CONTENTS

Introduction .................................................................................................................................................. 02
Approach to the Evaluation ......................................................................................................................... 04
Methodology/Sources of Data ....................................................................................................................... 10
  Internal Sources of Data .............................................................................................................................. 15
  External Sources of Data .............................................................................................................................. 27
Internal/External Sources of Data .................................................................................................................. 29
Bibliography .................................................................................................................................................. 30

List of Tables and Figures

Figure 1: UGME Program Evaluation Model ............................................................................................. 08
Figure 2: Data Sources for the Preclerkship Level ...................................................................................... 12
Figure 3: Data Sources for the Clerkship Level ........................................................................................... 13
Figure 4: Data Sources for the Overall Curriculum .................................................................................... 14
Figure 5: Course Evaluation Process .......................................................................................................... 16
Figure 6: Rotation Evaluation Process .......................................................................................................... 19
Figure 7: Instructor Evaluation Process for Preclerkship ............................................................................ 22
Figure 8: Instructor Evaluation Process for Clerkship ............................................................................... 23

Table 1: Sources of Data for the UGME Program Evaluation Strategy ............................................................ 10
INTRODUCTION

BACKGROUND TO THE UGME PROGRAM
The College of Medicine at the University of Saskatchewan offers a four-year undergraduate medical education program.

The curriculum is under the direction of the Curriculum Committee, which reports directly to the Faculty Council of the College of Medicine.

Years One and Two of the program run from late August to May. Clerkship begins in third year.

Year Three runs from August to August the following year, followed immediately by Year Four from August through April.

PURPOSE OF THE EVALUATION
This evaluation strategy is implemented by the Program Evaluation Sub-Committee, a sub-committee of the Curriculum Committee that reports to the Curriculum Committee Chair.

MANDATE:
To establish formal, ongoing program evaluation procedures to demonstrate the extent to which the College of Medicine is achieving its educational objectives. This strategy complies with Accreditation elements 8.4 and 8.5, which pertain to evaluation of program effectiveness, as stated below:

8.4. A medical school collects and uses a variety of outcome data, including national norms of accomplishment, to demonstrate the extent to which medical students are achieving the medical education program objectives and to enhance the quality of the medical education program as a whole. These data are collected during program enrollment and after program completion.

8.5. In evaluating medical education program quality, a medical school has formal processes in place to collect and consider medical student evaluations of their required learning experiences, teachers, and other relevant aspects of the medical education program.
INTRODUCTION

To achieve these elements, several sources of data are gathered, including measurement of student satisfaction of their courses, clerkship rotations, and instructors as well as outcome data from a variety of sources that will be used by the Curriculum Committee, its sub-committees, and Year and other committees and working groups in curriculum design.

Our Statement of Educational Philosophy (March 2010) states, “We will use the most advanced and effective practices of evaluation to determine at both the course and program levels the extent to which (a) the intended curriculum has been implemented and (b) goals and objectives of our program have been realized.”

OBJECTIVES:

- Provide on a regular basis a variety of high quality and timely (a) outcome data and analyses (including national examinations of accomplishment) and (b) student evaluations of courses, clerkships, and instructors to the Curriculum Committee so that it may:
  - monitor the extent to which the planned changes to the UGME curriculum have been implemented.
  - ensure that current and future curriculum changes meet program goals and objectives.

- Monitor the implementation of the UGME Program Evaluation Strategy.
KEY PRINCIPLES

The development and implementation of the UGME Program Evaluation Strategy is based on the following key principles:

Collaborative
The strategy presented in this document takes a collaborative approach to the evaluation of the UGME Program. The evaluation has been, and will continue to be, a negotiated process (Guba & Lincoln, 1989; Louie, Byrne, & Wasylenki, 1996; O’Sullivan, 2004). It is characterized by a significant degree of collaboration among key stakeholders including administration, faculty, and students in both its development and implementation (Cousins, Donohue, & Bloom, 1996; Stern, 1996). Because responsibility and decision making is shared by key stakeholders, the evaluation is responsive to the needs of the UGME Program as well as those of program stakeholders (O’Sullivan, 2004). It is anticipated that this collaborative approach will result in increased stakeholder cooperation and involvement in the evaluation and receptivity to the findings and will serve to build evaluation capacity within the College of Medicine.

Centralized
This strategy involves a centralized system administered through the Undergraduate Medical Education Office. It should be noted that the evaluation of the UGME Program is the responsibility of the MD Program Evaluation Sub-Committee, which reports directly to the Curriculum Committee. The centralization of the evaluation process will facilitate the overall evaluation of the undergraduate curriculum as well as curricular change (Gerrity & Mahaffy, 1998).

Reflective
The UGME Program Evaluation Strategy is designed to promote reflective practice. As part of the reflective process, Year Chairs and Course Directors are required to respond to student feedback. In this way, the evaluation will be central to curricular change and ongoing program development (Hendry, Cumming, Lyon, & Gordon, 2001; Louie et al., 1996; Spratt & Walls, 2003).
APPRAOH TO THE EVALUATION

**Student Involvement**
Similar to evaluation strategies currently employed by the University of Manitoba and the University of British Columbia, the UGME Program Evaluation Strategy is characterized by considerable student involvement. As such, it facilitates curricular improvement and student learning through the integration of the curriculum planning and change processes (Louie et al., 1996). Students are actively involved in the ongoing evaluation and monitoring of courses and clinical rotations. They are encouraged to express their opinions and to provide feedback on content and pedagogical strategies as well as to make suggestions for improving the exchange of information.

**Timely**
The importance of acknowledging and responding to feedback in a timely fashion is recognized by the evaluation strategy (Hendry et al., 2001). As well, the evaluation system supports staff development by providing practical, timely feedback to faculty. Information about the implementation and outcomes of the UGME Program will be communicated to key stakeholders, including program administrators, faculty and students, on a regular basis (Smith, Herbert, Robinson, & Watt, 2001; Stern, 1996; University of Saskatchewan, 2002).

**Reliable and Valid**
In order to ensure the reliability and validity of the findings of the evaluation of the UGME Program, data and methodological triangulation will be employed (Coombes, 2000; Milburn, Fraser, Secker, & Pavis, 1995; Whitman & Cockayne, 1984). Data will be examined from different sources and over time and a combination of qualitative and quantitative research methods will be used. In addition, all evaluation instruments will be designed in consultation with key stakeholders. Summary reports will be reviewed by key stakeholders in order to validate the findings.

**Professional Standards**
Our Statement of Educational Philosophy (March 2010) states, “We will use the most advanced and effective practices of evaluation to determine at both the course and program levels the extent to which (a) the intended curriculum has been implemented and (b) goals and objectives of our program have been realized.”
The evaluation of the UGME Program is therefore guided by the standards established by the Joint Committee on Standards for Educational Evaluation (Fitzpatrick, Sanders, & Worthen, 2004; Issel, 2004; Joint Committee on Standards for Educational Evaluation, 1994). Specifically, the evaluation will be: (1) informative, timely, and will meet the needs of key stakeholders (Utility Standard); (2) realistic, prudent, diplomatic, and economical (Feasibility Standard); (3) conducted legally and ethically protecting the rights of those involved (Propriety Standard); and (4) comprehensive and will communicate the findings accurately and appropriately (Accuracy Standard).

**METAEvaluation**

The UGME Program Evaluation Strategy will be monitored on an ongoing basis by the MD Program Evaluation Sub-Committee to ensure that: (1) the design is feasible; (2) activities are completed as planned and in a timely manner; and (3) instruments and products (data and reports) are of high quality (Fitzpatrick et al., 2004; Scriven, 1991). The strategy will be modified as needed and as appropriate.
APPROACH TO THE EVALUATION

EVALUATION MODEL
The model developed for the purpose of the evaluation of the UGME Program (see Figure 1) provides for the collection of formative (process and outcome) as well as summative (outcome) data. Formative data will be used to monitor the process of curricular change, to suggest and support additional changes to the curriculum, and to help understand what was done to achieve program outcomes by identifying gaps between program outcomes and implementation objectives (Gerrity & Mahaffy, 1998; O’Sullivan, 2004; Scriven, 1991). Furthermore, process evaluation data will provide a context for interpreting the findings of the outcome and impact evaluation (Issel, 2004). On the other hand, formative outcome evaluation data will primarily serve to answer the question (Nestel, 2002; Patton, 1998) - To what extent were the outcome objectives of the UGME Program achieved? It is anticipated that all formative data will be timely, concrete, and useful. Findings will be communicated to program administrators, faculty, and students on a regular basis.

Summative evaluation data will assist program administrators when making judgments about the overall merit (or worth) of the UGME Program and to assess the achievement of outcome objectives (Fitzpatrick et al., 2004; O’Sullivan, 2004; Rossi, Freeman, & Lipsey, 1999). These data may also be used, for example, to determine the generalizability of curricular changes, the need for further restructuring of the curriculum, and/or the allocation of resources (Rossi et al., 1999; Scriven, 1991). Summative data will be used by external evaluators for accreditation purposes.
FIGURE 1 - UGME PROGRAM EVALUATION MODEL

**Program Objectives**
- UGME Program Learning Objectives

**Program Implementation**
- Course/Clerkship Objectives
- Course/Clerkship Delivery

**Program Outcomes**
- Outcomes (Immediate and Intermediate)
- Unanticipated Outcomes

**Sources of Data**
- Student Feedback
- Faculty Feedback
- Student Performance
- Student Feedback
- Faculty Feedback
- MCCQE I
- AFMC Graduation Questionnaire
- Program Learning Objectives Self-Assessment
- Program Efficacy Review

**Type of Evaluation**
- Formative Evaluation
- Summative Evaluation
APPROACH TO THE EVALUATION

This strategy will consist primarily of process and outcome evaluations. However, some specific sources of data will also assess the unmet needs of medical students, reflecting needs assessment. The three evaluation components are discussed below.

**Needs Assessment**

Needs assessments will help to identify and measure the level of unmet needs within the UGME program at the U of S. Essentially, needs assessments will detect areas in which students may need additional training or preparation. Measures which may help detect areas of unmet need include the Program Learning Objectives self-assessment (i.e., items which receive low overall ratings may be areas of unmet need), Program Efficacy Review data, and comments provided through the SCRC and SMSS.

**Process Evaluation**

Process evaluation components of the evaluation framework will determine the extent to which the UGME curriculum is being implemented as intended. Specifically, this will examine the extent to which various intended aspects of the UGME program are:

- actually being delivered
- to the intended students
- in the intended amount
- at the intended level of quality

Specifically, the intended and actual goals, objectives, inputs, activities, and outputs of the UGME will be identified. Then, any discrepancies between what is intended and what is actually delivered will be highlighted. Measures included in the process evaluation component of this framework include course evaluations, the Program Efficacy Review, and feedback from the SCRC.

**Outcome Evaluation**

Outcome evaluations measure the extent to which students are achieving various outcomes in accordance with the UGME’s goals and objectives. Such outcomes may include performance on the MCCQE, achievement of the College’s Program Learning objectives as measured through multiple sources of data collated into the Program Efficacy Review.
### METHODOLOGY/SOURCES OF DATA

<table>
<thead>
<tr>
<th>SOURCES OF DATA</th>
<th>NEEDS ASSESSMENT</th>
<th>PROCESS EVALUATION</th>
<th>OUTCOME EVALUATION</th>
<th>TIMELINE</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>INTERNAL SOURCES OF DATA</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Course Evaluations</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>Yearly, unless otherwise specified</td>
</tr>
<tr>
<td>Rotation Evaluations</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>After every rotation</td>
</tr>
<tr>
<td>Instructor Evaluations</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>As per accompanying course/rotation unless otherwise specified</td>
</tr>
<tr>
<td>Program Learning Objectives</td>
<td>✔</td>
<td></td>
<td>✔</td>
<td>Post core rotations</td>
</tr>
<tr>
<td>Self-Assessment</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Narrative Feedback</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>Yearly, as requested</td>
</tr>
<tr>
<td>End of Year Evaluations Completed by Students</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>Yearly</td>
</tr>
<tr>
<td>Feedback on Residency Performance of Graduates</td>
<td>✔</td>
<td></td>
<td></td>
<td>Yearly</td>
</tr>
<tr>
<td>SCRC</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>Ongoing</td>
</tr>
<tr>
<td>Grade Comparisons between Campuses</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>Ongoing</td>
</tr>
</tbody>
</table>
## METHODOLOGY/SOURCES OF DATA

<table>
<thead>
<tr>
<th>SOURCES OF DATA</th>
<th>NEEDS ASSESSMENT</th>
<th>PROCESS EVALUATION</th>
<th>OUTCOME EVALUATION</th>
<th>TIMELINE</th>
</tr>
</thead>
<tbody>
<tr>
<td>EXTERNAL SOURCES OF DATA</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>MCCQE Part I</td>
<td></td>
<td></td>
<td>✔</td>
<td>Yearly</td>
</tr>
<tr>
<td>AFMC Graduation Questionnaire</td>
<td>✔</td>
<td></td>
<td></td>
<td>Yearly</td>
</tr>
<tr>
<td>AFMC Entry and Preclerkship Surveys</td>
<td>✔</td>
<td>✔</td>
<td></td>
<td>Yearly</td>
</tr>
<tr>
<td>CAPER Data for match results, specialty choices, practice location, and licensure rates</td>
<td></td>
<td>✔</td>
<td>✔</td>
<td>Yearly</td>
</tr>
<tr>
<td>CPSS data for Practice Location</td>
<td></td>
<td></td>
<td>✔</td>
<td>Yearly</td>
</tr>
<tr>
<td>INTERNAL/EXTERNAL SOURCES OF DATA</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Predicting MCCQE I Performance</td>
<td>✔</td>
<td></td>
<td></td>
<td>Every 3rd Year unless Significant changes to the Program</td>
</tr>
<tr>
<td>Program Efficacy Review</td>
<td>✔</td>
<td>✔</td>
<td>✔</td>
<td>Yearly</td>
</tr>
</tbody>
</table>
### FIGURE 2 - DATA SOURCES AT THE PRECLERKSHIP LEVEL

<table>
<thead>
<tr>
<th>Data Source</th>
<th>Approximate Date of Report</th>
<th>Recipients</th>
<th>Actions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course Evaluations</td>
<td>January &amp; June</td>
<td>Course/module director, Course Chair, Year Chair, Associate Dean, Undergraduate Medical Education, Director Academic, Assistant Dean Curriculum, Director Quality, Chairs of the Curriculum Delivery, Assessment and Curriculum Quality Review Sub-Committees, other relevant stakeholders at both sites.</td>
<td>Course/module director completes response form. Response form provided to Course and Year Chairs and other relevant stakeholders. Results reviewed at Year Committee meetings. Responsibility for follow-up and implementation lies with Course teams/Year Sub-Committees. Results included in CQRSC course reviews.</td>
</tr>
<tr>
<td>Aggregate Instructor Evaluations</td>
<td>January &amp; June</td>
<td>Individual instructors, Most Responsible Planner (MRP) at appropriate site. Other stakeholders as necessary for flagged evaluations</td>
<td>For flagged evaluations: MRP or other individual such as Director Academic address issue. MRP completes response form.</td>
</tr>
<tr>
<td>Individual Instructor Evaluations</td>
<td>February &amp; July</td>
<td>Year Chair, Associate Dean, Undergraduate Medical Education, Director Academic, Assistant Dean Curriculum, Director Quality, Chairs of the Curriculum Delivery, Assessment and Curriculum Quality Review Sub-Committees, other relevant stakeholders at both sites.</td>
<td>Reports discussed at Year and Curriculum Committee meetings as appropriate.</td>
</tr>
<tr>
<td>Year 1 and 2 Overall Evaluations</td>
<td>June</td>
<td>Year Chair, Associate Dean, Undergraduate Medical Education, Director Academic, Assistant Dean Curriculum, Director Quality, Chairs of the Curriculum Delivery, Assessment and Curriculum Quality Review Sub-Committees, other relevant stakeholders at both sites.</td>
<td></td>
</tr>
</tbody>
</table>


Rotation director completes response form. Response form provided to Course and Year Chairs, and other relevant stakeholders.

Results reviewed at Clerkship Committee meetings. Responsibility for follow-up and implementation lie with rotation/course teams/Year Sub-Committees.

Results included in CQRSC course reviews.

**FIGURE 3 - DATA SOURCES AT THE CLERKSHIP LEVEL**

<table>
<thead>
<tr>
<th>Data Source</th>
<th>Approximate Date of Report</th>
<th>Recipients</th>
<th>Actions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rotation Evaluations</td>
<td>February &amp; August</td>
<td>Rotation director/coordinators, Year 3 Chair, Associate Dean, Undergraduate Medical Education, Director, Academic, Assistant Dean Curriculum, Director Quality, Department Head, Chairs of the Curriculum Delivery, Assessment and Curriculum Quality Review Sub-Committees, other relevant stakeholders at all sites.</td>
<td>Rotation director completes response form. Response form provided to Course and Year Chairs, and other relevant stakeholders. Results reviewed at Clerkship Committee meetings. Responsibility for follow-up and implementation lie with rotation/course teams/Year Sub-Committees. Results included in CQRSC course reviews.</td>
</tr>
<tr>
<td>Aggregate Instructor Evaluations</td>
<td>February &amp; August</td>
<td>Other stakeholders as necessary for flagged evaluations.</td>
<td>For flagged evaluations: MRP or other individual such as Director Academic address issue. MRP completes response form.</td>
</tr>
<tr>
<td>Individual Instructor Evaluations</td>
<td>July</td>
<td>Individual instructors, Most Responsible Planner (MRP) at appropriate site.</td>
<td></td>
</tr>
<tr>
<td>Year 3 and 4 Overall Evaluations</td>
<td>August</td>
<td>Year Chair, Associate Dean, Undergraduate Medical Education, Director Academic, Assistant Dean Curriculum, Director Quality, Chairs of the Curriculum Delivery, Assessment and Curriculum Quality Review Sub-Committees, other relevant stakeholders at all sites.</td>
<td>Year Chair disseminates and acts on information as appropriate.</td>
</tr>
</tbody>
</table>

Approximate Date of Report:
- Feb & Aug for Rotation Evaluations
- Feb & Aug for Aggregate Instructor Evaluations
- July for Individual Instructor Evaluations
- Aug for Year 3 and 4 Overall Evaluations
## Figure 4 - Data Sources for the Overall Curriculum

<table>
<thead>
<tr>
<th>Data Source</th>
<th>Approximate Date of Report</th>
<th>Recipients</th>
<th>Actions</th>
</tr>
</thead>
<tbody>
<tr>
<td>AFMC Graduation Questionnaire</td>
<td>November</td>
<td>Program Evaluation Sub-Committee, Curriculum Committee, Associate Dean Undergraduate Medical Education, Director, Academic, Assistant Dean Curriculum, Director, Quality, other appropriate stakeholders</td>
<td>Results discussed at Curriculum Committee meetings and other relevant meetings (i.e., Year Committees and other subcommittees)</td>
</tr>
<tr>
<td>MCCQE I</td>
<td>February</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Program Learning Objectives Self-Assessment</td>
<td>September</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grade comparisons for Regina/Saskatoon</td>
<td>July</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Feedback on Residency Performance of Graduates</td>
<td>September</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Match Results, specialty choices, practice location, and licensure rates</td>
<td>September</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
INTERNAL SOURCES OF DATA

Course Evaluations
In compliance with Accreditation element 8.5, a formal process of collecting and using student evaluation data has been established. Each course is evaluated every year, unless otherwise requested. The evaluation form is administered to students using One45. Whenever feasible, dedicated class time is set aside for students to complete evaluations and forms are usually left open for four weeks to help ensure high response rates.

An evaluation report is generated and sent to the Course Director, Course Chair, the appropriate Year Chair, the Associate Dean, Undergraduate Medical Education, Director, Academic, Assistant Dean Curriculum, the Director, Quality, the Chairs of the Curriculum Delivery, Assessment, and Curriculum Quality Review Sub-Committees as well as other appropriate personnel at relevant sites. The Chair of the Assessment Sub-Committee is also sent a file listing courses that may have assessment concerns. For courses with students in multiple sites, responses given by students at different sites are compared, which meets the conditions of Accreditation element 8.7. A summary comparative document of course evaluations is shared with the Year Committees and Curriculum Committee following each term/year completion. A course director response form is completed by the person most responsible for the course/module. Appropriate Course and Year Chairs review the director response forms and provide a response. Proposed major changes that impact curricular mapping are made through consultation with of the Curriculum Specialist are brought to the Year Committee for approval. Once approved by the Year Committee, changes are then submitted to the Curriculum Quality Review Sub-Committee (CQRSC) for approval. Once approved by the CQRSC, recommendations are presented to the Curriculum Committee. If approved, the changes are then implemented. Responsibility for follow-up and implementation lie with Course teams/Year Sub-Committees.

The roles and responsibilities of key stakeholders are summarized below as are the sequential steps involved in the course evaluation process (Figure 5):
FIGURE 5 - COURSE EVALUATION PROCESS

Program Evaluation Sub-Committee

Questions decided for course evaluations

Undergraduate Medical Education Office

Survey generated on One45

Review Process/Trends

Course evaluation data collected

Report sent to relevant stakeholders

Course evaluation report generated once survey is closed

Evaluation findings discussed at appropriate Course Team and Year Committee Meetings

Course Director completes response form

Course/Year Chairs review and respond

No course changes

No course changes

Minor course changes

Major course changes

Major course changes

Curriculum change proposal

Course/module Director or Year Chair works with Curriculum Specialist, bringing changes to Year Committee

Curriculum Quality Review Sub-Committee

Curriculum Committee

If accepted, changes implemented
INTERNAL SOURCES OF DATA

Clerkship Rotation Evaluations

In compliance with CACMS element 8.5, a formal process for collecting and using student evaluations of clerkship rotations has been established. Clerks are sent a standard clerkship rotation evaluation via One45 at the end of each rotation. Currently, clerks evaluate every rotation they complete. Results from each rotation are collated at least every six months. Any serious issues arising from these reports will be addressed as appropriate by the Clerkship Committee, with any resulting proposed curricular changes being addressed in the same manner as the more thorough rotation reports, described below.

Site evaluation summaries comparing rotations at different campuses are generated to meet the requirements of element 8.7, which states that students at all sites must have equivalent experiences. These reports, along with reports comparing all rotations are sent to the Year 3 Chair, appropriate Rotation Directors, appropriate tri-site Rotation Coordinators, the Associate Dean, Undergraduate Medical Education, Director, Academic, Assistant Dean Curriculum, Director, Quality, appropriate Department Head, the Chairs of the Curriculum Delivery, Assessment, and Curriculum Quality Review Sub-Committees, as well as other appropriate personnel at different sites. A list of rotations that may have assessment concerns is sent to the Chair of the Assessment Sub-Committee. Rotation Directors complete Rotation Evaluation response forms that they submit to the Clerkship Chair. Findings are then discussed at clerkship meetings. The Year 3 Chair may further review evaluations of all rotations, identify rotations that have potential problems and schedule meetings with the appropriate Rotation Directors to advise of identified issues. The Rotation Directors may then meet with the tri-site Rotation Coordinators to develop the process for implementing major changes to a rotation, working with departments to bring the changes in effect. Proposed major changes that impact curricular mapping are made through consultation with of the Curriculum Specialist brought to the Clerkship Committee for approval. Once approved by the Clerkship Committee, changes are then submitted to the Curriculum Quality Review Sub-Committee (CQRSC) for approval. Once approved by the CQRSC, recommendations are presented to the Curriculum Committee. If approved by the Curriculum Committee, changes are implemented by the Rotation Directors and appropriate departments. Responsibility for follow-up and implementation lie with Rotation/course teams/Year Sub-Committees.
INTERNAL SOURCES OF DATA

Electives are evaluated in a similar manner to that described above. Students are sent an evaluation form through One45 at the end of each elective, with specific forms for internal and external electives. Results for internal electives are distributed following a similar process to that described above. To help protect student anonymity, results are not released until at least three students have completed an elective.

The roles and responsibilities of key stakeholders are summarized below as are the sequential steps involved in the rotation evaluation process:
Rotation Director or Year Chair works with Curriculum Specialist, bringing changes to Clerkship Committee

Curriculum Quality Review Sub-Committee

Curriculum Committee

If accepted, changes implemented by the Year Chair and Departments
Instructor Evaluations

In compliance with Accreditation element 8.5, a formal process for collecting and using information from student evaluations of their instructors has been established. Instructor evaluations are collected primarily for program evaluation and course improvement purposes, with aggregate results for a course reported to Year Committees and the Curriculum Committee. Results for individual instructors are provided to the instructor in question as well as their Most Responsible Planner (MRP), the faculty member with the more direct responsibility for the activities of a particular instructor at a particular site. MRPs are typically a course or module director or coordinator. Below is a summary of the instructor evaluation process. Please see the complete instructor evaluation framework for a more comprehensive description.

Preclerkship

Instructor evaluations are completed for all instructors who have taught at least two hours within a course or module. Exceptions may be made on a course by course basis. Instructor evaluations are typically administered once an instructor is done teaching in a specific course, although exceptions may apply. UGME staff responsible for sending evaluations obtain schedules of when instructors complete their teaching in specific courses on a regular basis. Instructors teaching large group sessions who meet the criteria for evaluation are evaluated by approximately 33% of students to help reduce evaluation fatigue. Those who teach in small group settings are evaluated by 100% of students in their small group. Options for students to evaluate instructors they were not specifically sent forms for may be provided.
INTERNAL SOURCES OF DATA

**Clerkship**
Instructor evaluations are sent to each student upon the completion of each of their rotations and in-province electives to assess the preceptors they spent the most time with during the course of the rotation. This is determined in consultation with the Departments. Options for students to evaluate instructors they were not specifically sent forms for may be provided.

**Selected Topics**
Each Selected Topic session is evaluated by 1/3 of the students.

Aggregate instructor evaluation results are included in standard course evaluation reports and are reported at the end of each course. Individual feedback is provided at appropriate intervals throughout the course. Aggregate instructor evaluation results are also included in rotation evaluation reports. The roles and responsibilities of key stakeholders are summarized below as are the sequential steps involved in the course evaluation process.
FIGURE 7: INSTRUCTOR EVALUATION PROCESS FOR PRECLERKSHIP

Program Evaluation Subcommittee

- Questions decided for instructor evaluations
- Schedule for evaluation sendout determined for each learning moment
- Survey generated on One45
- Instructor evaluation data collected
- Individual instructor evaluation reports created
- Aggregate instructor evaluation results included with standard course evaluation reports
- Standard course evaluation reporting process followed

Undergraduate Medical Education Office

- Results addressed as necessary
- Negative Evaluations: MRP to consult appropriate support and develop appropriate response strategy
- Positive Evaluations: Instructor and MRP meet to discuss as necessary

"Most Responsible Planner"
FIGURE 8: INSTRUCTOR EVALUATION PROCESS FOR CLERKSHIP

Program Evaluation Subcommittee
- Questions decided for instructor evaluations
  - List of instructors who have completed their teaching for each rotation obtained on a regular basis.
  - Survey generated on One45
  - Instructor evaluation data collected
  - Individual instructor evaluation reports created
  - Aggregate instructor evaluation results included with standard course evaluation reports
  - Standard rotation evaluation reporting process followed
  - Results addressed as necessary
  - Negative Evaluations
    - MRP to consult appropriate support and develop appropriate response strategy
  - Positive Evaluations
    - Instructor and MRP meet to discuss as necessary

Departments Responsible for Rotations
- Individual Instructors
- "Most Responsible Planner"

Undergraduate Medical Education Office
INTERNAL SOURCES OF DATA

Program Learning Objectives Self-Assessment
The College has several stated program level objectives reflecting Physician as: Medical Expert, Communicator, Collaborator, Leader, Health Advocate, Scholar, and Professional. In order to better understand the extent to which the College is achieving these objectives, students complete self-assessments rating themselves both currently, retrospectively for the first day of clerkship, and retrospectively to the first day of medical school. Students complete this self-assessment after core rotations have finished. Research indicates that aggregate self-assessments may serve as accurate indicators of performance (D’Eon et al., 2008; D’Eon & Trinder, 2013; Peterson et al., 2012). This source of data complies with Accreditation elements 8.4 and 8.5 as it involves student evaluations of the College’s Program Learning Objectives and serves as a source of outcome data. Comparisons of the responses given by Regina and Saskatoon students help satisfy Accreditation element 8.7, which requires students at all instructional sites to have comparable educational experiences.

Narrative Feedback
On a yearly basis, or as requested, a report of the narrative feedback provided by instructors to students for select courses/modules will be created and sent to the module directors or relevant curricular unit lead (rotation, discipline, etc.). Specific assessments will be chosen by the course directors or Chair of the Assessment Sub-Committee. This feedback will help course directors, module directors, and discipline leads better determine the quality of feedback provided by instructors and direct them to faculty development where appropriate. It will be used for program evaluation and quality assurance purposes. Responsibility for implementation lies with module and course directors, or other stakeholders, as deemed appropriate. This is in accordance with CACMS element 9.5.
End of Year Evaluations Completed by Students
At the end of each academic year, students complete an evaluation of their overall experience that year. Results are shared with the appropriate Year Chair, Associate Dean Undergraduate Medical Education, Assistant Dean Curriculum, Director, Quality, Director, Academic, Chairs of the Assessment, Curriculum Delivery, and Curriculum Quality Review Sub-Committees as well as other relevant stakeholders. This is in compliance with Accreditation element 8.5.

Feedback on Residency Performance of Graduates
PGME staff provide the Program Evaluation Specialist, UGME with de-identified results showing the performance of R1s who did their MD at the U of S as well as the performance of those who did their MD elsewhere. De-identified results are shared with the Program Evaluation Sub-Committee, Curriculum Committee, Director, Academic, Director, Admissions, and the Assistant Dean, Curriculum. This is in compliance with element 8.4
INTERNAL SOURCES OF DATA

**Student Feedback**

Members of the Student Curriculum Review Committee (SCRC) sit on the Program Evaluation Sub-Committee. They are kept informed of evaluation results and will bring this to the attention of other SCRC members and students in general as required. They will also bring any student concerns to the attention of the Program Evaluation Sub-Committee.

Members of the SMSS that deal with curriculum-related issues sit on various chair committees (i.e., Year Committees, Systems Committees). They will bring back issues related to the evaluation to the SCRC as required. They will also bring any student concerns to the attention of the various committees as required.

**Grade Comparisons between Campuses**

Statistical analyses are conducted to compare grades between Regina and Saskatoon students for appropriate courses and rotations. This is done on an annual basis to help meet CACMS element 8.7. Results are shared with appropriate Year Chairs and the Curriculum Committee.
EXTERNAL SOURCES OF DATA

**MCC Qualifying Examinations**
Performance on the Medical Council of Canada Qualifying Examination (MCCQE Part I) is tracked over time. Graduates’ average scores are compared to those of all candidates as well as those trained at other Canadian medical schools. This meets the requirements of element 8.4 as it demonstrates, through the use of national norms of accomplishment, U of S graduate performance in comparison to other Canadian medical graduates. It also meets element 8.7 as overall performance of Regina and Saskatoon graduates are compared. Results are shared with the Curriculum Committee and other relevant stakeholders.

**Canadian Medical School Graduation Questionnaire**
The results of the Canadian Medical School Graduation Questionnaire (AFMC) are tracked over time. Reports are generated showing areas of improvement and decline from the previous year as well as site comparisons between Regina and Saskatoon. The Program Evaluation Sub-Committee will review the graduation questionnaire reports on a yearly basis and forward to the appropriate committees.

**AFMC MD Entry and Pre-Clerkship Questionnaires**
The results of the AFMC Entry and Pre-Clerkship surveys will be tracked, as needed, to help monitor areas relating to student wellness, diversity of students, and intended career. Results will be shared with the Curriculum Committee and other relevant stakeholders.

**Canadian Post-M.D. Education Registry (CAPER) Data**
CAPER data are reviewed to identity residency match results, specialty choices, practice location of graduates as well as licensure rates of graduates. The Program Evaluation Sub-Committee will create a report on an annual basis and forward to appropriate committees and individuals to help meet CACMS element 8.4. Additional data on licensure rates may be provided by the PGME office and yearly information on residency matches is obtained from CaRMS.
College of Physicians and Surgeons of Saskatchewan (CPSS) Register

The CPSS register is searched to identify which graduates are located in Saskatchewan and their practice location. Reports will also include the proportion of our graduates who are practicing in rural areas. Results are shared with appropriate stakeholders. This is in compliance with CACMS element 8.4.
Predicting MCCQE Performance

In order to understand which courses are most associated with MCCQE Part I performance, correlation coefficients and regression analyses are conducted between grades for undergraduate courses and MCCQE performance.

Program Efficacy Review

Accreditation Element 8.3 states: the medical education program objectives, learning objectives, content, and instructional and assessment methods are subject to ongoing monitoring, review, and revision by the curriculum committee to ensure that the curriculum functions effectively as a whole such that medical students achieve the medical education program objectives.

To help meet this element, internal and external data that are used to measure students’ attainment of the College’s Program Level Objectives are reviewed on an annual basis during a Curriculum Committee retreat. These sources of data include: student assessments, Program Objectives Self-Assessment, MCCQE I, and the AFMC-GQ. Retreat attendees review data and provide feedback on the extent to which the program objectives are being met. A report is created following the review that is provided to the Program Evaluation Sub-Committee, Curriculum Committee, and other key stakeholders in the College of Medicine.
BIBLIOGRAPHY


Gerrity, M., & Mahaffy, J. (1998). Evaluating change in medical school curricula: How did we know where we are going? Academic Medicine, 73(Suppl. 9), S55-S59.


BIBLIOGRAPHY


BIBLIOGRAPHY


University of Saskatchewan (2002). Principles of evaluation of teaching at the University of Saskatchewan. Saskatoon, SK: Author.