings in digital humanities	Ongoing review of Practicum and Digital Humanities in curriculum. Open to practicums History instructors have been learning more about Digital Humanities and are incorporating those skills into their courses,	Department	Review progress in 18 months

	which seems a better strategy than segregating such skills in special courses		
Review the impact of the separation of the Faculties of Humanities and Social Sciences on recruitment in History, noting for example, the unusually small proportion of students combining History and Political Science compared to at other institutions	There is no formal impediment to Combined Honours with disciplines in Social Sciences and such combinations are encouraged. The Dean has brought this concern to the attention of the Task Force struck by the Provost and the Deans of Humanities, Science and Social Sciences to consider such issues	Dean, as part of response to Task Force	Next 12 – 24 months
Improve website as one recruitment initiative	Faculty of Humanities is set to launch a new Content Management System website which will allow Departments to more easily make changes and update their website. The Dean's Office will encourage the department to review its content	Department and Dean	Over next 6 – 12 months as website launches
Review faculty complement	Dean will work with the Chair and the Department on strategic complement planning	Dean and Department	Ongoing review of faculty complement requirements in 12, 24, 36 months

Recommendations for Graduate Programs

Recommendation	Proposed Follow-Up	Responsibility for Leading Follow-Up	Timeline for Addressing Recommendation
Review quality of the applicants to the	Department has been modifying the program	Department	Review effectiveness over next 2 – 3 years

graduate program and the ability of the department to support program growth	(recent abolition of doctoral fields and further proposed changes that will do away with a comprehensive examination in order to move students more quickly to the dissertation) in a variety of ways to give the department a competitive advantage		
Emphasize particular expertise of faculty members so that graduate students will focus on the benefits of a wider committee	Department has made appointments so as to strengthen its specialization in the British world as well as various thematic areas Dean will recommend that the department do more to highlight the depth it has in those areas	Department	Ongoing efforts to emphasize particular strengths

Quality Assurance Committee Recommendation

McMaster’s Quality Assurance Committee (QAC) reviewed the above documentation and the committee noted:

- That the programs in History are strong ones, offered by a corps of dedicated and talented scholars and teachers. The Review Team highlighted that the department has a distinguished history, and enjoys excellent library and archival resources.
- The following strengths: the quality of each individual professor; the collective collegiality of the faculty; the resources of the Wilson Institute for Canadian History; and the ability to recruit students who are already in-course to stay with the department for a more intensive program.
- That undergraduate recruitment in the face of declining enrolments and the faculty complement in the face of impending retirements and the way this connects with the shape and future of the graduate program presented a major challenge.

- That the program's goals and priorities match FWI, admission requirements are appropriate, some reworking of the curriculum is taking place, the faculty complement will be reduced in the future causing some concern, tas and staff are very good
- That the ability to offer tutorial based teaching in level I is admirable, but the intensive time demands of this approach need to be considered
- The Department should continue to strive to maintain breadth of its fields of specialization, but will have to recognize that not all fields will be sustainable
- Areas for Improvement:
 - Add a large scale service course to the first year of u/g program – history on the internet
 - Mentoring of sessionals and tas
 - Improve relationship between Canadianist PhD students and other PhD students
 - More active recruiting of graduate students
- Areas for Enhancement:
 - Consider ways to partner with social sciences
 - Consider opportunities for further fundraising
 - Greater support/funding for graduate students
 - More dynamic web presence for recruiting/awareness
- That the history department is open to most recommendations and is working to address most recommendations.

Quality Assurance Committee Recommendation

Recommendation: The program should follow the regular course of action with an 18-month follow-up report and a subsequent full external cyclical review to be conducted no later than 8 years after the start of the last review.

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

UNENE Master's of Nuclear Engineering

Date of Review: November 12 – 13, 2013

In accordance with McMaster's Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the University Network of Excellence in Nuclear Engineering (UNENE) Master's of Nuclear Engineering program. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

This Final Assessment Report includes an Implementation Plan that identifies who will be responsible leading the follow up for the proposed recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the UNENE Master's of Nuclear Engineering Cyclical Program Review

The UNENE Master's of Nuclear Engineering is a cooperative program among five degree-granting institutions, namely McMaster University, Queen's University, University of Ontario Institute of Technology, University of Waterloo and University of Western Ontario (now Western University). In accordance with the IQAP, the Master's of Nuclear Engineering program submitted a self-study to the School of Graduate Studies on November 4, 2013. The self-study presented the program descriptions and learning outcomes, an analytical assessment of the program, including data collected from students along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the course outlines for all courses in the program and the CVs for each full-time faculty member in the Program.

Two arm's-length reviewers from Texas and the Canadian Nuclear Safety Commission and one internal reviewer participated in a two-day site visit organized by the School of Graduate Studies. The visit consisted of meetings with the Provost and Vice-President (Academic), Associate Vice-President and Dean of Graduate Studies, UNENE President, UNENE Director, UNENE Administrator, UNENE Secretary/Treasurer, Dean of Engineering and Associate Dean (Engineering) in addition to separate meetings with students and faculty members. The Review Team highlighted their findings in a report submitted on December 2, 2013. The Review Team found that program goals align quite closely with the academic plan and mission of McMaster University, and all the universities that are part of the UNENE Master's

of Nuclear Engineering. They reported that the program was well run and has been developed to meet the needs of industry. They were impressed by the quality of instructors who come from the five participating universities and are well recognized leaders in their respective fields. The students who participated in a conference call with the Review Team expressed a high degree of satisfaction with the program and felt that it considerably expanded their knowledge base and is valuable in their professional development and career progression. The following program strengths and weakness were also noted:

- **Strengths**
 - Instructors are leader in their fields and several hold UNENE/NSERC Industrial Research Chairs or are recipients of collaborative research grants
 - Courses are delivered over two days on alternate weekends in Whitby, Ontario to make it possible for full-time employees to attend
 - Lectures available to other more remote sites by distance delivery technology
 - UNENE has the capability to accommodate fluctuations in enrollments to sustain program
 - Courses are regularly updated with current events
 - High level of student satisfaction with program
- **Weaknesses**
 - ADMI courses could be enhanced to strengthen the participant's background in the organizational and human performance aspects relevant to the safe operation of the power reactors
 - New course could be added on the regulations, protection of the environment, security and safeguards
 - Expanding certain courses to cover types of reactors other than CANDU which could serve the initiative for UNENE to expand in the international arena
 - Clarifying learning outcomes that relate to the development of communication skills

The reviewers did not raise any serious concerns about the operation of the program, but did put forward several recommendations for improvements. The response from the UNENE Director indicates that some of these suggestions such as adding a new course on uses of energy in society and the associated environment and security safeguards may be relatively straightforward, while others will require negotiation with other parties (see below). This Final Assessment Report was prepared by the Quality Assurance Committee. The 18 month report will show progress against items addressed in this review. The program has been approved to continue and is scheduled for its next full review in eight years.

Summary of the Reviewers' Recommendations with the Program Director and Dean's Responses & Follow Up Process

Recommendation #1: Some of the ADMI courses could be realigned and new courses could be added to strengthen the participant's background in the organizational and human performance aspects relevant to the safe operation of the power reactors.

Response: The program responded by stating that they do not have control over ADMI courses. ADMI courses are designed for a broad engineering audience. The UNENE Programme Director has, however, written to ADMI to see if ADMI has any interest in covering human factors.

Responsibility for following up: Programme Director

Timeline: Update at 18 month report

Recommendation #2: A new course could be added on the regulations, protection of the environment, security and safeguards.

Response: The Programme Director will design and propose such a course. UNENE has also started to discuss with COG, OPG, CNSC and UOIT to make sure the new course does not duplicate existing academic or industry material.

Responsibility for following up: Programme Director

Timeline: Update at 18 month report

Recommendation #3: Expanding certain courses to cover types of reactors other than CANDU.

Response: UNENE states that the UNENE M.Eng. already covers non-CANDU reactors in some courses, and believes it is sufficient for the M.Eng for now.

Responsibility for following up: N/A

Timeline: N/A

Recommendation #4: Expanding certain courses to include issues with nuclear engineering applicable to the whole fuel cycle.

Response: UNENE states that this is already covered somewhat in the Fuel Management course. The Programme Director will also ask Prof. P. Chan to add sustainability to the Fuel Design course.

Responsibility for following up: Programme Director

Timeline: Update at 18 month report

Recommendation #5: UNENE should negotiate with COG to explore ways to facilitate access to the wealth of operational safety knowledge at COG without jeopardizing proprietary information

Response: UNENE agrees and has made an initial request to COG.

Responsibility for following up: Programme Director

Timeline: Update at 18 month report

Recommendation #6: Promote further cooperation/integration between UNENE and UOIT.

Response: UNENE agrees and the diploma is designed to be a cooperative venture with UOIT and may serve as a model for further cooperation.

Responsibility for following up: Programme Director

Timeline: Update at 18 month report

Recommendation #6: Industry-oriented engineering projects could be initiated earlier in the program and linked to the courses. The topic along with the academic and industry advisors would then be identified sooner, and students could begin working on the project at an earlier stage.

Response: UNENE responded by stating that they did not favour a more open-ended project as they felt students would be even more discouraged by the length than they are now. The program proposed that the Engineering Project could be designed to be more appealing to students and so the program will explore some other ideas.

Responsibility for following up: UNENE

Timeline: Update at 18 month report

Recommendation #7: Offer the UNENE courses as a vehicle for professional development for employees in the nuclear industry in Canada

Response: UNENE has outlined that they are already doing some professional development. The diploma will further such opportunities. The program has just finished a professional development module on Project Management with a UNENE utility.

Responsibility for following up: UNENE

Timeline: Update at 18 month report

Recommendation #8: The Review Team endorses the concept of the Diploma.

Response: UNENE is drafting the application this coming academic term.

Responsibility for following up: UNENE

Timeline: Update at 18 month report

Recommendation #9: The UNENE Master's of Nuclear Engineering is almost ideally suited to help meet international needs.

Response: The program stated that neither COG nor UNENE has this as their mandate. UNENE does not have the resources to offer courses at its own expense. However, UNENE will continue to pursue international opportunities on a case-by-case basis consistent with the overall CANDU strategy.

Responsibility for following up: N/A

Timeline: Update at 18 month report

Recommendation #10: The distance delivery technology would benefit from improvement.

Response: The program agrees so the next step will be to set up a system similar to what is used at COG.

Responsibility for following up: Programme Director

Timeline: Update at 18 month report

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

MSc eHEALTH PROGRAM

Date of Review: April 3 – 4, 2013

Review Team Members: Dr. Guy Paré, HEC Montréal

Dr. Francis Lau, University of Victoria

Dr. John Medcof, McMaster University

In accordance with the McMaster's Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate program delivered by eHealth. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

This Final Assessment Report includes an Implementation Plan that identifies who will be responsible to lead the follow up for the proposed recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the MSc eHealth Cyclical Program Review

The McMaster M.Sc. eHealth Program is an interdisciplinary program that is offered through the Business, Health Sciences and Engineering Faculties. The program is mainly supported through faculty members from the area of Information Systems in Business, the Department of Clinical Epidemiology and Biostatistics in Health Sciences, and the Department of Computing and Software (CAS) in Engineering. In accordance with the IQAP, M.Sc. eHealth submitted a self-study to the School of Graduate Studies in February 2013. The self-study presented the program descriptions and learning outcomes, an analytical assessment of the program including the data collected from students along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the course outlines for all courses in the program and the CVs for each full-time faculty member in the program.

Two arm's-length reviewers (Dr. Guy Paré, Professor, HEC Montréal and Dr. Francis Lau, Professor, University of Victoria) and one internal reviewer (Dr. John Medcof, Professor and Associate Dean, McMaster University) participated in a two-day site visit organized by the School of Graduate Studies. The visit consisted of separate meetings with students, alumni and

faculty members in addition to the Provost, Associate VP & Dean of Graduate Studies, Associate VP (Academic), Graduate Associate Deans (Engineering, Business, and Health Science), Acting Dean of Engineering and Dean of Business, Program Director and faculty leads, Department Chairs, and program administrators. In addition to the site visit, all students and alumni were invited to send emails with their confidential comments directly to the review team. After the visit, the review team analyzed the email responses, the program self-study and program website according to the evaluation criteria comprised in the review guidelines. The review team worked collaboratively over a 4-week period to produce a report, which was intended to provide counsel rather than prescriptive courses of action.

The Review Team highlighted their findings in a very thoughtful and comprehensive report submitted on April 30, 2013. The reviewers made some of the following observations:

- The M.Sc. eHealth Program is well positioned to meet the **goals and priorities** of McMaster University.
- It offers a solid **interdisciplinary, experiential and self-directed learning experience** for students, an engaged community through its external advisory board with well connected people in the health industry, and eHealth innovations through related research from faculty members.
- The **admission requirements** are aligned with the learning outcomes of the program and at an appropriate level for a masters' program, demand some background in the technologies related to eHealth and encourage preparation in the health field.
- The program is aligned with Ontario's **Graduate Degree Level Expectations** criteria and with the *COACH core competency* matrix, showing that it reflects the current state of the eHealth field.
- However, they noted that the program leaves **hands-on technical knowledge and skills** for eHealth (i.e. systems analysis, agile methodologies and interoperability standards) to be taught by employers during internships rather than including them systematically in the curriculum to prepare students for internships and post degree employment.
- The **teaching and assessment** processes were generally found to be appropriate and effective for meeting the goals of the program.
- The **administrative resources** for the program are comparable to similar programs in the university, are considered adequate by senior administration and students and faculty did not have negative comments about them.
- In addition, the **library and computer lab resources** appear adequate and students commented on their frequent use of the university library holdings to access eHealth related literature
- Unfortunately, reviewers did note that the **financial support** for students appears to be lopsided with thesis-based students currently receiving \$13,200 per year for each of two years whereas course-based students receive \$3,000 per year.
- The list of **core faculty** was found to be impressive in terms of their supervisory experience, academic publications and research funding.

- Their recommendations revolved mainly around the need to better define the program vision, plan leadership succession and classify the role of Computer Science in the program.

The following program strengths and weakness were also noted:

- **Strengths**
 - Interdisciplinary nature of the program has been clearly identified in the self-report and valued by all involved
 - 8-month internship is a key distinctive feature. Most comparable programs in Canada include a 4-month internship. Spending 8 months in the field gives eHealth students an excellent opportunity for in-depth learning
 - Quality of students is high and the students are willing to learn from and teach their peers, are comfortable with charting their way through a flexible program (self-directed learners), and work hard to achieve goals related to courses, projects, presentations at conference, and final papers and theses
 - The quality of the faculty members is also high, their eHealth experience diverse and strong, and they are eager to be more involved in the program
 - Overall flexibility of the program offers represents another characteristic that was often mentioned, especially by students. Program is offered full-time and part-time, therefore, it is possible for full-time students to choose between two distinct profiles (thesis and paper-based)
- **Weaknesses**
 - Program lacks a clear vision
 - Program does not have a succession plan for the two current program leaders
 - Computer Science does not have a well-defined role in the program which raises the issue of whether they should continue as a full partner or explicitly take on a service/support role

The Program Director and Dean submitted an in-depth response to the Reviewers' Report outlining the strategies the program will use to address each of the Reviewer's recommendations (see below). This Final Assessment Report was prepared by the Quality Assurance Committee. The 18 month report will show progress against items addressed in this review. The program has been approved to continue and is scheduled for its next full review in eight years.

Summary of the Reviewers' Recommendations with the Program Director and Dean's Responses & Follow Up Process

Recommendation #1: A visioning exercise should be organized in the very near future to tackle the issue of the program vision and related issues.

Response: This recommendation was said to need broad support and buy-in from involved faculty, staff, and administration. A formal visioning exercise was proposed for June 25, 2013 in

order to prioritize these questions and tackle the mission and vision of the program and general future directions.

Responsibility for following up: Program Director with input from senior management

Timeline: First session is scheduled for June 25 2013. Update at 18 month report.

Recommendation #2: An action oriented plan for developing and/or finding suitable successors for the two current leads of the program should be formulated and acted upon in the very near future.

Response: It was decided that the succession issue would be addressed during the visionary exercise scheduled for June 25 2013. The Program does believe that the future and success of the eHealth Program at McMaster University will largely depend on its leaders. Planning for succession must also be initiated by higher level administration and representatives from all three faculties.

Responsibility for following up: Senior administration with advice from Program Director and program coordinators

Timeline: Fall 2013. Update at 18 month report.

Recommendation #3: Increased efforts should be made to recruit more students with computer science backgrounds to the program to enhance its interdisciplinary nature.

Response: There is strong support for the goal of full and equal involvement for CAS and Engineering in the Program. The CAS Graduate Curriculum and Policy Committee will develop a plan for how increased recruitment can be tied in with advertisement of the Computer Science and Software Engineering graduate programs. The CAS Program Coordinator will work together with the eHealth Career Development and Relationship Associate to identify venues for recruitment, contacting alumni, employers, etc. This planning is already in place and the program plans to attend recruitment fairs at McMaster and at other universities.

Responsibility for following up: CAS and engineering senior management. CAS Graduate Curriculum and Policy Committee in conjunction with eHealth program as needed.

Timeline: Plan to attend recruitment fairs for the academic year 2013-2014. Update at 18 month report.

Recommendation #4: More core faculty members should be directly engaged to teach and supervise students and the lack of participation from computer science faculty should be particularly addressed.

Responsibility for following up: Program Director and CAS

Timeline: Late 2013, early 2014. Update at 18 month report.

Recommendation #5: An action oriented plan for resolving the role of computer science in the program should be formalized and acted up on in the very near future.

Response to Recommendations 4&5: New eHealth faculty members (100% tenure track CLA position for late 2013 or early 2014 is at the approval stage from the Provost) will be the main connection to eHealth. Two new faculty members recently hired in CAS have an interest in eHealth and can bring their expertise to courses and student supervision. Discussion within

CAS of expanding the connection to eHealth will also need to continue. Finally, in the early summer of 2013, eHealth will survey health sciences faculty to ascertain their involvement in more teaching and address the issue of more team teaching opportunities. This topic will also be featured in the visioning exercise.

Responsibility for following up: CAS

Timeline: Update at 18 month report

Recommendation #6: Accessibility of eHealth students to computer science and health sciences courses should be improved.

Response:

- (1) *Increase participation of eHealth students in CAS courses:* Under the lead of the new eHealth faculty member (tenure track, 100%), CAS will develop two eHealth courses (CAS 757 which is a core eHealth course plus a new course) that address the topics of user acceptance and interoperability as highlighted by the reviewers, including hands-on technical knowledge and skills. The CS prerequisites for admission into the program are continuously revisited with the goal of ensuring that incoming students have the background for taking certain CAS courses. Finally, CAS Graduate Curriculum and Policy Committee will identify graduate courses that can be made more accessible to eHealth students, revisits their prerequisites, and suggest scheduling them such that part-time students can take them easier (since about one-third of eHealth students study part-time).

Responsibility for following up: CAS

Timeline: Update at 18 month report

- (2) *Problems enrolling in Health Research Methodology (HRM) courses:* HRM courses are traditionally oversubscribed and inaccessible. eHealth students have the same access to course registration as HRM students to enroll in HRM courses. The program indicates that nothing can be done to increase registration in HRM courses for our students beyond stating their need for space to the HRM administration and encouraging eHealth students to register for courses early.

Responsibility for following up: Program Director and supervisors

Timeline: Update at 18 month report

Recommendation #7: Interventions to enhance students' perceived identity with the program should be developed and implemented.

Response: For physical space there used to be a dedicated room for eHealth students in the School of Business but that is no longer available. The program does agree that this needs to be addressed has tasked TIPs Task Force with this issue.

Responsibility for following up: Senior administration

Timeline: July 2013

Recommendation #8: A stronger and more formalized mentorship element should be introduce to the program to help students map out better course plans in this highly flexible program.

Response: With the implementation of a new governance plan, the committee in charge of assigning supervisors to students can do that assignment earlier in each student's program (i.e. in September to October of their first term in the program), so students will be able to begin interacting with their supervisors earlier and develop plans for their research work well before they leave for their internships. This will also spread the supervision load more evenly across available supervisors.

Responsibility for following up: eHealth program and new governance structure implementation

Timeline: Update at 18 month report

Recommendation #9: More team and collaborative teaching should be included in the program to strengthen its interdisciplinary nature for both students and faculty.

Response: All partners consider team-teaching an eHealth course, so as to give students within a single course an overview of a number of core Computer Science topics.

Responsibility for following up: Program, Departments & Instructors

Timeline: Update at 18 month report

Recommendation #10: The curriculum should include more hands-on technical skills.

Response: The program highlights that skills are embedded within courses and also featured during weekly seminars although the program agrees that these may not be the best way to manage skills acquisition.

Responsibility for following up: Program Director, and Curriculum Committee

Timeline: Update at 18 month report

Recommendation #11: The feasibility of providing more equitable financial support for different categories of students should be investigated and implemented if appropriate.

Response: Financial support and distribution can be revisited, now that program enrolment is much higher than in the beginning. The program will seek input from other programs, which have both a thesis and internship component to see how best to address this recommendation.

Responsibility for following up: Program with input from other programs and senior administration

Timeline: Update at 18 month report

Additional concerns (itemized below) were raised by reviewers and also addressed in the response package:

1) More formal recognition of faculty contribution to eHealth program

Response: The program agrees with that this needs to be the case.

Responsibility for following up: Senior administration, especially related to the TIPS report and its implementation.

Timeline: Visioning exercise; June 25, 2013.

2) Institution of new governance structure

Response: Program agrees that the new structure is needed especially in relation to broadening the foundation of student supervision and faculty involvement. The new governance

structure has been approved by the Faculties of Engineering and Business. The new structure also needs to be re-reviewed by the Faculty of Health Sciences Executive Committee in mid 2013.

Responsibility for following up: eHealth Program implements the new governance document. Input will be sought through the visioning task.

Timeline: Summer of 2013

3) Electives are not eHealth specific

Response: Although the program agrees, they believe that this need for eHealth electives must be balanced with resource issues.

Responsibility for following up: Program and Visioning exercise

Timeline: Visioning exercise; June 25, 2013.

4) Consider additional courses

Response: The program is now considering new courses planned in patient safety, health analytics and imaging but their offering will largely depend on resource availability and enrolment. At this time, a graduate course is being introduced in the Marketing Area in Marketing Analytics, and eHealth students will be able to take advantage of this course. In addition another course offered by the Information Systems Area is Data Mining, which is taken regularly by a number of our students. Depending on the demand, expertise is available to offer a course in Health Analytics, but such a course might be seen as competing with the Marketing Analytics course.

Responsibility for following up: Program, Visioning task, Advisory Board

Timeline: Not defined

5) Variable quality of professors, feedback on course content, large amounts of group work, and grading of assignments.

Response: Faculty members will be asked to include specific guidelines in their course outlines on group interaction and expectations. Core courses are monitored continuously and adjustments are made as needed. The program has stated it will continue to do this review. Students will be surveyed to determine which courses this comment refers to.

Responsibility for following up: Program and Instructors

Timeline: Ongoing

6) Lack of online courses

Response: Program agrees that this is an area that needs to be addressed as more students want this option and the Southern Ontario landscape is becoming saturated with eHealth/Informatics programs at all levels.

Responsibility for following up: Program and Visioning exercise

Timeline: Visioning exercise; June 25, 2013.

7) Shortness of thesis writing period

Response: The program plans to address the issue of timing at least partially through the new governance process so that thesis students can become more engaged before they leave for their internships, which will help considerably, especially since many already choose to do their scholarly papers or theses based on experience in their internship assignments.

Responsibility for following up: Program and new committees from the governance implementation.

Timeline: Summer 2013

8) No educational objectives for the internship

Response: Program will create educational objectives in conjunction with the Internship and Relational coordinator and the new committees.

Responsibility for following up: Program

Timeline: Not defined.

FINAL ASSESSMENT REPORT

Institutional Quality Assurance Program (IQAP) Review

PhD in Health Policy

Date of Review: April 25 – 26, 2013

Review Team Members: Dr. Wendy Thomson, McGill University

Dr. Mark Schlesinger, Yale University

Dr. Violetta Ighneski, McMaster University

In accordance with the McMaster's Institutional Quality Assurance Process (IQAP), this final assessment report provides a synthesis of the external evaluation and the internal response and assessments of the graduate program delivered by Health Policy. This report identifies the significant strengths of the program, together with opportunities for program improvement and enhancement, and it sets out and prioritizes the recommendations that have been selected for implementation.

This Final Assessment Report includes an Implementation Plan that identifies who will be responsible to lead the follow up for the proposed recommendations; any changes in organization, policy or governance that will be necessary to meet the recommendations; and timelines for acting on and monitoring the implementation of those recommendations.

Executive Summary of the PhD in Health Policy Cyclical Program Review

The McMaster PhD in Health Policy is an interdisciplinary program that is offered in collaboration with the Faculties of Health Sciences, Social Sciences, Humanities and Business. The PhD in Health Policy program admitted its first cohort of students for the 2008-09 academic year and submitted a self-study to the School of Graduate Studies on April 10, 2013. The self-study presented the program descriptions and learning outcomes, an analytical assessment of the program including the data collected from students along with the standard data package prepared by the Office of Institutional Research and Analysis. Appended were the course outlines for all courses in the program and the CVs for each full-time faculty member in the program.

Two arm's-length reviewers (Dr. Wendy Thomson, McGill University and Dr. Mark Schlesinger, Yale University) and one internal reviewer (Dr. Violetta Ighneski, McMaster University) participated in a two-day site visit organized by the School of Graduate Studies. The visit consisted of separate meetings with students (pre-comp, post-comp and international exchange students), and faculty members in addition to the Provost, Associate VP & Dean of Graduate Studies, Graduate Associate Dean (Health Sciences), Associate VP (Academic,

Health Sciences), Graduate Associate Deans of Social Sciences & Business, Dean of Social Sciences, PhD Program Director, Chair CE&B, Department Heads, and support staff. The Review Team submitted then their report on June 12, 2013. The reviewer's acknowledged that the Health Policy PhD program has exemplified an interdisciplinary foundation which is to the program's credit. The review team judged the educational requirements and learning objectives for the Interdisciplinary Ph.D. in Health Policy to be quite clear, and fully consistent with the the Graduate Degree Level Expectations. However, reviewers do note that awareness of the program and its accomplishments seemed to have lagged behind, both among faculty around the university and within University administration. The review of students' performance and conversations with both students and program faculty highlighted the calibre of the students which have been admitted to the program. Student surveys conducted as part of the self-study and independent meetings held with students all suggest that the quality and availability of graduate supervision is generally strong and in some cases exceptional.

The site visit identified several logistical problems that consistently emerged for students. Some issues related to academic advising, while other issues related to inconsistent offering of courses from different departments at the university – in ways that students were unable to anticipate. The review team notes that many of the challenges are inherent to the interdisciplinary nature of the program and make the recommendation to consider refinements to the current governance arrangements which are addressed in the implementation plan outlined below. Other reviewer recommendations respond, *inter alia*, to the areas for improvement and enhancement identified in the program's self-study report and which are already underway. The following program strengths and weakness were also noted:

- **Strengths**
 - Experiential education
 - High capacity to connect academe to a broader community
 - Integration of global perspectives and students
 - Highly engaged and capable students
 - Highly productive and deeply committed core faculty
 - Program's leadership
 - Program exemplifies ways in which those strategic goals can be recognized
- **Weaknesses**
 - Imbalanced core curriculum
 - Comprehensive exams do not facilitate students' transition to thesis writing
 - Incomplete integration with the rest of McMaster's faculty and academic programs

In its response to the reviewers (September 4, 2013), the Program generally embraced the review team's recommendations, while noting some of the obstacles to their implementation. The Deans' response (October 20, 2013) is likewise generally positive, though it does emphasize that none of the issues identified are "of substantive concern". The Quality Assurance Committee concurs with the Program's assessment and recommends that subject to

receipt of a satisfactory 18 month report, no additional program review is to be scheduled prior to that required in the academic review cycle

Summary of the Reviewers' Recommendations with the Department's and Dean's Responses & Follow Up Processes

Recommendation #1: Better articulate the case for an interdisciplinary model of education that reaches beyond the mix of disciplines within the Faculty of Health Sciences to incorporate the Social Sciences, Humanities, Science and Business Faculties. This rationale has not been effectively conveyed throughout McMaster. Establish stronger connections (and working relationships) with students and faculty affiliated with other policy-oriented doctoral programs around campus.

Response: The Program is in agreement and intends to promote the interdisciplinary aspects of its educational design which distinctively interlaces multiple Faculties throughout McMaster. Development and membership of an Advisory Committee will be pursued by inviting Deans (or Associate Deans) to join in annual discussions and engage in the program's developments, while equally deepening their understanding of the program through scheduled meetings. Such a meeting was successfully held last year with the Associate Deans, the Program Director and the Program Administrator. This was found to be productive and will be pursued as an annual process for engaging and informing affiliated Faculties.

Responsibility for following up: Associate Deans, Program Director and Program Administrator

Timeline: Begun in 2012 and will continue annually

Recommendation #2: Establish some alternative arrangements that could provide financial support for those applicants who match to faculty who do not have external funding (i.e. fellowship, pooling funds, etc). Build more active connections with departments where there is less of a track record for supervising health policy students, so that both departments and affiliated faculty are aware of the terms in the Memorandum of Understanding that channel funding to departments currently serving health policy students.

Response: The proposal of pooling research funding is not feasible under current Tri-Council funding agreements. In order to expand, the program will need alternate funding sources and is considering how financial support of on-going students whose faculty are not able to provide the expected support may be developed. This will be addressed with Faculty Deans to consider new and existing sources of funding that can engage more interdisciplinary faculty involvement in student supervision.

Responsibility for following up: Program Director

Timeline: Update at 18 month report

Recommendation #3: The program initiates a strategic planning process to rethink the field of social organization.

Response: Program agrees that it must fundamentally re-examine the Social Organization field, and states that this is a priority issue for the coming year. The Program has already taken the following steps to address this:

- Identified and appointed a knowledgeable Theme Leader in 2012
- Theme Leader will accommodate, in an appropriate course, all students preparing to write the breadth comprehensive exam in December 2013
- A new Social Organization reading list has been created for the comprehensive exams

- This process will be evaluated and updated in the spring of 2014
- The Social Org Theme Leader will work with the Executive Committee, the Program Director and the Program Administrator to articulate a clear scope and content for the field
- Members of faculty and courses will be recruited and identified to provide a solid and resilient foundation of courses, supervisors and other resources for students

Responsibility for following up: Program Director and Theme Leaders

Timeline: Begun in 2012. Evaluation and update in 2014.

Recommendation #4: The program identifies one methods course that could provide a broader common foundation for all students in the program.

Response: The program thinks this is an interesting idea and will examine these options during the coming year to assess the content and additional resources that would be required for creating a new course or to adapt present courses to accommodate the additional material.

Responsibility for following up: Program's Advisory Board

Timeline: Update at 18 month report

Recommendation #5: Consider replacing the current breadth section of the comprehensive exam with an exam more focused on a substantive issue that each student has identified as an arena for their doctoral work. This substantive topic could serve as a context for exploring the interface between policy and health (care) outcomes for example.

Response: The program is not convinced that the breadth exam should be eliminated but they acknowledge that the comprehensive exam process needs further refinement. The program is in the process of reviewing all 3 comprehensive exams, their related processes and reading lists.

Responsibility for following up: Program Director and Associate Deans of Graduate Studies

Timeline: Update at 18 month report

Recommendation #6: Consider centralizing responsibility for student advising, either under the auspices of an additional faculty member who would be designated PhD Advisor, an established position in some other departments at McMaster.

Response: The Program understands the underlying rationale for this recommendation, but feels that it can be better addressed by adjusting existing mechanisms in the following ways:

- The Director, and the program Administrator, can work in partnership with each student's primary supervisor to oversee course advice.
- The Director can engage Department Chairs in order to share information about course offerings, anticipated leaves etc. that can affect the ability of students to plan their coursework appropriately.
- The Program Administrator will contact Departments on a regularly scheduled basis to identify courses that will not be offered in a given year due to faculty leaves and departures.

Responsibility for following up: Program Director and Program Administrator

Timeline: Update at 18 month report

Recommendation #7: Changing the formal governance structure, with the current Advisory Committee being transformed into an Executive Committee of comparable size that would maintain authority over curriculum and program policies. Expand the Advisory Committee to include key representatives from other Faculties, departments that operate similar policy oriented doctoral programs, and other key stakeholders from around campus.

Response: The current Advisory Board will be retitled Executive Committee, as recommended. The Program has agreed to re-structure their governance to reflect this recommendation. Program also agrees that all Faculty and department relationships with the program should be strengthened and has taken the following steps:

- Implement an annual complete faculty retreat
- An agenda item for discussion will be: guiding all field faculty members through a student's prototype curriculum during the first 2 years, i.e., an exercise in mapping out a field planning rubric.
- Smaller meetings over the year for field faculty will also be considered

Responsibility for following up: Program Director

Timeline: Update at 18 month report