Defining, Assessing, and Documenting Student Learning Outcomes at Community Colleges

SACSCOC Summer Institute 2012

Agenda

1. Introduction and Overview.
2. What are SLOs are why should we care?
3. Defining SLOs.
4. Assessing SLOs.
5. Documenting SLOs.
6. Relationship to Accreditation Expectations.
7. Strategies for Success.
8. Questions, Comments, Conversation.

Why should we assess student learning?

- **Improve the quality of education**
    a. Student learning
    b. The student experience
    c. Institutional effectiveness
    d. Effective use of resources
- **Provide accountability**
    a. Students (current and perspective)
    b. Employers
    c. Parents
    d. External funding sources
    e. Board of Trustees
    f. Transfer institutions
    g. Accrediting agencies (quality audit)

Student success is the highest priority.

Community College At-Risk Populations

1. First-generation students
2. Underprepared students
3. Students with undecided majors
4. Returning adult students
5. Distance education students

"Products" of Higher Education

1. **Cognitive Development**

2. **Behavioral Development**

3. **Affective Development**

Student Learning Outcomes defined:

The knowledge, skills and abilities a student has attained at the end (or as a result) of his or her engagement in a particular set of higher education experiences.

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Remember, student achievement is not the same as student learning.

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Faculty Concerns

- "We already assess: grades."
- "This is additional work."
- "I'm too busy."
- "This violates my academic freedom."
- "Degree attainment demonstrates that SLOs are attained."
- "I don't know how."
- "When will this go away?"

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Why aren't grades enough?

• Issue of consistency between instructors (non-standardized grading practices).

• Need meaningful data across sections.

• Grades may reflect student behaviors such as class participation, attendance, cooperation, missed assignments, etc.

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Good learning outcomes are:

1. Learner-centered
2. Key to the course/program mission
3. Meaningful (to students and faculty)
4. Measurable
5. All of the above

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"Sure, the students like your programs and services, but what evidence do you have that what you are doing is making a difference?"

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Assessment Defined

The systemic collection, review, and use of information about educational programs undertaken for the purpose of improving student learning and development
– Ted Marchese

SLO Assessment

• Designed to improve student learning.
• Faculty-driven.
• It is an on-going, not episodic, process.
• It is important to "close the loop."
• It is about evaluating the effectiveness of programs, courses, and services, not individual students.
• Meaningful – Measurable - Sustainable

Basic Questions Guiding Assessment

1. What should students learn from our educational programs and experiences?
2. How can we document and evaluate how well we are teaching and how well students are learning?
3. What changes should we make to improve teaching and learning?
4. Do the improvements we make work?

Assessment turns colleges from being teacher-centered to be student- and learning-centered

Process for measuring SLOs

1. Create written statements of measurable SLOs.
2. Choose the evaluation tool.
3. Set standards for levels of performance on each objective.
4. Identify observable factors that provide the basis for assessing which level of performance has been achieved.
5. Evaluate student performance, assemble data, and report results.
6. Use results to improve student learning.

SLO Evidence: Direct Measures

• Comprehensive/capstone examinations or assignments
• Licensing examinations
• Professionally judged performances/demonstrations
• Portfolios (documented learning experiences)
• Value-added measures (pre- and post-testing, time-series analyses)
• Standardized tests (i.e., CAAP, MAPP, CLA)
• Case studies
• Simulations
• Capstone experiences
• Rubrics

SLO Evidence – Indirect Measures

- Student satisfaction
- Alumni satisfaction
- Employer satisfaction
- Grades
- Retention rates
- Graduates or graduation rates
- Placement rates (employment or transfer institutions)
- Focus groups
- Exit interviews
- Advisory committee recommendations
- Reflective essays

Structure of Measurements

- Employ multiple measures
  - Quantitative
  - Qualitative
  - Formative
  - Summative
- Triangulate results
- Establish baseline data
  - Longitudinal
  - Comparative
- Set realistic goals
- **Define -> Measure -> Improve**

Four Levels of Assessment in the Academy

1. Institutional Level
2. Program / Departmental Level
   - General education
   - Degree programs (major field of study)
   - Developmental education
   - Distance education
   - Continuing education
3. Course Level
4. Individual Student Level

General Education

- Oral and written communication skills
- Critical thinking skills
- Mathematical problem-solving
- Information literacy
- Technological literacy
- Social and interpersonal skills
- Cultural/global/diversity studies

Distance Education
(issue of equivalency)

Developmental Education
(performance in next level course)

Where to start

- Catalog descriptions
- Syllabi and course outlines
- Course assignments and tests
- Textbooks (especially the table of contents, introductions and summaries)
- Colleagues
- Professional associations

80/20 Rule

- 80% of the faculty and staff will be supportive of efforts to improve.
- 20% will drag their feet.
- Institutions spend way too much time working on the 20% when they should encourage the 80%.
- Organizations must be patient. You don't want the visiting accreditation team to ask faculty why they are using SLOs and the response to be, "Because you made us do it."

Make friends with your IR/IE staff

Writing Learning Outcomes

• Describe knowledge, skills, or attitudes that a
student should acquire.

• Use active verbs.

• Articulate outcomes that describe measurable
performance – what a student can do. Avoid
setting targets too low or too high, i.e. 100%.

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Bloom's Taxonomy

Levels of Learning
1. Knowledge
2. Comprehension
3. Application
4. Analysis
5. Synthesis
6. Evaluation

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Bloom's research found that ____ % of test
questions given to students focused
primarily on the "knowledge" domain.

a) 95%

b) 75%

c) 55%

d) 35%

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SMART SLOs

- **S**pecific
- **M**easurable
- **A**ttainable
- **R**ealistic and Results-Oriented
- **T**imely

Tips on Writing SLOs

1. Identify what the student should learn:
   a. What should the student be expected to know?
   b. What should the student be expected to be able to do?
   c. How is a student expected to be able to think?
2. Try to keep the outcomes to a simple sentence.
3. Be as specific as possible.
4. Use active verbs that describe an observable or identifiable action.
5. Identify success criteria (proficiency expected).
6. Think about how you will measure (documentation, artifacts, evidence).

What are the problems with these SLOs?

1. The student will complete a self-assessment survey.
2. The student will appreciate the benefits of exercise.
3. The student will develop problem-solving skills and conflict resolution skills.
4. The student will strengthen his/her writing skills.
5. 85% of students were satisfied with the instruction provided.
6. 100% of students will demonstrate competency in managing a database.

Stronger SLOs

1. Students will be able to articulate five health-related stress impacts on the body.
2. Students will be able to analyze a nutrition food label and explain various components of that food label and their relation to healthy food choices.
3. Students will be able to apply principles of logical argument in their writing.
4. Students will be able to evaluate the strengths and weaknesses of open and closed source software development models.
5. The student will be able to demonstrate appropriate First Aid procedures on a heart attack victim.

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Improving your SLOs

A) Students will know the function of a cell wall.

versus

B) Students will describe the two most important functions of a cell wall.

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Improving your SLOs

A) Students will be able to recognize the differences in several financial statements.

versus

B) Students will be able to prepare an income statement, balance sheet and cash flow analysis with 90% accuracy.

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Handouts

Sorry Trees

Tips on Writing SLOs

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The "Top Ten"
Standards/Requirements Most Often Cited

1. CS 3.7.1 Faculty Credentialing
2. CS 3.5.1 College-Level Competencies
3. CS 3.4.1 Academic Program Approval
4. CR 2.11.1 Financial Resources
5. CS 3.3.1 Effectiveness-Expected Outcomes
6. CS 3.2.10 Administrative Staff Evaluations
7. CS 3.4.7 Consortia/Contractual Relationships
8. CR 2.5 Institutional Effectiveness
9. CS 3.7.2 Faculty Evaluations
10. CS 3.11.3 Physical Facilities

Comprehensive Standard 3.5.1

The institution identifies college-level general education competencies and the extent to which graduates have attained them.

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Percentage of institutions cited for non-compliance on CS 3.5.1?

a) 92%

b) 72%

c) 52%

d) 32%

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Comprehensive Standard 3.3.1

The institution identifies expected outcomes, assesses the extent to which it achieves these outcomes, and provides evidence of improvement based on analysis of the results.

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Core Requirement 2.5

The institution engages in ongoing, integrated, and institution-wide research-based planning and evaluation processes.

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Documentation Rule

If it is not documented then it did not happen.

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Strategies For Success

1. Begin as early as possible.
2. Explain what you are doing and why you are doing it.
3. Use experience of others (adapt rather than adopt).
4. Provide resources.
5. Do not be prescriptive regarding process.
6. Share results widely.
7. Use results to make improvements.
8. Document – Document – Document.

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Questions

Presenter

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Enjoy the conference!