

Minutes*

**Senate Committee on Educational Policy
Wednesday, October 19, 2011
2:00 – 4:00
238A Morrill Hall**

- Present: Thomas Brothen (chair), Lee-Ann Breuch, Norman Chervany, Robert McMaster, Cody Mikl, Peh Ng, Jane Phillips, Leslie Schiff, Henning Schroeder, Paul Siliciano, Elaine Tarone, Cathrine Wambach
- Absent: Barbara Brandt, Jude Higdon, Alon McCormick, Peggy Root
- Guests: Vice Provost Arlene Carney, Dr. Tom Dohm (Office of Measurement Services), Ole Gram (Office of the Vice Provost for Faculty and Academic Affairs); Professor Kathryn VandenBosch (Scope, Size, and Mission Committee)
- Other: Suzanne Bardouche (Office of the Vice Provost and Dean of Undergraduate Education); Susan VanVoorhis (Academic Support Resources); Jon Steadland (Office of the President)

[In these minutes: (1) lists of instructors ranked as excellent by their students; (2) transfer students; (3) Scope, Size, and Mission report on graduate and professional education]

1. Lists of Instructors Ranked as Excellent by Their Students

Professor Brothen convened the meeting at 2:00 and welcomed Vice Provost Carney and Drs. Dohm and Gram to discuss a proposal related to providing information to students about how instructors are ranked.

Dr. Carney distributed a packet of information and recalled that this is a topic the Committee discussed a number of times in the last two or three years. Students want to know more about teachers; the question is what information can be released to students. They want a great deal of information, but the University cannot release everything they want (because of data privacy laws). There are the student-release questions on the Student Rating of Teaching (SRT) forms, but very few instructors authorize the release of the information.

One option that she has suggested is the practice at the University of Illinois (which she is familiar with because she was a faculty member there for a number of years). The Illinois system is a compilation of the instructors are "rated among the top 30% across campus." The list, published each semester, is available on the web for students to view. It is a point of great pride among faculty at the University of Illinois to be on the top 30% list. Minnesota has the teaching awards, but only a very small percentage of the faculty can receive them; the Illinois system broadens the picture. The information about appearances in the top 30% is used for promotion and tenure and for annual

* These minutes reflect discussion and debate at a meeting of a committee of the University of Minnesota Senate; none of the comments, conclusions, or actions reported in these minutes represents the views of, nor are they binding on, the Senate, the Administration, or the Board of Regents.

reviews, and has been used at Illinois for about 30 years. Dr. Gram pointed out that anyone may opt out of the system; Dr. Carney agreed but said she did not believe that faculty at Illinois do so.

The University of Minnesota could pull these data and present them any way deemed appropriate, Dr. Carney said. She provided examples from the College of Science and Engineering—without names—of the top 30% of the faculty (113), top 30% of the P&A/contract faculty/others (53), and the top 30% of graduate-student instructors (116). The scores are listed in numerical order. She said she believed it would be useful to separate the data by type of instructor; her examples also sorted the results by course designator but not by instructor. The data include section number, the average number of students in the class, and the average score for the four instructor-centered questions on the SRT forms. She said she believed it would mix up too much to put all three categories of instructor into one list.

Dr. Carney affirmed that someone could appear on the list more than once, if he or she taught more than one class in a semester that had average student ratings that fell into the top 30%.

Dr. Carney observed that the scores in the data set presented of the top 30% of instructors in each category are very high—for faculty members, the average ratings went from 5.97 (on a 6-point scale) to 5.5. She also pointed out that faculty members teaching large classes show up among the top 30%. The list includes both undergraduate and graduate classes. Dr. Carney and the Committee discussed various ways that the data might be organized for student use—rank-ordered, by college, by department, by instructor, by designator versus college/department, and so on. Illinois provides the information by department, which may be too fine a level of granularity—and could be a problem with small departments. It is up to the Committee to decide. (And the Morris campus could decide how to present its data, Dr. Carney said in response to a question from Professor Ng; it may wish to treat itself as a college rather than divide the results by division.) Another question is whether the data should be available publicly (it is at Illinois) or accessible only with an X.500 ID.

Ms. Phillips asked if there is any reason to think that someone with a 5.8 is better than someone with a 5.7. Including the scores in the published information implies meaning in the precision of the numbers that is not valid. She said she would argue that the SRT numbers not be included. Dr. Carney agreed and said she would not argue that 5.8 is better than 5.7. Illinois published the mean of the top 30%, but there is always a cutoff point; it is like grading, and the next one down on the list might be .02 below the cutoff point. The actual scores were provided to give the Committee information to help make a decision. Actual scores need not be presented in the data display.

The write-up would also be important, Dr. Carney said. If 95% of the instances when students taught by graduate students are in labs and discussion sections, it should say that these are lab/sections associated with courses.

The information would not be on One-Stop (e.g., indicating that a particular faculty member had been in the top 30% of instructors in a previous semester), Dr. Carney said, because instructor information changes too much across semesters, but there could be a link from One-Stop to the information so students could look up a potential instructor.

If this system were adopted, would the student-release questions be eliminated, Professor Ng asked? In their discussions with student groups in the last year or so, Dr. Carney related, the students have been very reluctant to get rid of the student-release questions. So she would suggest an overlap of two years in order to permit the students to see that they receive much more information from a top 30% listing. Eliminating the student-release questions would allow instructors to add questions about student learning; there is a bank of questions that a subcommittee of this Committee prepared that is ready to be used.

Ms. Phillips said that as a P&A representative on the Committee, she said she would not be happy to see long-term P&A instructors lumped with contract faculty and others. Dr. Carney pointed out that if all the teaching P&As were included with the faculty, there would be a much smaller number of P&As included in the top 30%; dividing them allows more of the excellent P&A instructors to be recognized. Ms. Phillips said it is insulting to be separated; the Committee argued that P&A instructors should be eligible for the teaching awards, along with faculty; this would again separate them. Professor Chervany said he felt very strongly on this point: The Committee just went through the exercise of insisting that both faculty and instructional P&A staff should be eligible for the Morse-Alumni and Graduate-Professional teaching awards, and it should not now tolerate dividing them for the top 30% list. Professor Brothen suggested identifying the list the way the information has been presented and then combining them, so that the top 30% of both faculty and P&A instructors would be included. Dr. Dohm said that that could be done.

Dr. Carney agreed that would work but urged that graduate students not be mixed in; Vice Provost McMaster agreed. So there would be two lists, not three, Professor Wambach said. Dr. Carney expressed doubt that students look for graduate student instructors in selecting courses; to create a list for TAs is for the benefit of the graduate students, because they can use a top-30% listing in applying for jobs. (Vice Provost McMaster said he would prefer to see three lists, with faculty, P&A staff, and graduate students separated, because the roles and responsibilities of the three groups are very different, but he acknowledged the strong Committee feeling that there should only be two lists.)

Professor Tarone said that the proposal is a great idea in acknowledging a wider group of people who are excellent teachers.

Professor Wambach recalled that one issue that had come up in earlier discussions was about courses with a number of sections, with some of the section instructors on the top-30% list and some not, and the possibility that departments would be besieged by students who wanted to get into the sections with the higher-ranked instructors. Professor Breuch said it is hard to know if that would happen; she said she did not know if students would search the lists for that information (e.g., they have 75 writing sections taught by two faculty members and the rest P&A staff and graduate students).

Professor Brothen summarized by saying the Committee appears to be of the view that the top 30% should be calculated for the three groups but reported in two groups, by name and course. In response to a question about whether rank should be included or if P&A and faculty should be noted, Dr. Carney said she did not believe students think about those issues and that they should not be included.

Dr. Dohm told the Committee that his office could prepare the two lists for publication, in pdf format, but the information could also be cut and diced as units wished to use it.

Professor Ng said she would like to see further Committee discussion about the nitty-gritty details. Other Committee members agreed, and Dr. Carney said she would be glad to develop a more specific proposal and return to the Committee for further discussion.

Professor Brothen thanked Drs. Carney, Dohm, and Gram for presenting the proposal.

2. Transfer Students

Professor Brothen turned to Vice Provost McMaster to provide a report on transfer students.

Dr. McMaster provided Committee members a one-page handout with statistics on transfer students by college and campus and a multi-page handout of excerpts from the 9/23/11 Scope, Size, and Mission Committee report dealing with transfer students.

Dr. McMaster noted first the fall 2011 data on New High School (NHS) and transfer students (New Advanced Standing, or NAS) by college and campus. NAS students come from other universities, MNSCU, community/technical colleges, and so on. In addition, the data table included the number of inter-campus transfers (between University of Minnesota campuses) and the number of intra-campus (from one college to another) transfers. Morris had 465 NHS students and 126 NAS students, as well as 3 inter-campus transfers. The Twin Cities had 5,368 NAS students, 2,046 NAS students, 228 inter-campus transfer students, and 1,135 intra-campus transfers. (Crookston had 227 NAS and 17 inter-campus transfers; Duluth had 544 NAS students and 45 inter-campus transfers, and Rochester had 26 NAS students and no inter-campus transfers.)

Next up came the recommendation from the Scope, Size, and Mission Committee to "maintain a 2 to 1 ratio of new freshmen to transfer students." Dean McMaster noted the data for NHS and NAS students for fall semesters for the Twin Cities campus from 1999 to 2009. NAS students increased from 2,277 to 2,780 (with considerable fluctuation in the numbers during the period); NHS students increased from 5,195 to 5,400 (also with considerable fluctuation, from 4,957 to 5,588). The idea, Dr. McMaster said, is that the Twin Cities campus has been running slightly on the high side in terms of the number of transfer students; one year they were 41% of new students, but the average has been about 35-36% per year. The Scope, Size, and Mission Committee recommends 33%. (The total undergraduate enrollment, fall semester, Twin Cities, 26,972 in 2000 and 29,921 in 2009. It was 30,519 in 2010 and 30,610 in 2011.)

Dr. McMaster reviewed a graph containing fall 2009 data on NHS and NAS students at Minnesota (Twin Cities) and its peer institutions, Big Ten and others. He noted first that Minnesota is not anywhere near the top of the group in terms of the number of degree-seeking undergraduates. Minnesota was 29,921; Ohio State was over 40,000, Penn State was at 37,855, Texas was at 37,464, and so on. Illinois, Purdue, Indiana, Florida, and Michigan State also have more undergraduates. Wisconsin, Washington, UCLA, Michigan, Berkeley, and Iowa have fewer. Minnesota is below the median. The data also included the percentage of NHS and NAS students; Minnesota had the highest percentage of transfer students by far apart from the California schools (where the system is set up to facilitate transfers to the UC system). Minnesota in fall 2009 had 32% transfer students; by

comparison, Ohio State was 24%, Penn State was 6%, Texas was 25%, Michigan State 17%, Indiana 12%, Purdue 14%, Illinois 15%, Wisconsin 17%, and so on. Dr. McMaster said he was making no value judgment, but it is clear that Minnesota is different from its peers in terms of the percentage of transfer students it admits.

The Committee also considered a table of data reporting the number of NHS and NAS students and inter-campus transfer students by semester from 2000-01 to 2010-11 for the Twin Cities. For the year, the percentage of the total who were transfer students ranged from 31.9 to 41.4 in 2009-10 and 39.4 in 2010-11. The Scope, Size, and Mission Committee recommends reducing the percentage of transfer students in order to be more comparable with the University's peers and to improve the student experience, Dr. McMaster reported. Second, it recommends that the central administration, through his office, play a greater role in setting targets for transfer-student admissions, advising, and working with the Office of Student Affairs in order to improve the transfer-student experience.

Dr. McMaster turned next to a table of data indicating the movement among colleges for undergraduates enrolled in fall 2009 and fall 2010. The Committee was able to see the number of students that colleges "import" and "export" and the extent to which they are net importers or exporters of students. All colleges except Biological Sciences and CLA were net importers of students.

Dr. McMaster next reviewed the source of transfer students to the Twin Cities campus:

37%	MnSCU community colleges
8%	MnSCU state universities (so a total of 44% of transfer students come from MnSCU)
9%	U of M campuses
7%	U of Wisconsin system
7%	Minnesota private colleges
33%	Other

The last three categories are primarily four-year schools, Professor Wambach said. In response to a question, Dr. McMaster agreed it would be useful to disaggregate the 33% other, which is mostly students from out of state. He agreed that there were probably very few community college students in that group.

Why does the University admit the "other" students and those from the state universities and other four-year institutions, Professor Wambach asked, partially rhetorically. It serves a public-policy purpose to admit students from Minnesota community colleges, because they provide a way to gain access to the University. What obligation does the University have to accept students from four-year institutions? They chose to go elsewhere and now want to come here. What is the institution's strategy? Vice Provost McMaster said that a student may want to go away to study and then decide to return home. It could be because of the cost of non-resident tuition or high private-college tuition, homesickness, or because the University has a better program for their interests. That is good for the students, Professor Wambach said, but how is it good for the University? Are those students being brought in where there might be excess capacity? Into STEM fields? It seems like an ad hoc process rather than strategic. That is the whole point, Dr. McMaster agreed: The process has not been planned and they are trying to get their hands around it. However, if (for example), CLA said it would no longer accept transfer students from out of state, that would have significant budgetary implications

for the college unless those students were replaced with freshmen, and if they were, that could drive down the college's metrics in terms of the academic preparation and standing of the incoming freshmen. So the University keeps its enrollment numbers high, and enrolls a highly qualified freshman class, by admitting transfer students who may or may not have been qualified for admission to the University as freshmen, Professor Wambach maintained. Dr. McMaster said he would not say that. The metrics for NHS students have improved and they aim to do the same thing for the metrics of NAS students.

The top feeder schools for the Twin Cities campus are Normandale CC, UM Duluth, Minneapolis Community and Technical College, Century College, Anoka-Ramsey CC, North Hennepin CC, Inver Hills CC, UW Eau Claire, Mankato, and St. Cloud.

Dr. McMaster compared the characteristics of freshmen and transfer students on the Twin Cities campus for 2010-11. Most measures comparing the two groups are not dissimilar; the only significant difference is in age (21% of transfer students are 25 or older, while 0.1% of freshmen are 25 or older).

They are paying more attention to the first-year retention rates for NHS and NAS students, Dr. McMaster reported, and have set targets for graduation rates for transfer students. He reviewed retention and graduation rates for NAS and NHS students and noted that retention is higher for NHS students (although, in the case of retention, the differences are small; for students who matriculated in fall 2009, NAS student retention was 87.8% and NHS was 89.5%). Graduation rates for NAS students are 20.2% for a two-year rate (after arriving at the University, assuming students arrive with two-years of academic work); 55.7 for the three-year rate; and 71.7 for the four year rate (which represents a total of six years, assuming students arrive with two-years of academic work).

They have established a transfer committee, with representation from a number of units across the campus, Dr. McMaster reported, in order to try to better understand the transfer transition and deal with the potential problems. He noted that there are differences between transfer and NHS students, as indicated by senior survey results: Transfer students describe their undergraduate experiences differently from NHS students, they consistently rate their experience lower on four out of five benchmark indicators, and they report lower-quality relationships with both faculty/staff and with other students. He explained some of the steps being taken:

- Examination of transfer matriculation across colleges and student service areas
- Establishment a transfer advisory committee to regularly discuss and take action on issues impacting transfer student success
- Explore development of a centralized transfer center
- Continued assessment of the timing and structure of transfer orientation
- Expansion of transfer welcome events and transition
- Utilization of Graduation Planner by transfer students to map out their curriculum and plan for a timely graduation
- Explore the development of a career course for transfer students
- Promote the expansion of on-campus housing for transfer students.

Professor Brothen thanked Dr. McMaster for his report.

3. Scope, Size, and Mission Committee: Graduate Education

Professor Brothen welcomed Professor VandenBosch to the meeting to lead the discussion on the report on graduate education from the Scope, Size, and Mission Committee. He noted that Professors VandenBosch and Wambach had both served on the graduate-education subcommittee of the Scope, Size, and Mission Committee.

Vice Provost McMaster provided the preamble to the discussion. He noted the members of the SSM Committee, reviewed its extensive work beginning in May 2010, and explained that it had defined three categories of enrollment:

- Undergraduate: Students pursuing associate or bachelor degrees.
- Graduate: Students pursuing a graduate-level degree or certificate (master's, doctoral, or post-bachelor's certificate).
- Professional: Students seeking a post-bachelor's degree or certificate in the Medical School, Law School, School of Dentistry, College of Pharmacy, College of Veterinary Medicine.

In the case of undergraduates, if a student has taken more than 3 credits after high school, he or she is considered a transfer student. Wisconsin, by comparison, defines a transfer student as someone who has taken fewer than 24 post-high-school credits, so one needs almost a full year of work before being accepted as a transfer student; Dr. McMaster said he thought that is a good policy. Why should the University accept someone with, say, 9 credits? Should it require that students demonstrate a year's worth of work?

Professor VandenBosch said that the graduate-education subcommittee used slightly different and more detailed descriptions of graduate and professional students, as would be detailed later in the presentation. As their take-off point, the subcommittee used the definitions of research doctorates and professional doctorates that are currently in use by the U.S. Department of Education.

Dr. McMaster reviewed briefly the principles that guided the work of the SSM Committee and then turned the gavel over to Professor VandenBosch to lead a discussion of the work of the graduate-education subcommittee of the SSM Committee. (The SSM report can be found here: <http://www.academic.umn.edu/provost/reports/documents/FullSSMReportSept23.pdf>; the principles are on pp. 7-9.)

Professor VandenBosch began by noting that she would be reporting on enrollment management in Ph.D. programs. It has a very different focus and tone from enrollment management in undergraduate education because decisions and enrollment targets are made locally, not centrally. In addition, "Ph.D. programs are closely tied to units' research mission, signature research strengths create opportunities for advanced training and act as talent magnets, [and] top applicants are attracted by faculty's leading research." "High caliber Ph.D. students help conceive and conduct research" and "Ph.D. students contribute to the teaching and training mission of their units."

Professor VandenBosch turned next to the recommendations of the SSM Committee for graduate education:

1. Set goals for graduate student outcomes and track progress for all graduate programs.
2. Maintain the role of the Graduate School in providing incentives for program improvement and in monitoring and promoting quality.
3. Provide programs with regular and systematic information concerning program performance that leads to high quality graduate programs.
4. Establish an internal review process for Ph.D. programs that guides fiscal investment and enrollment targets.
5. Provide financial augmentation and flexibility to Ph.D. programs deemed to be “Outstanding.”
6. Take action on programs deemed to “Need Reassessment.”
7. Evaluate impacts of graduate enrollment changes on academic units as part of the compact process.
8. Develop processes for evaluating professional masters and professional doctoral programs.
9. Develop processes for evaluating post-baccalaureate certificate programs.

The Committee next viewed a graph depicting graduate and professional enrollment at Minnesota and its peers. Minnesota is at the top of the range among its peers in total graduate and professional enrollment and near the top in the proportion of students on the campus who fall in those categories. Professor VandenBosch also provided a graph depicting graduate and professional enrollment by degree objective from 2000 to 2010:

Research Masters: M.A. and M.S.

Research Doctorate: Ed.D. and Ph.D.

Professional Masters: other than M.A. and M.S.

Professional Doctorate: M.D., D.D.S., D.V.M., Pharm.D., J.D., D.M.A, D.P.T, Au.D., and D.N.P.

Non-degree

Med Fellow/Resident

Certificate

The major point, Professor VandenBosch said, is that the general trend has been growth in all categories of enrollment, but in most cases the increases occurred early in the decade and then leveled out. The Professional Master, Professional Doctorate, and Research Doctorate have grown incrementally during the period, certificates have increased significantly (from 10 to 459 over the decade), Medical Fellow/Resident has increased but with ups and downs, and non-degree and Research Masters enrollment has declined.

Professor VandenBosch turned next to graduate enrollments by area over the decade, using the Department of Education's Classification of Instructional Programs (CIP) to group programs into areas of study (classification of UMTC graduate and professional programs by CIP code is available at: http://www.grad.umn.edu/programs/UMTC_Grad_and_Profl_programs.xlsx). The areas that have seen the greatest increases in enrollment, in rank order, are the health professions (971 students, or 32%), business (645 students, or 38%), engineering (316 students, or 28%), and public administration and social services (264 students, or 64%), education (162 students, or 10%) and biological and biomedical sciences (160 students, or 24%). Multi/interdisciplinary studies, architecture, math and statistics, legal professions, and computer and information science also showed enrollment increases of <100 students per area. She also noted the peak enrollment year for each area; for the top four, it

was within the last two years, while for the others the peak enrollment occurred at various times over the decade, although all were within the last six years.

Some programs, by comparison, have seen moderate growth and then reversal: the social sciences, the physical sciences, psychology, communication and journalism, and leisure and fitness. The enrollment numbers in these areas increased, peaking in mid-decade, but are not currently on an upward arc.

Finally, there are some areas that have shown a net enrollment loss over the decade; in rank order from smallest to largest decline in numbers of students, they are: the visual and performing arts (7 students, or 2%), area/ethnic/culture/gender studies (13 students, or 19%), natural resources and conservation (14 students, or 9%), philosophy and religion (15 students, or 39%), family and consumer science (17 students, or 20%), history (17 students, or 12%), liberal arts and sciences general studies (28 students, or 19%), English language and literature (31 students, or 18%), foreign languages/literature and linguistics (37 students, or 23%), agriculture and agricultural operations (-75 students, or 30%).

Professor VandenBosch commented that a recent article in the Minnesota Daily suggested that these enrollment changes resulted from implementing the quality metrics that have been proposed for graduate programs. That is incorrect, she said; the metrics have not been implemented for enrollment management and the changes in enrollment are the result of many local decisions and are not part of a strategic plan.

In the course of their work, Professor VandenBosch reported, the subcommittee met with a large number of Directors of Graduate Study to hear how they set enrollment. They reported that enrollment targets are influenced by:

- Qualifications of the applicant pool.
- Funding available for student support (research assistantships, teaching assistantships, fellowships, training grants, etc.).
- Program capacity for training and advising.
- Minimum number required for good cohort experience.

The best practice that emerged was that programs should expect and enable timely degree completion by admitting for success and not exceeding capacity.

Professor VandenBosch reviewed peer data on graduate and professional enrollment 2009 and degrees 2009-10. Minnesota ranks near the top of the peer group in both categories. In terms of trends at Minnesota 2000-2010, the Professional Masters degrees have increased from 1406 in 2000 to 2251 in 2010, the Research Masters from 953 to 1179, the Professional Doctorates from 714 to 924, and the Research Doctorate from 610 to 702. She commented that there has growth in degree production similar to that in enrollment, except that Research Masters' degrees have gone up (+24%) even though program enrollment has gone down (-21%). One possible explanation for the Masters' trends is conversion from a Ph.D. degree to a Masters track. They also observed that the number of Research Doctorate degrees increased (15%), but not as much as enrollment (+22%).

Professor VandenBosch next reviewed National Research Council (NRC) data on median time to degree (2003-04 to 2005-06) for completion of the Ph.D. on the Twin Cities campus (in 69 programs for which the NRC collected data) and the average Completion Rate (1996-97 to 2005-06) for the same 69 programs (within 6 years, or 8 years for programs in Humanities). The median time to degree ranged from 3.4 to 10.3 years (with a mean of 5.9 years). The average Completion Rate ranged from < 10% to > 90%, with a mean of 44%.

Looking at University data for all Ph.D. programs (>90), the Median Time to Degree (2001-02 to 2010-11) was 3.1 to 10.1 years, with a mean of 6.0 years. The Average Completion Rate (2001-02 to 2010-11) (within 8 years) ranged from < 12% to > 80%, with a mean of 50%.

Professor Ng asked how the time to degree was counted. It is from the time a student entered the program, Professor VandenBosch said—which is how the NRC counted time. So if one does a Masters degree, stops out and works, then returns later for a Ph.D., that is counted as one span of time, Dr. McMaster asked? If the degrees were in the same program, it would be, Professor VandenBosch said. It also depends on the data set, Professor Wambach commented; the Carlson School complains about that in some data sets their PhD students are counted as starting graduate school when they begin their MBA programs, which gives the artificial impression of long times to degree. Professor VandenBosch said the differences between the sciences and the humanities are not enough to account for the all of the difference in rates of completion among UM programs. They looked at the outliers among UM programs and found that they were also outliers in their fields, according to NRC data.

Recommendation 1 from the SSM Committee is set goals for graduate student outcomes and track progress for all graduate programs. That includes, Professor VandenBosch said, tasking the Graduate School for tracking data on graduate student outcomes, setting program-specific goals for % retention, % completion, and median time to degree, and using student outcome data as one approach to evaluate programs. She said that "timely progress to degree and high proportions of degree completion are characteristics of good programs," but she emphasized strongly that "these metrics are not, on their own, sufficient to identify outstanding programs."

Ms. Phillips inquired how they would set retention and completion rates. Would they use the national average? How would they make decisions about geographers, for example? They can look at data for national averages from the NRC studies, Professor VandenBosch said. She added that the SSM committee was concerned about the high number of "washouts" in some programs, which negatively affects percent completion figures. It is not only the time to degree of this cohort, Dean Schroeder said, but also evaluation of what has occurred over the last ten years. If time to degree is increasing, that could be a problem. More than ten years in any discipline is problematic, he said, and it would be appropriate to look at national averages. They in the Graduate School are looking at the data, and also believe that early attrition is better than late. Professor Wambach said that Committee members have seen articles in *The Chronicle of Higher Education* about differences across programs, such as in fields where Ph.D. students have full-time jobs at the same time they are pursuing their degrees. That is why the goals must be program-specific, Professor VandenBosch responded.

Professor VandenBosch turned next to the NRC rankings of graduate programs. She noted that the NRC rankings were released in 2010-11 but were based on data collected in 2006. She discussed briefly how the two different rankings were compiled and reported that of six broad fields,

the highest rankings on the Twin Cities campus were in Engineering and Agriculture. Among the 69 programs that were ranked, the Twin Cities top-ranked programs include:

- Aerospace Engineering
- Chemical Engineering
- Chemistry
- Child Psychology
- Ecology, Evolution and Behavior
- Economics
- Electrical Engineering
- Geophysics
- History
- Kinesiology
- Materials Science and Engineering
- Mechanical Engineering
- Psychology

About 40-50% of the graduate programs on the Twin Cities campus cross into the top 20% of programs in their respective fields, Professor VandenBosch. They also looked at the University's peers to see what percentage of their programs were ranked in the top 20% compared to the Twin Cities. The Twin Cities campus ranks 15th out of 35 public AAU institutions on the "R" ranking and 18th out of 35 on the "S" ranking. That is further down the list than the University wants to be, she said. She also observed that "big does not equal good." Florida is larger than Minnesota but also has fewer programs in the two rankings (20% to 31.7%), Dean Schroeder observed.

So the question is whether there are Ph.D. programs that are over-extended, Professor VandenBosch said. The SSM Committee made the following observations:

- The Twin Cities campus is at or near the top of our peer group in of post-baccalaureate enrollment.
- The Twin Cities campus has a large number of programs.
- NRC rankings indicate that although we have many highly-ranked Ph.D. programs, others appear to have lower performance and reputation.
- Ph.D. student success rates, as measured by median time to degree and % completion rates, are highly variable among programs.

As a result, Recommendation 2 from the SSM Committee is to maintain the role of the Graduate School in providing incentives for program improvement and in monitoring and promoting quality; Recommendation 3 is to provide programs with regular and systematic information concerning program performance that leads to high quality.

Professor VandenBosch reviewed the proposed quality metrics for graduate programs that had been presented to the Committee at its previous meeting, with additions:

Metric Type	Name of Measure	Source of Data
<i>Input:</i> Graduate Student Ability, Motivation, Past Performance	Verbal GRE Score Quantitative GRE Score Writing GRE Score	Submitted directly to the Graduate School

	Area GRE Score GPA Undergraduate degree GPA Post-baccalaureate degree (if applicable) Type of Undergraduate institution Type of Post-baccalaureate institution (if applicable) Number of applications, number of acceptances, % yield	Official transcripts from schools Carnegie Classification System
<u>Input:</u> Faculty Measures	Faculty grants Faculty publications Faculty citation per publication Extramural faculty awards Creative & artistic works; performances University/internal honors and awards	NRC (for data collected from previous reports) Private metrics firm such as <i>Academic Analytics</i> Self-reporting University records
<u>Input:</u> National/International Reputation Measures	National rankings	NRC Disciplinary rankings
<u>Program Operation:</u> Program Efficiency and Competence (graduate student level)	Student publications and conference papers Student satisfaction Training grants to programs Student external fellowships, awards, and grants Student internal fellowships, awards and grants	Programs Council of Graduate Students (COGS), Graduate School, programs/colleges Programs/Graduate School
<u>Program Operation:</u> Program Efficiency and Competence (program level)	Bostrom Efficiency Index (BEI) composed of: time to degree, degree completion rates, and attrition pattern Faculty/graduate student ratio Faculty/student collaboration Shannon Diversity Index (interdisciplinary)	Graduate School University records Departments Graduate School
<u>Output:</u> Graduate Student	Academic placement type Quantity trends Alumni citation index scores Alumni awards Alumni publications	Departments Departments Private metrics firm such as <i>Academic Analytics</i>

There is, she said, a need for quite a few metrics in order to measure quality. When she presented these metrics to the Board of Regents, she reported, she told the Board that data for the first category are already routinely collected, that data for the second category (faculty measures) in many cases

reflect peer review (such as grants, publications, etc.), and that with the fourth category they are trying to get at the student experience while in graduate school, and how quickly they become productive. They also propose looking at measures of student satisfaction. The last category, output, may be among the most important—and also the most difficult to gather, in part because of the long time frame.

Recommendation 4 from the SSM Committee is to establish an internal review process for Ph.D. programs that guides fiscal investment and enrollment targets. The Review Committee should consist of University faculty who are distinguished scholars; those with demonstrated leadership in graduate education, knowledgeable staff, and graduate education leader(s) from peer institution(s). They also recommend a scheme of program classification:

- (1) **Outstanding** (programs with distinguished scholarship, outstanding training opportunities, and exemplary program operation that merit special support; this category should include only the very best programs.
- (2) **Strong** (programs of strong quality with high potential to move into the 'Outstanding' category and/or growth while maintaining quality; candidates for further investment).
- (3) **Good** (programs that are doing reasonably well, appropriately sized, with critical mass (e.g. some minimum cohort) and appropriate plans for the future).
- (4) **Needs Reassessment** (programs with one or more indicators of poor performance, such as low demand; high dropout rates; inability to attract highly qualified applicants; high dropout rates; excessively long times to degree; low faculty and/or student productivity; and low national and international rankings. Such programs would be candidates for remediation, restructuring or elimination).

Recommendation 5 from the SSM Committee is to provide financial augmentation and flexibility to Ph.D. programs deemed to be "Outstanding." Professor VandenBosch drew on the language of the SSM report:

Programs such as these do not achieve their status overnight or by chance; they grow to this status due to sustained effort and achievements over many years, but it can be easily eroded if conditions are adverse. These are the programs that we most want to sustain, and constitute signature strengths of the University. Outstanding programs also provide examples that other programs can emulate. Therefore, providing financial augmentation to 'Outstanding' Ph.D. programs would serve two purposes. First, it would help to sustain the quality and performance of these programs. Second, it would present an incentive to other programs to improve performance so that they might move up into the 'Outstanding' category in subsequent reviews.

Augmented funding for 'Outstanding' programs, once designated, would be allocated centrally for the purpose of enhancing university-wide academic quality and excellence. Program augmentation should be a minimum of \$1,000 per student in each 'Outstanding' Program. Further, we recommend that these programs should be able to use this funding to maintain the

strength of their graduate programs at their discretion, for example to augment student stipends or to support novel program elements that enhance the training environment.

Recommendation 6 is to take action on Ph.D. programs deemed to "need reassessment," as determined by the metrics and indicators mentioned above, Professor VandenBosch said. The SSM Committee believes this will be a small minority of programs. These programs would be placed at low priority for graduate school funding. Working collaboratively between the programs, their home colleges, and the graduate school, specific benchmarks and a timeframe would be set for remediation of problems, restructuring or elimination of programs.

Professor Brothen asked Committee members if they wished to endorse the findings and recommendations of the SSM Committee report that are related to Ph.D. programs and education. Professor Tarone said that the Committee needs more time and information.

Professor Chervany commented that for programs with a significant investment in Research Masters programs (not the case in his college), there is nothing in the report about how they contribute to quality metrics. There is nothing here about those programs, which he finds disappointing. The Committee needs a lot of information, such as how Research Masters programs contribute to the scoring of programs. If they do not deal with that issue, the recommendations are likely to receive mixed reviews from this Committee, he predicted. Professor Tarone agreed that the net should be cast broadly, given the evolution of graduate education, and the Ph.D. education should not be assumed to be the sole avenue of graduate education.

Vice Provost McMaster said that they view the report as a work in progress and that there needs to be a group that works on enrollment management/scope, size, and mission every year. It was clear to the SSM Committee that it could not answer every question in every category of education; it did not answer questions about first-professional degrees, either. One contribution from this Committee could be to identify what it believes is important, what another committee should look into. Given the graph of trends in degrees, Professor Tarone said, it appears that the MBA, Research Masters programs, and certificate programs require attention and quality control.

Professor Brothen rephrased his question to the Committee: Does it believe the recommendations are moving in the right directions?

If there is a recommendation to put a program in the "needs reassessment" category and a program is to be ended, that would be a big decision and a sensitive topic, Professor Chervany commented, and the faculty would likely flee. They discussed what would happen if a decision were made that a program should be dismantled, Professor VandenBosch said, and concluded it is related to the compact process and how closure would affect undergraduate and professional education. It would depend; in some cases, the faculty members would have other opportunities at the University. Professor Wambach said that if a Ph.D. program were identified as in serious trouble, it would not likely be one that has faculty who are able to flee. Somewhere along the line, Professor Chervany averred, the topic of program termination needs to be on the table.

This discussion started with former Vice Provost Craig Swan, Professor Wambach recalled. If the University wants to increase its quality ranking, it could eliminate low-ranked Ph.D. programs. She noted that in the comparison of Minnesota with peers in terms of the number of programs ranked

in the NRC top 20%, Minnesota has 69 programs ranked and the University of Washington has 59. That raises the question of the number of Ph.D. programs the University has and should support.

Professor VandenBosch said that with respect to the "holes" in the report, they believe that some Ph.D. metrics may be useful in other areas (i.e., the other kinds of graduate and professional programs) and not in others, and that there are likely some metrics that they did not think of that would be useful for the different areas. Other types of metrics can be considered. She recalled that Vice Provost McMaster's opening remarks indicated that enrollment management should be an ongoing process. She said that development of metrics to assess quality of professional degrees (both doctoral and masters) and post-baccalaureate certificate programs is part of the to-do list represented in the remaining recommendations.

Professor Chervany responded to Professor Brothen's question: He believes the SSM recommendations are moving in the right direction. There are interesting discussions ahead, he predicted, and the recommendations need refining. Professor Tarone agreed but suggested that it be made clear this report speaks only to Ph.D. education. Professor VandenBosch agreed; she reported that they looked at the broad trends in all areas of graduate and professional education but the recommendations are only for Ph.D. programs. Committee members concurred with Professors Chervany and Tarone that the recommendations are going down the right path.

Professor Brothen thanked Professor VandenBosch and Dr. McMaster and adjourned the meeting at 4:10.

-- Gary Engstrand

University of Minnesota