UW-Madison Assessment for Academic Programs - A Minimalist Approach

What is “assessment”? In this context “assessment” is the term of art for asking what do we expect students learn, how do we know that they are learning it, and how and when do we use evidence of learning to make improvements in our programs.

It has also been defined this way: Assessment of student learning is the systematic gathering of information about student learning and the factors that affect learning, undertaken with the resources, time, and expertise available, for the purpose of improving the learning (B. Walvoord, 2006).

Why is assessment necessary? Assessment is a way to know if students are learning what the program faculty expect that they learn; assessment evidence shows where to make changes for improvement and what is already working well. Assessment makes formal and systematic the on-going and often informal focus of faculty on the quality of the student learning experience.

Since the early 1990s there have been calls for universities to more clearly document how we know that students are meeting the learning goals we set for them. Since 1995, UW-Madison’s formal assessment plans have mandated that: 1. academic programs have an assessment plan and; 2. conduct at least one assessment activity annually. The program review guidelines adopted in 2010 make explicit the expectation that academic program faculty are assessing student learning. More and more students, parents, employers and other stakeholders want us to be able to show that students are learning.

What do program faculty have to do? The assessment plan has a handful of required elements:
1. statements of what the program faculty expect students to learn in the program;
2. a manageable plan that can be implemented for knowing how well students are doing and;
3. a reporting and feedback mechanism so that the evidence is used to improve elements of the program that need it and to strengthen and maintain elements that are working well.

Many programs and departments have well-established assessment programs that go beyond the very minimalistic basics listed below.

THE MINIMALIST ASSESSMENT PLAN

1. Learning Outcomes (or learning goals) – At least three statements that specify the knowledge and/or skills a student is expected to have learned by completion of the program.
2. One direct measure of how well the students in the program, collectively, are meeting expectations for learning.
3. One indirect measure of how well students in the program, collectively, are meeting expectations.
4. One annual program faculty meeting that will discuss the evidence collected over the year, discuss what it means for the program, and define any next steps.
5. Short written annual report summarizing the activity that is made publicly available through a web site.

More detail is provided on each element below.
MORE DETAIL

1. Learning Outcomes – At least three statements that define the knowledge and skills a student is expected to have learned by completion of the program.

Learning outcomes state what students are expected to know or are able to do when they've completed the program.

Defining outcomes or expectations can take a long time. For the minimalist approach, consider adopting outcomes that have been articulated by others:

- Use and expand on the Essential Learning Outcomes, which have been adopted by UW-Madison as overarching expectations for the student learning experience.
- Use outcomes or expectations articulated by a professional organization.
- Tweak the outcomes/expectations statements of a closely related discipline at UW-Madison or a peer program at another university.

Examples:

Learning outcomes for Biology majors – Graduates will be able to:

A. Describe and apply basic biological concepts and information.
B. Design and conduct an experiment to test hypothesis in an area of biology, and communicate the results in writing and orally to a scientific audience.
C. Understand and apply ethical principles of the discipline.

Learning outcomes for PhD Sociology – Graduates will be able to:

A. Exhibit an expert depth of knowledge in a specialty area.
B. Produce publishable research/scholarship.
C. Follow ethical principles of the discipline for using sources, human subjects, and for working with colleagues.

2. One direct measure of how well the students in the program, collectively, are meeting the learning goals.

Examples of direct assessment:

- Faculty collect examples of student work from the capstone course. A group of faculty evaluate the work using explicit criteria, review the evaluation against program standards to identify areas of program strength (to be protected and amplified) or weakness (potential for improvement). Such an assessment uses a rubric, or scoring sheet, that is designed for the purpose and sets standards for the program.
- For graduate programs, faculty create a rubric for evaluating performance on the prelim and/or the dissertation defense. These rubrics include neither the faculty nor the student name. Periodically (annually or once every two or three years) the rubrics are reviewed to identify
areas of program strength (to be protected and amplified) or weakness (potential for improvement). [attach example rubric]

- A standardized test is given to all graduating seniors. A standard is set for the program of a percent of seniors who will achieve specified levels of achievement, for example 95% pass rate and 50% high achievement rate. If the standard is not met or exceeded, the program can review details of testing to identify areas for improvement. This approach is usually most effective if students are required to take a test for licensure or to be credentialed as a professional.

- Embedded testing is another method. Set questions are embedded within upper-level work and how well students do collectively is evaluated. For example; in a microbiology program an embedded test might be a practicum test of sterile technique; in a computer science program an embedded test might be the development of a computer program; in an art history program a student may be asked to write an analysis/critique of a piece of art. The embedded test is given to all students, and the results are reviewed at the end of the year (or on a two or three year cycle) without student or instructor names as an indicator of the effectiveness of the program.

3. **One indirect measure** of how well students in the program, collectively, are meeting expectations.

Examples of indirect assessment:

- Pen/paper or on-line survey of seniors that would include three questions:  I. How well did your educational experience help you [insert learning goal language]? Use a scale such as extremely well, very well, adequately, not very well, not at all, not applicable.  ii. What aspects of your educational experience contributed most to your learning? Take an open-ended response to this question.  III. What elements in the program could be improved to improve the learning experience? Again, accept an open-ended response.
- Focus group of seniors that uses questions II and III from the survey.
- Alumni surveys using similar questions to the senior survey.
- Employment rates are useful in some disciplines.
- Employer ratings are occasionally a useful approach if the employer base is sufficiently well-identified.
- For undergraduate programs, use the program-specific report from the Post-Graduation Plans questionnaire (asked of all graduates, [http://apir.wisc.edu/pgp.htm](http://apir.wisc.edu/pgp.htm)). Note that this product was designed to serve this need for any undergraduate academic major that finds it useful. All that is needed is to use the information provided by APiR.

Indirect measures are usually favored because they are perceived as easier to conduct. However, if a program has limited resources, a single direct measure is better than multiple indirect measures.

4. **One annual program faculty meeting** that will discuss the evaluative evidence, analyze what it means for the program, and define any next steps.

Assessment results should be discussed at least one meeting of the program faculty and staff annually. Ideally a written report would be prepared in advance. Program faculty would submit materials in advance, or a small group of faculty and staff who had conducted reviews would compile materials in a
way to communicate it effectively to colleagues. In some cases, the structure of assessment in the program may require that each faculty member bring the results of their direct assessment activities and their observations to the meeting. Materials may be formally prepared, or in some cases there are no formally prepared materials and the record of the faculty discussion is what comprises the record.

5. Annual Report

An annual report must be prepared and held in the department as part of the material that will contribute to the 10-year program review. Reports are also to be submitted to the school/college assessment coordinator. The annual report is comprised of:

- Short program summary (can be an update of last year’s summary)
- Statements of learning expectations
- Description of the assessment activity for the year
- Description of findings
- Summary of recommendations of changes that will improve student learning
- Plan for implementing changes and any progress made so far, or barriers to progress
- Short description of planned assessment activities for the coming year

Resources

Making Departmental Assessment Clear, Simple, Sustainable, and Useful. Barbara Walvoord, 2006. Walvoord’s document is the basis for this document and is available under the “Resources” panel at http://apir.wisc.edu/programreview.htm

For examples, see the Walvoord article.

College of Letters & Science Example: https://kb.wisc.edu/ls/page.php?id=25242

Undergraduate Program Profile – trends in degrees, enrollments, time-to-degree, by major: http://apir.wisc.edu/students.htm

Undergraduate Post-Graduation Plans Reports – see the web page for standard reports and how to request program-specific requests: http://apir.wisc.edu/pgp.htm