REPORT OF THE TEACHING EVALUATION TASK FORCE 2017-19

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Report from the Provost's Teaching Evaluation Task Force

I. Overview

The Teaching Evaluations Task Force (TETF) and its subcommittees identified, investigated and discussed common forms of evaluation of teaching, and the pros and cons of each. We also considered the purpose and practices of both summative and formative evaluations.

In doing so, we noted that the concept of "teaching excellence" can be vague, and in general we recommend that evaluations focus on teaching *effectiveness*, whereby instructors are evaluated on how well students attain course objectives. The focus of summative assessments should certainly include this, rather than more subjective measures of quality.

We have considered a variety of evaluation mechanisms including: student evaluations; peer assessment; teaching portfolios; and objective evaluations. We also considered the appropriate way to include information from teaching evaluations in promotion decisions. A summary of our findings follow.

II. Student Evaluations of Teaching

End-of-semester evaluations. It is important to include student input as part of a teaching evaluation process and end-of-semester course-instructor evaluations are an efficient mechanism for doing so. Done properly, they provide useful feedback to the instructor, department, college, and university. Instructors can use this feedback to improve both the course and their teaching. Soliciting such student feedback also sends a message to students that the instructor and university value their input.

Mid-semester formative evaluations. These can also provide important *formative* feedback for faculty. We should ensure that our new teaching evaluation software allows instructors to request evaluations at any time with questions of their choice. Where their purpose is formative, we should take care that they are not used summatively – although part of the summative evaluation of an instructor will ultimately be how they have responded to formative feedback, and their effort over time to improve their teaching. Faculty could request aid from the Center for Instructional Excellence (CIE), for example, to interpret formative evaluations and focus their effort on improving their teaching.

Ideas for Consideration. The impetus for this Teaching Evaluations Task Force was Senate Resolution 16-05 which recommended that the current "two questions" on Purdue's end of semester teaching assessment no longer be mandatory and that units not use them for summative evaluation purposes. The "two questions" are "overall I would rate this course as" and "overall I would rate this instructor as" and there is evidence that these particular questions are subject to bias against women and minority faculty.

To that end, the TETF investigated alternative questions that might be considered for use to replace the "two questions" and to reduce bias in student evaluation of teaching as much as possible.

(A) Possible End-of-Semester Course and Instructor Evaluations

(1) Multiple-choice questions

- **a) Question set.** The following set of questions for end-of-semester course and instructor evaluation are offered for consideration. These questions are slightly modified from the questions used at Texas A&M University. Texas A&M has studied the responses to these questions and reported minimal gender bias¹.
 - 1. The class activities are well prepared and organized.
 - 2. The assignments aid me in achieving the class objectives.
 - 3. The projects or laboratories aid me in achieving the class objectives [where relevant]
 - 4. The examinations aid me in achieving the class objectives. [where relevant]
 - 5. The instructor clearly explains material so that I can understand it.
 - 6. The instructor is open to my questions and effectively answers them.
 - 7. The instructor seems to care that I learned this material.
 - 8. The instructor willingly makes time to help other students and me.
 - 9. The instructor is fair and consistent in evaluating my performance in the course.
 - 10. The instructor created a welcoming and inclusive classroom environment.\

Question set responses:

1 = strongly disagree; 2 = disagree; 3 = neither agree nor disagree; 4 = agree; 5 = strongly agree

These questions address the following areas:

1 Class preparation

2-4 Assignments, labs, projects, and examinations

5 Communication

6 Responsiveness

7. Academic concern

8. Availability

9. Fairness in grading

10. Environment

Optional questions. We also offer some optional questions that instructors, units or colleges could choose to include. While we encourage units to consider these, and perhaps others of their own design, we believe there is an upper limit on the number of questions that should be on an end of semester student evaluation (maybe 15 or so total questions).

- 1. I feel that my instructor provides me choices and options.
- 2. I feel understood by my instructor.
- 3. My instructor conveyed confidence in my ability to do well in the course.
- 4. My instructor encouraged me to ask questions.
- 5. My instructor listens to how I would like to do things.
- My instructor tries to understand how I see things before suggesting a new way to do things.
- 7. The instructor challenged me to do my best work
- 8. I understand what is expected of me in this course
- 9. I am generally pleased with the text for this course.
- 10. The course web page is organized to promote my success in this course.
- 11. The instructor returned assignments in a timely manner

Another optional question **type** that might be considered, is based upon the Student Assessment of Learning Gains (SALG) instrument (2).

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"As a result of your work in this class, what GAINS did you make in the SKILL of. <insert learning outcome here>?"

Responses:

5 = I gained a great deal; 4 = a lot; 3 = somewhat; 2 = a little; 1 = nothing at all

- b) The "Two Questions." In line with Senate resolution 16-05, the questions "overall I would rate this course as" and "overall I would rate this instructor as" should no longer be a mandatory part of course evaluations. It is suggested that if instructors, departments or colleges wish to use these questions then they should appear at the end of the above question set as optional questions. The rationale for this is that the two broad questions are not targeted at any specific characteristic, and thus on their own it is unclear what they measure. On the other hand, either question set one or question set two are targeted to measure particular characteristics of the learning environment that the instructor has created. Asking the two questions at the end of such questions allows the student to respond to them in the context of the learning environment rather than a predisposed, questionably relevant evaluation of the course or instructor. This placement of these types of questions has been demonstrated to minimize personal bias toward instructors.
- c) Evaluating the fairness of the new question sets. We also suggest that as any new question sets are used, the results be systematically evaluated for bias. The CIE/OIRAE should be able to assist in this task. It is also recommended that this assessment of the questions take into account other variables that are known to affect evaluation results, such as class size, class level, and whether the course is required or elective. Bias comparisons should only be made between similar classes, such as senior level, small and elective; freshman, large, and required; etc.

(2) Open-response questions and textual analysis

We would also suggest that any question set should be accompanied by free response questions to solicit further student feedback. Our current free-response questions provide a good model. We suggest that the university acquire textual analysis software that can analyze feedback in large lecture classes and provide summarized feedback to instructors. We would suggest that the new evaluation software include this capability.

(3) Student confidentiality versus anonymity

Concerns have emerged about the civility, tenor, and inappropriateness of some student comments. Thus, we strongly suggest that software be used to identify responses containing vulgarity or inappropriate language. These responses should then be filtered and deleted. The introduction of students to the evaluation process should include the information that such vulgar/inappropriate language will result in deletion of their survey response. However, as expressed in the 1997 resolution on teaching evaluation, confidentiality of student evaluators should be protected.

(B) Mid-semester evaluations

Mid-semester evaluations can allow instructors to make changes mid-course and improve the course for the current group of students. There was a consensus on the TETF that mid-semester evaluations that provide this *formative* feedback are desirable. We should ensure that our new

evaluation software will allow instructors to request evaluations at any time during the semester with questions that they deem useful. We note that our current software package does not allow for such in-semester evaluations.

(C) Suggestions for Improving Student Feedback and Response Rates

(1) Improving the Quality and Usefulness of Student Feedback

- a) Place an article on constructive, professional feedback each semester in the Purdue Student Government newsletter just before end of semester evaluations open.
- b) Include an activity as part of a first year experience in each college to emphasize the nature and importance of constructive, professional feedback.
- c) Discuss, in appropriate First Year courses, student feedback on evaluations.
- d) In their classroom, instructors should discuss specifically the importance of student evaluations, and what type of feedback is useful.
- e) A webpage should be developed on constructive student feedback (Student Tips for Evaluations) and a link laced on the student course-instructor evaluation web page to this information. Samples of websites are given below.³ We suggest that resources be allocated for such a website, and that it be completed and rolled out when the new software/evaluation questions are introduced.
- f) Members of the student input subcommittee of the TETF as well as the co-chairs would like to partner with the website developers and CIE to provide feedback about website content and layout before it is released. The developers might also wish to engage with members of PSG to obtain feedback.
- g) Publicity about the website and its purpose should be disseminated through *Purdue Today*, social media and other appropriate means as a way to reach both faculty and students in a timely manner.
- h) A pop-up alert can be set for each course in our Learning Management System (currently Blackboard) to remind students of important points about offering constructive feedback.

(2) Using other Methods to Collect Student Feedback

Instructors (especially pre-tenure) can ask CIE to perform a Small Group Instructional Diagnosis (SGID). ⁴

(3) Improving Student Response Rates

- a) An instructors' page on the web site should provide tips on improving student response rates such as: telling students their honest and constructive feedback is valued and how it is used to improve the course; telling students who the audiences are for the feedback (the faculty member, mentors, etc.); sharing the results of a recent CIE study on student response rates to end-of-course evaluations that provides data driven methods for improving them; designating time in class for students to compete evaluations.
- b) Describe the end-of-semester course-instructor evaluations in the course syllabus.
- c) After any new evaluation questions have been evaluated for bias (and modified if necessary), the university should explore making results available to students who have

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completed evaluations or making results available only for courses that have achieved a certain minimum response rate.

III. Peer Assessment

(1) Overview

Faculty members, or others, review course materials, attend one or more classes (ideally multiple classes), observe the individual teaching, and provide a written assessment of their review/observations. Peer assessment can provide insights for an instructor from the perspective of other instructors.

For both summative and formative evaluations, this method can provide detailed information about aspects of teaching activity and performance, including nuanced feedback to instructors on what they do and don't do well. If the peers are subject matter experts, their feedback can also cover aspects of the curriculum that are not necessarily known to students or other non-expert peers. *As summative evaluation*, peer assessment can provide clear guidance to instructors, who can interact with the peers, and, over time, demonstrate improvement. *As formative evaluation*, reviewers can incorporate detailed opinions from experts in the field, as well as experts on teaching and teaching methodologies. This can include information on the progress of the instructor in becoming a better educator.

(2) Other Recommendations

Peer feedback should only be utilized with substantial support and direction from all areas of administration, including the members of the Office of the Provost, Deans and Associate Deans, and Department Heads. This support will likely require sustained education for faculty, and primary and area committee members about the forms and values of peer feedback. Peer feedback is best when used as part of a holistic evaluation of teaching effectiveness and professional pedagogical growth.

Inclusion of peer feedback in promotion and tenure documentation (along with the student and individual faculty voices) can provide a helpful triangulation of teaching effectiveness. Colleges and units should determine how they can best integrate peer feedback into the culture of their review process. Gradual integration of peer review would prevent the process from becoming an additional administrative burden or 'checklist', and ensure that adequate attention is paid by the evaluated faculty and their peers to the process.

Here are some specific suggestions to increase the likelihood that peer feedback can be effective at improving teaching and potentially become an integral and valued part of the regular promotion and tenure process for instructors:

- a) Provide useable and easily accessible template or templates with which faculty reviewers can deliver useful and informative feedback to evaluated instructors.
- b) Offer comprehensive but concise training to reviewers (possibly available online) on structuring and delivering feedback, so that instructors receive both constructive suggestions for improvement and affirmations of effective teaching practice.
- c) Peer reviews should be done with individual and collective support of the college teaching administration or impartial consultants from CIE. The inclusion of university

- support and independent observers can provide greater depth to peer feedback and increase faculty control over the process.
- d) Reviewed individuals should help choose their peer reviewer(s), possibly in consultation with the department head.
- e) While peer feedback may be most valuable in the early stages of an instructor's career, the process should be supported across all ranks as part of a culture of teaching improvement and not simply limited to pre-tenure track faculty. Incentives will likely be helpful for the inclusion of senior faculty who might otherwise be disinclined to participate.
- f) Units should report to their Deans on the manner in which they have integrated peer feedback into the teaching evaluation process at some point after initial implementation.

IV. Teaching Portfolios

(1) Overview

Our vision of a teaching portfolio is broad and could include many components, depending upon the individual faculty member. A beginning faculty member/instructor could use the teaching portfolio as a location to save course materials developed (syllabi, homework assignments, quizzes, exams, answer keys etc.) in the course materials section of the portfolio. Other sections of the teaching portfolio could include: peer feedback reports, scholarly output, student course evaluations, grants for teaching, etc. Use of teaching portfolios enables faculty to document and report all activities and outcomes related to teaching scholarship to be used for both faculty development and tenure and promotion purposes.

The teaching portfolio software would be structured so that the faculty member would see all of the materials. However, at the time when colleagues are reviewing the individual for promotion and tenure the faculty member could make only those documents/materials pertinent to the case accessible to colleagues.

One example of where this could be useful is when a faculty member develops and teaches a new course for the first time. Just as faculty members do not distribute those first grant proposals (that didn't get funded the first time – but after revision did get funded) they would want to use later (revised and improved) versions all illustrations of their teaching. One could also think of an "index" or printout of what is in the portfolio as the text that would appear in the promotion document. Thus, colleagues reviewing the promotion document could easily click to see the full version of the materials in the portfolio (much as people go to the internet and read research papers).

The subcommittee recognized that initial reactions from faculty (at all levels) about teaching portfolios will be mixed. Some will see the benefits, while others are intimidated and fear the extra work. Thus, it is important that the process be guided and include tools to assist in the process and also enhance the ability to evaluate teaching by faculty.

Software tools could assist in the creation and maintenance of a teaching portfolio. Subcommittee members conducted an initial review of different software including *Portfolium* and *Digital Measures*. Committee members were positively intrigued with the potential that exists when an appropriate software tool is used. It was recognized that there

is no current software that meets the needs – something would need to be developed new or created with significant adaptations from existing software.

(2) How would this work, and who would use this?

One of two approaches could be used to implement the use of teaching portfolios as part of the evaluation of teaching at Purdue. It could be identified as the standard across Purdue that every faculty member use a teaching portfolio to capture their teaching and teaching scholarship as a part of their overall program of teaching, research, and engagement. This would look different in different colleges and departments across the university.

Since the first approach, noted above, might be viewed as "dictatorial" a second approach is also identified. The use of teaching portfolios could be developed across Purdue using a positive incentive approach. In a manner similar to how IMPACT unfolded departments could sign up for a program that CIE would run, with positive financial incentives for faculty to develop their teaching portfolios and departments to use them to implement a holistic approach to evaluating teaching for tenure and promotion purposes.

It is noted that a common argument against teaching portfolios will be associated with the time to develop and maintain the teaching portfolio and the time to review all of the materials in a teaching portfolio. In particular the second concern links back to how faculty would, in fact, evaluate their colleagues for tenure and promotion.

Our approach is that the tenure and promotion document would contain a listing of items that are in the portfolio (similar to the grants, publications, professional presentations that are listed in the Research section). One could evaluate the list and then click to find the full documents when interested in learning more, in a manner similar to looking up a full journal article. In many departments one or two faculty members are assigned to present the case for tenure and promotion. The more in-depth evaluation would be undertaken by the colleague presenting in many cases. More ambitiously, it would be possible in promotion and tenure cases to recruit a reader external to the department, perhaps from the Teaching Academy, to write an external review letter specific to teaching to be included in the candidate's materials as promotion and tenure is considered.

V. Different Approaches for Different Faculty

We distinguish between uses of these various evaluation methods for faculty whose appointment and career progress revolve primarily around research vs. teaching vs. engagement. Overall, we concluded the university places almost exclusive emphasis on summative evaluations for research faculty, while the TETF also placed emphasis on formative evaluations for research faculty. We believe that evaluations of teaching should be for both formative and summative purposes, although the methods for each may vary.

In addition, faculty members with majority teaching appointments are hired and promoted largely on the basis of their teaching performance and their scholarship of teaching and learning. Evidence for the latter includes classroom innovation and activity and the dissemination of that work to peers and broader audiences. Documenting these activities and their impact will probably require more detail regarding teaching, innovations, and dissemination of teaching activity.

Therefore, we suggest that the Provost provide clear guidance to deans, school/department heads, and primary committees to ensure that the methods that they use to evaluate teaching are rich enough to adequately document the contributions of teaching-intensive faculty.

VI. Suggestions for Promotion and Tenure

(A) Philosophical Foundation

Teaching effectiveness is the degree to which instructors are successful at helping students master the skills and knowledge with which they are tasked to impart. As described above, this can/should be measured through both student course feedback, and through assessments of student learning, competencies, and accomplishments. Evaluations of teaching should focus on two characteristics of instructors:

(1) Do they effectively impart the knowledge and skills embedded in the course?

(2) Do they strive to improve their teaching?

Rather than the popularity/likeability of instructors or a broad subjective assessment of their effectiveness, these two characteristics should serve as the core of teaching evaluation systems used in promotion at Purdue. "One size does not fit all," meaning that individual academic units should be given guidelines but also the flexibility to craft an overall approach that documents these core characteristics in their respective disciplines.

The University and its academic units must develop and utilize processes that ensure that teaching evaluation is ongoing and continually improves teaching and thus student learning. Faculty must see that the culture of Purdue University as well as that of each college, school, and department is one that values, supports, and rewards teaching excellence. This pervasive culture recognizing the central importance and value of teaching can only be achieved if this culture is inculcated throughout all academic levels at Purdue, and the Provost ensures that the Colleges address instructional evaluation and improvement as fundamental activities.

In this context, formative evaluations should be only formative. Instructors must be free to use them without fear that data will be applied summatively to promotion and tenure decisions.

(B) Specific Suggestions for Promotion and Tenure

(1) Schools/departments/divisions should be required to present regularly to the Dean of their College their measures of teaching effectiveness and their processes for emphasizing the importance of teaching and its improvement. Such procedures should include evaluation methods, identification of opportunities for improvement, and actions implemented for addressing those opportunities. Units should show how past actions have addressed recognized weaknesses. The goal is to build a culture that uses measures of teaching excellence to inform promotion and tenure decisions.

- (2) Likewise, the Deans should present regularly to the Provost these same data for their Colleges. Moreover, the data should show how they inform promotion and tenure decisions.
- (3) Student evaluations of teaching should be structured to reflect how the knowledge and skills in a course were mastered by students, rather than broad measures of likeability. These evaluations should provide evidence that can be used to support promotion and tenure decisions. Summative evaluation data that measure instructor effectiveness should include documentation of efforts to improve teaching effectiveness as a significant component in promotion and tenure procedures.
- (4) Formative evaluations are just that: used to improve instructor effectiveness but not to be used summatively. Research indicates that when instructors are not effective, formative evaluations can provide guidance on specific aspects of their methods or approach that might be preventing them from being effective. A critical part of formative evaluation is that instructors must be free to seek it out without fear that data will be used summatively in promotion and tenure decisions.
- (5) Individual academic units should be free to innovate to achieve improvements in instruction and to ensure and document instructor effectiveness, but they should have central guidance on a solid set of core approaches to evaluation. Best practices for any evaluation approach should be identified and disseminated throughout the university.

VII. References

- Michael D. Johnson et al., "Effects of Course and Instructor Characteristics on Student Evaluation of Teaching across a College of Engineering," J. of Eng. Education, vol. 102, No 2. pp. 289-318.
- 2. https://salgsite.net/ (Accessed September 2018).
- 3. Sample websites:

https://teachingcenter.wustl.edu/resources/feedback-on-teaching/encouragingstudentstoprovidefeedback/

https://teaching.berkeley.edu/how-can-instructors-encourage-students-complete-course-evaluations-and-provide-informative-responses

https://cft.vanderbilt.edu/guides-sub-pages/student-evaluations/

https://atl.wsu.edu/documents/2015/02/course-evaluations-and-constructive-criticism-talking-with-students.pdf/

https://its.uiowa.edu/support/article/110531

https://www.purdue.edu/cie/teachingresources/earlyfeedback.html