# Guidelines for the Assessment of Student Learning Illinois Wesleyan University

To assist departments, schools, interdisciplinary programs, and university-wide programs (hereafter, "academic units") realize more effective assessments of their students' learning, the Assessment Committee provides the following guidelines. Our intention is to assist academic units with the sometimes challenging but always informative—and often rewarding—endeavor of discovering to what extent student learning is consistent with an academic unit's learning goals.

This guide covers the University's academic assessment program, including:

- the *philosophy* of assessment;
- the *process* of assessment;
- the designation of Assessment Liaisons;
- the components of the *Strategic Assessment Plan*;
- the components of the Yearly Action Plan; and
- the components of the Annual Assessment Report.

Where appropriate, these discussions also include explicit identification of the criteria the Committee uses to offer feedback on assessment planning and reporting.

The Assessment Committee assists academic units in developing meaningful, workable assessment programs that serve their unique interests. If you have questions or concerns at any point in the assessment process, please contact the Chair of the Assessment Committee.

Committee Members, 2014-2015:

Bob Erlewine Andrew Shallue Dani Snyder-Young (chair) Bill West Jake Sloan, Student Senate representative Michael Thompson, Assistant Vice President for Institutional Research, Planning, and Evaluation (*ex officio*)

#### THE PHILOSOPHY

Are our students learning what we expect them to learn? To what extent? What is working in our teaching? What curricular programs might be strengthened, or re-conceptualized? The answers to such questions are too important to leave to intuition and conjecture. Assessment answers these questions, and guides subsequent planning, in ways that are meaningful and systematic. Assessment provides critical feedback that both encourages and challenges us. It

can confirm successes, and it can offer insights that can lead academic units to improve student learning through curricular revision and faculty development initiatives.

The Assessment Committee's role in the assessment process is not to evaluate the *content* of a department's program, but instead focuses on assisting with the assessment *process*. The Committee supports each academic unit to create an environment in which assessment of student learning is done thoughtfully, thoroughly, and regularly. Working with the Assistant Vice President for Institutional Research, Planning, and Evaluation, the Assessment Committee gathers assessment information for internal review, as well as review by external agencies.

# THE PROCESS

In a nutshell, in assessment academic units use their own statements of purpose and educational objectives to frame statements about the characteristics and competencies majors should acquire, and then measure the extent to which students actually meet those objectives. By measuring what and how much students actually do learn, faculty can then determine the relation between their intentions and students' achievement. When faculty expectations and student performance are at odds, faculty need to determine the reasons for the discrepancy. Academic units may then chart a reasonable course of action in response, including making adjustments to curriculum and/or requesting resources to enhance student learning. Over time, academic units also likely will revise student learning goals and assessment measures.

Faculty, students, and disciplines change over time, and so, in order to keep pursuing academic excellence, the assessment process must be ongoing and regular. Each academic unit's overarching assessment agenda will be described in a Strategic Assessment Plan, an evolving document that describes and explains the academic unit's long-term assessment program. On an annual basis, each academic unit engages in assessment which consists of the following activities:

- revise aspects of the Strategic Assessment Plan and communicate the revisions to the Assessment Committee (as needed),
- submit Annual Assessment Reports, reporting on assessment activities from the previous year,
- implement and analyze the assessment measures employed during the current academic year, and
- develop and submit a new Yearly Action Plan, describing your academic unit's assessment activities for the year-to-come.

(Please note that the terminology used here is described in detail further on. Additionally, for ease of reference, these and other relevant terms are defined in a glossary in Appendix A.)

#### Who Needs To Do Assessment?

Every major must be assessed. In academic units offering more than one degree, each degree must be assessed. Minors without a similar major also must be assessed.

Each major, degree, and stand-alone minor must have an up-to-date Strategic Assessment Plan on file and each year must submit a Yearly Action Plan and Annual Assessment Report. In a year in which a major, degree, and/or minor has enrollment so low that it makes annual assessment unfeasible (e.g., no graduating seniors), that academic unit must submit a brief report to explain how it qualifies for an exemption and what its plans are for student learning assessment and reporting.

#### Calendar of Annual Assessment Activities

#### Start of the academic year

At the beginning of each academic year, it is the responsibility of each academic unit to ensure that the most up-to-date version of the Strategic Assessment Plan is on file with the Associate Dean of the Curriculum. If a more up-to-date version of the Strategic Assessment Plan needs to be turned in, please submit it electronically to <u>assessment@iwu.edu</u>.

#### The final Monday in September

Annual Assessment Reports are due electronically to <u>assessment@iwu.edu</u>. Annual Assessment Reports cover the assessment work undertaken in the previous year, so, for example, an Annual Assessment Report submitted in September, 2014, typically will cover assessment activities described in the Yearly Action Plan submitted in January, 2013, and carried out during the 2013-2014 academic year.

#### Fall semester

Begin annual assessment. For example, academic units may lay the groundwork for assessment by developing surveys, collecting papers, conducting pre-tests, etc.

The Assessment Committee will review Annual Assessment Reports, and evaluate and provide feedback about the effectiveness of each academic unit's assessment process by the end of the fall semester. The Committee also will collect, maintain, and make available to appropriate constituencies a repository of Annual Assessment Reports from all academic units.

#### The final Monday in January

Yearly Action Plans are due electronically to <u>assessment@iwu.edu</u>. Yearly Action Plans describe assessment work to be undertaken in the next academic year, so, for example, a Yearly Action Plan submitted in January, 2014, will describe assessment activities to be undertaken in the 2014-2015 academic year.

#### The first Monday in April

Each academic unit must select an Assessment Liaison and, via e-mail, make this selection known to the Chair of the Assessment Committee.

#### Spring semester/May Term

Continue assessment. For example, academic units may implement measures and then meet to analyze, discuss, and develop ways to act upon the gathered data/information.

The Assessment Committee will review Yearly Action Plans, and evaluate and provide feedback about the potential effectiveness of each academic unit's plan by the end of the fall semester. The Committee also will periodically review Strategic Assessment Plans and communicate back to academic units in a timely fashion.

A calendar of academic units' annual assessment activities can be found on the Student Learning Assessment web page, available at http://www.iwu.edu/instres/student-learning.html.

#### ASSESSMENT LIAISONS

The Assessment Liaison serves as the point person for an academic unit's annual assessment activities. Each academic unit should select a faculty member to serve as an Assessment Liaison and make that person known (via e-mail message) to the Chair of the Assessment Committee by the first Monday of April of each academic year. While an academic unit's chair or director could serve as the Assessment Liaison, each academic unit should create its own system for assigning this task. Please note that, while the Assessment Liaison plays an important role in an academic unit's annual assessment activities by helping to ensure proper organization, operation, and reporting, assessment is the responsibility of all members of an academic unit.

#### THE STRATEGIC ASSESSMENT PLAN

—approximately 2-4 pages; a revised Strategic Assessment Plan is due within two years after an academic unit completes its self-study; a copy of the most up-to-date version of the Strategic Assessment Plan must be on file with the Assessment Committee.

The Strategic Assessment Plan describes an academic unit's overarching assessment agenda—it very likely will guide annual assessment activities for years. Formulating a Strategic Assessment Plan helps the academic unit to organize its specific assessment projects, described in Yearly Action Plans (discussed below). Having the most up-to-date version of the Strategic Assessment Plan on file, and therefore accessible to the Assessment Committee, allows for productive exchange between the Committee and academic units, ensuring that plans are sound, that the work that they detail will be as worthwhile—and that the data they offer will be as informative—as possible.

A revised Strategic Assessment Plan must be submitted within two years after an academic unit completes a self-study. Please note that an academic unit's Strategic Assessment Plan will not likely change from year to year, to the extent that an academic unit's curriculum does not change

considerably across time. However, if substantial changes are made to the Strategic Assessment Plan between self-studies, a new copy needs to be submitted.

Academic units are asked to respond to three questions (1-3, listed below) in their Strategic Assessment Plan. Below each question is a description of what an answer to that question might entail, and explicit identification of the criteria the Committee uses to guide its response. Though each section is discussed as a discrete entity, throughout the plan there should be a strong interlocking narrative among the parts. In other words, each piece should connect conceptually with every other piece—selected goal(s) and rationale with all goals, measures with selected goals, planned methods of analysis with measures.

# 1. What are the student learning goals of your academic unit? How did your academic unit arrive at these goals? How are your academic unit's student learning goals shared with relevant constituencies?

Student learning goals are characteristics and competencies students in your academic unit should acquire. If your academic unit offers a major, focus on the characteristics and competencies expected from the major. Academic units offering majors and minors may wish to include minors in their assessment work. List and describe your academic unit's student learning goals, including a brief discussion of how your academic unit arrived at these goals (for example, departmental decision-making processes, consideration of feedback from an external review, statements of best practices from relevant professional organizations, etc).

Sharing student learning goals encourages discussion and engagement among all members of an academic unit. It sets expectations, and helps academic units achieve positive student learning outcomes. How are your student learning goals shared with faculty, students, staff, the wider University community, and other relevant constituencies? In the University catalog? On your academic unit's website? In departmental handbooks? On syllabi? On admission's materials?

QUESTIONS ASKED BY THE ASSESSMENT COMMITTEE

- o Are the academic unit's student learning goals clearly articulated?
- Is there some description of the process(es) by which learning goals were determined?
- Are the academic unit's student learning goals easily accessible to faculty, students, and other relevant constituencies?

# 2. What measures do you plan to use to assess student learning goals? Why?

You must make clear how you plan to measure each of your student learning goals, and explain your reasoning.

There are many ways to assess student learning, and each academic unit should select methods that will address their needs. It is expected that multiple measures be used, including at least one direct measure. Direct measures require students to demonstrate knowledge and competencies as they respond to the instrument itself. Indirect measures require that students reflect on their

learning rather than demonstrate it. (Examples of direct and indirect measures are available in Appendix B.) Both kinds of measures, as well as others that might be devised, can be valuable to academic units in terms of providing perspective on student learning.

Generally, academic units should use dependable measurement tools to which academic units already have access, especially those previously built into the curriculum. However, it is important to ensure that your measures actually measure what you hope they will (that they are *well-targeted*) and that they consistently measure the same thing each time (that they are *dependable*).

The assessment projects of academic units generally are excluded from Institutional Review Board (IRB) review. (Please see the next paragraph for exceptions.) Academic units that collect student work or administer anonymous surveys for the purpose of program assessment do not need student consent, provided that no personal student behaviors are addressed in the assessments, all personally identifiable information is removed, and the results are used for internal university and accreditation purposes. Anonymous surveys, however, do require the use of a "project information page" that summarizes the purpose of the study for all potential subjects. Academic units must maintain student confidentiality in the storage of data, if any.

IRB review *is* required under the following conditions:

- an academic unit, or a member of an academic unit, plans to disseminate or publish data beyond the improvement of the academic unit or accreditation purposes; and/or
- an academic unit plans to administer a confidential study, in which a subject's name is linked to a code, number, or other type of identifier (as opposed to an anonymous study, in which information provided by a subject cannot be linked to any type of identifier).

If IRB review is required, please follow IWU IRB guidelines (<u>http://www.iwu.edu/irb/</u>). If you have any questions about IRB policies and procedures as they pertain to the assessment of student learning, please contact the IRB chair.

#### QUESTIONS ASKED BY THE ASSESSMENT COMMITTEE

- Are the measures of the goals clearly defined?
- Have multiple measures been included? Is there at least one direct measure included in the set of measures?
- Understanding the Strategic Assessment Plan to be an evolving document, has the choice of measures been well-supported? That is, is it clear that the measures are well-targeted and dependable?

# 3. How does your academic unit plan to process the information gathered through the various measures?

To improve academic and co-curricular programs, gathered information needs to be discussed by faculty within the academic unit and summarized. Describe your feedback process.

# THE YEARLY ACTION PLAN

-approximately one page; due each year on the final Monday of January

Assessment is ongoing—your academic unit likely will choose to focus on a subset of specific student learning goals from its Strategic Assessment Plan to measure in any particular year. The Yearly Action Plan describes and explains the next academic year's assessment projects.

1. What specific student learning goal(s) has your academic unit determined should be measured? Why has your academic unit chosen to measure these particular learning goals in the next academic year? In particular, how will the activities described in your academic unit's Yearly Action Plan play a role in your academic unit's larger Strategic Assessment Plan?

Academic units have identified a number of student learning goals in the Strategic Assessment Plan. Which of these goals, specifically, will your academic unit assess, and why?

QUESTIONS ASKED BY THE ASSESSMENT COMMITTEE

- Does the academic unit specify which learning goal(s) it plans to investigate?
- Does it offer a well-considered rationale for this decision?
  - 2. How will your academic unit measure the selected student learning goals? Identify and describe all measures, including at least one direct measure.

Information on direct and indirect measures may be found in Appendix B.

QUESTION ASKED BY THE ASSESSMENT COMMITTEE

- Has the academic unit identified and described the measures it will use, including at least one direct measure?
  - 3. What is your academic unit's reason for employing these particular measures to assess the particular goals that have been identified?

As noted in the description of the Strategic Assessment Plan, it is important to ensure that your academic unit's measures actually measure what the unit intends them to (that they are *well-targeted*) and that they consistently measure the same thing each time (that they are *dependable*).

QUESTION ASKED BY THE ASSESSMENT COMMITTEE

- Has the choice of measure(s) been well-supported? That is, is it clear the measures are well-targeted and dependable?
  - 4. Are the proposed assessment activities exempt from IRB review, or do they require IRB

#### review?

Please note: As only the IRB may grant exemptions, the Assessment Committee will assist those academic units requesting exempt status for their proposed assessment activities by annually filing a request for exemption on their behalf. In as timely a fashion as possible, the Assessment Committee will inform academic units of their status in regard to IRB requirements.

QUESTION ASKED BY THE ASSESSMENT COMMITTEE

• Are the proposed assessment activities exempt from IRB review, or do they require IRB review, and if so is IRB review included in the Yearly Action Plan?

#### THE ANNUAL ASSESSMENT REPORT

-approximately 5-6 pages; due each year on the final Monday in September

The Annual Assessment Report serves many purposes. First and foremost, it is a record of an academic unit's assessment activities in the previous academic year: what your academic unit has assessed, and why, and what your academic unit is doing in response to its findings: what strengths were revealed by or changes were suggested, and then made, based on assessment data? Additionally, the report functions to inform the Assessment Committee of the progress the academic unit has made in carrying out its Strategic Assessment Plan, allowing the Assessment Committee to provide feedback. Finally, these reports serve the crucial function of documenting ongoing assessment activities by academic units for internal use and for external review agencies.

Academic units are asked to address six topics (1-6, listed below) in their Annual Assessment Reports, and to submit separately a summary of the Annual Assessment Report. Below each topic is a description of what a response might entail, and explicit identification of the criteria the Committee uses to guide its own responses to the Reports. Responses to some of these questions, especially 1-2, often may be copied (with minor revisions) from the relevant Yearly Action Plan.

As with the Strategic Assessment Plan, throughout the report there should be a strong interlocking narrative among the parts. In other words, each piece should connect conceptually with every other piece—goals with mission, measures with goals, and feedback mechanisms with learning outcomes.

# 1. Attach the relevant Yearly Action Plan. If applicable, explain any significant changes you made to this plan while your academic unit was implementing it.

Annual Assessment Reports address assessment activities that were outlined in an earlier Yearly Action Plan. Share that Yearly Action Plan with the Committee. As assessment needs to be flexible and responsive, it is understood that a Plan may have to be revised. Please explain any significant changes you made to the relevant Yearly Action Plan while you were implementing it.

QUESTIONS ASKED BY THE ASSESSMENT COMMITTEE

- Is the relevant Yearly Action Plan attached?
- Are any significant changes to the Yearly Action Plan—such as additional or revised goal(s) and/or measure(s)—explained?

#### 2. Describe assessment measures that were used during the year.

Describe assessment measures that were used during the year, including the specific student learning goals measured, the classes and number of students, or percentage of majors and minors, involved. For example: "Student learning goal 1: critical thinking. Pre-tests were given to 31 students in Introduction to Rocket Surgery 101. These results were compared to results of the same tests given to 13 students in Advanced Rocket Surgery. Exit surveys were given to all graduating seniors with 12 out of 15 responding." If tests were administered or a rubric was used, please provide a copy in an appendix at the end of your report.

QUESTIONS ASKED BY THE ASSESSMENT COMMITTEE

- Are the goals and measures clearly defined?
- What direct measure was implemented?
- Have multiple measures been included? (Note: academic units are *not* required to use multiple measures every year. This question is asked for the purposes of Assessment Committee record-keeping.)

#### 3. Summarize the data/results from your measures.

Provide a summary of data/results from measures used by your academic unit. Summaries may include quantitative and/or qualitative data. *Please do not send papers, exams, surveys, etc.* Your academic unit can keep files of these as it sees fit. Once these instruments have been evaluated and the necessary summary has been made, your academic unit may keep or destroy them, as is deemed appropriate, bearing in mind the need to maintain confidentiality.

#### QUESTIONS ASKED BY THE ASSESSMENT COMMITTEE

- Have data been summarized?
- Do the measures in fact assess what the academic unit intended them to measure, and do the measures do so consistently? That is, are the measures well-targeted and dependable?

#### 4. Describe the process by which you evaluated your data.

Academic units are urged to reflect on the findings from the measures, and on the methods and standards used to reach conclusions; so, once the data are gathered, how did your academic unit go about sharing and analyzing the data? What methods, subjective or objective, did your academic unit use to assess your findings? A common subjective method is conversation among an academic unit's faculty. You might report details about that conversation, such as the following: Was it a retreat or a meeting set aside for this purpose? Who was involved? All

members of your academic unit? Anybody in addition to members of your academic unit? When did it take place? Commonly, objective measures involve statistical analyses of tests administered – some description of the method should be provided. Who performed this analysis? Using what tools?

QUESTION ASKED BY THE ASSESSMENT COMMITTEE o Is the evaluation process clearly defined?

# 5. Describe what you learned as a result of the evaluation process.

A feedback mechanism is some systematic way for an academic unit as a whole to reflect and act on the results of the assessment measures of student learning. Examples typically include retreats or other meetings in which assessment is addressed in a structured discussion. Developing this report also can be considered a feedback mechanism, and it should be shared with departmental faculty for their information and approval, especially when it includes programmatic changes.

What was the substance of your academic unit's evaluation process? What did your academic unit learn as a result of engaging in the process? It is important to demonstrate that your academic unit has examined thoroughly the data gathered and has thoughtfully analyzed how the data compare to the academic unit's curricular goals. The evaluation should not just state conclusions, but should describe the results of the various study measures as well as the implications of the results—do students meet your academic unit's learning goals?

An academic unit may find gaps or other inadequacies in its assessment methods. It is appropriate to note those conclusions here and make recommendations for future assessment practices. In this way, the annual Report will serve as a useful record of how your Strategic Assessment Plan is evolving.

QUESTION ASKED BY THE ASSESSMENT COMMITTEE • Does the academic unit clearly describe what it learned?

# 6. What does your academic unit plan to do with the information it has evaluated?

*Closing the feedback loop is essential.* Please describe exactly what it is your academic unit has done to factor what it learned back into the curriculum, including co-curricular programs. Did the results of your academic unit's analysis confirm the achievement of its goals? Or did the results suggest there are ways your academic unit can improve reaching those goals?

In particular, report any necessary changes, and what changes (large or small) have been considered and any that will be implemented as a result of data. If these changes will require resources beyond what your academic unit can provide, including, for example, faculty development opportunities and initiatives, please indicate what your academic unit anticipates needing and where it will seek these resources. If no changes are planned, briefly describe how the data suggest this as an appropriate course of action.

Some data (especially longitudinal data) will take several years to collect and the results from those measures might not be available yet, though comparison of different cohorts may be possible (e.g., comparing first year and senior performances for this year). In this year's Annual Assessment Report please include comparisons your academic unit is able to make using this year's measures and data, as well as comparisons with similar results obtained last year. Similarly, feedback and changes may not be in sync with data. Your academic unit may have made changes last fall based on assessment data from last year. Your academic unit may not be ready to make changes yet (or even to have the conversation about potential changes) using this year's results. The Annual Assessment Report should be just that—a report of the most recent year's assessment activities—even if the activities are not all from the same cycle.

QUESTION ASKED BY THE ASSESSMENT COMMITTEE

• Has the academic unit considered future actions based on assessment results and/or described any actions resulting from assessment?

#### Provide a summary of your Annual Assessment Report.

In a separate document, in approximately 200-300 words, summarize your Annual Assessment Report: state the learning goal(s) measured; state the type(s) of measure(s) used; summarize the data; describe the evaluation of the data; describe what was learned from the evaluation process; and describe what your academic unit has done or plans to do with the information and insights gathered from the year's assessment activities.

Sharing the results of assessment with appropriate constituencies, including students, is a vital part of closing the assessment feedback loop. Posted on an Assessment Committee website, this summary may serve as a key component of an academic unit's public reporting of assessment activities and outcomes. While the summary must accurately summarize the Annual Assessment Report, it also provides academic units some flexibility in terms of how the Report is presented to relevant constituencies.

QUESTION ASKED BY THE ASSESSMENT COMMITTEE • Has the academic unit provided an accurate summary?

#### Acknowledgements

These Guidelines have been modeled upon and/or borrowed language from assessment documents from Denison University, Ohio Wesleyan University, the University of Denver, and the University of Hawaii, Manoa. Our thanks to these institutions for granting us permission to use their documents in these ways.

### Appendix A

#### GLOSSARY

Academic unit: any department, school, interdisciplinary program, and university-wide program.

Annual Assessment Report: an approximately 5-6 page document, due the final Monday in September, that records an academic unit's assessment activities in the previous academic year: what an academic unit has assessed, and why, and what an academic unit is doing in response to its findings: what strengths were revealed or changes were suggested, and then made, based on assessment data?

*Anonymous study*: a study in which information provided by a subject cannot be linked to any type of identifier. Often requires only the use of a "project information page" that summarizes the purpose of the study for all potential subjects. Does not require review by the Institutional Review Board.

Assessment Liaison: the member of an academic unit (often the chair or director) who ensures that the academic unit completes its annual assessment activities.

*Confidential study*: a study in which a subject's name is linked to a code, number, or other type of identifier. Often requires informed consent, and therefore requires review by the Institutional Review Board.

*Direct Measure*: a method of assessment that requires students to demonstrate knowledge and competencies as they respond to the instrument itself. (For examples, please consult Appendix C.)

*Feedback mechanism*: the systematic way an academic unit discusses, shares, and sometimes acts upon the results of the assessment measures of student learning.

*Indirect Measure*: a method of assessment that requires students to reflect on their learning rather than demonstrate it. (For examples, please consult Appendix C.)

Measure: a method of assessment.

*Non-Measure*: a method of assessment that seems to offer information about student academic achievement but that does not in fact provide evidence of learning. (For examples, please consult Appendix C.)

*Qualitative measures*: methods of assessment that describe meaning rather than draw statistical inferences.

*Quantitative measures*: methods of assessment that employ statistical, mathematical, and/or computational techniques to focus on numbers and frequencies rather than on meaning and experience.

*Rubric*: a guide listing specific evaluative criteria.

*Strategic Assessment Plan*: a description of an academic unit's overarching assessment agenda which helps the academic unit to organize its specific assessment projects, described in Yearly Action Plans.

*Student learning goals*: characteristics and competencies students in your academic unit should acquire.

*Yearly Action Plan*: an approximately one page document, due the final Monday in January, that describes and explains the next academic year's assessment projects.

# Appendix B

#### KINDS OF MEASURES

The following discussion draws heavily on "Opportunities for Improvement: Advice from Consultant-Evaluators on Programs to Assess Student Learning" (1997), a helpful article produced by Cecilia López for the North Central Association.

Academic unit assessments evaluate the *value added by the program*. The best methods examine results of pre- and post-testing majors. These are particularly useful benchmarks by which to gauge learning from entry to exit, and thereby to measure "value added." Not all academic units will be able to perform pre- and post-tests because of resources or applicability of the method to a particular content area. Further, pre-testing is not necessary if one is highly confident that students know little or none of the content or skills they are to master through completing the program. In most content areas, however, pre-testing is useful in obtaining baseline data, and faculty should not assume that the new student enters a program knowing little or nothing. But there are ways to gain the benefits of pre- and post-testing, or at least function in the spirit of experimental design, through such methods as student portfolios.

Measures come in a variety of types. We will describe briefly *direct*, *indirect*, and *non-measures* of student learning typically employed.

*Direct measures* of student learning, whether quantitative or qualitative, are the most appropriate measures of student learning and are understood to include but are not limited to:

- *evaluation of capstone experience*—the structure and content of the capstone experience should be clearly linked with the published statement of the purposes and educational objectives of the academic unit, i.e., the articulation of what its graduates are expected to learn by completion of the program of study.
- *portfolio assessment*—academic units should provide evaluation standards in assessment documents as to how the portfolios are to be reviewed (e.g., what the portfolio will include, how it will be assessed, by whom, and at what time intervals).
- *standardized tests*—though they can be useful, by their very nature, they tend to be generic and not well focused on specific skills or competencies and should be used in combination with other measures. (Tests such as the GRE, LSAT, GMAT, etc. are inappropriate standards to use to evaluate a program; they are used most often for admissions decisions, do not measure specific department learning goals, and a biased sample of majors take them.).
- *performance on national licensure, certification, or professional exams*—evidence from these should be supplemented with substantive evidence that learning goals were achieved.
- *locally developed tests*—these tests, if designed carefully, may yield highly targeted and very useful results.
- *essay questions blind scored* by faculty across the department.
- qualitative internal and/or external juried review of comprehensive senior projects.
- *externally reviewed exhibitions* and performances in the arts.
- *external evaluation of performance* during internships based on stated program objectives.

*Indirect measures* can provide information that may enrich or illuminate aspects of what the direct measures tell us about students' academic achievement. However, on their own, some indirect measures are inadequate measures of student learning by themselves. Indirect measures include:

- alumni, employer, and student **surveys**.
- exit interviews of graduates and focus groups.
- graduate follow-up studies.
- retention and transfer studies.
- length of time to degree.
- SAT scores.
- graduation rates and transfer rates.
- job placement data.

*Non-measures* offer information assumed to be measures of student academic achievement but that do not in fact provide evidence of learning. One such non-measure is a questionnaire asking students if their personal goals for the course or major or program have been met. A second group of non-measures that are often mistakenly considered to measure student learning are the reports associated with program evaluation, which typically collect data on the quality of curriculum and other aspects of a program. Some other non-measures of student learning include:

- curriculum review reports.
- evaluation reports of individual programs submitted by program-specific and specialized accrediting agencies, visiting committees, or committees of external peer experts.
- **faculty publications** and recognition.
- the kinds of **courses or majors** students select, including course enrollments and course profiles.
- faculty/student ratios.
- the percentage of students who **study abroad**.
- enrollment trends.
- the percentage of **students who graduate** with the baccalaureate in five years.
- the **diversity** of the student body.
- **course grades and GPAs**—experienced evaluators note that grades and GPAs "tell us little of what the student has actually learned in the course" and "very little about what a student actually knows or what that student's competencies or talents really are" (Astin 1991).

Problems with measurement can range from minor to serious, and potentially can undermine an effective assessment and lead to unreliable [or, in the terminology of these "Guidelines," "undependable"] conclusions and programmatic confusion. Academic units are encouraged to reflect on some of the more common methodological problems (a method is a program to gather data):

• Inappropriate sampling: sampling can be an appropriate technique for including students in the assessment process, since the target of the assessment is the department's effectiveness, not individual students. Simply asking for student volunteers to help assess a program is most likely inappropriate because those students who self-select to

participate will be biased in one or multiple ways. Departments should designate which students will participate, whether the entire population of majors or some random subgroup.

- Failure to incorporate at least one direct measure.
- Selecting superficial measures of curricular goal attainment.
- Selecting measures that fail to capture the goal attainment they intend to measure, i.e., the measures fail to be "valid" [or, in the terminology of these "Guidelines," "well-targeted"], they are off target.
- Selecting measures that produce inconsistent outcomes over time, i.e., the measures fail to be "reliable" [or, in the terminology of these Guidelines, "dependable"].
- Having non-measures parading as measures.

Remember that the Assessment Committee exists to assist academic units with assessment activities. Contact the chair of the Assessment Committee if at any stage of the assessment process you have questions or concerns.