College of Sciences & Arts Program Learning Goals

- What is a learning goal?
- How is it used for assessment?
- What is a good program goal?
- What not to do…
CSA Assessment Process

1. Develop learning goals for each degree program
2. Map them onto University Goals using spreadsheet.
3. Map the learning goals onto the curriculum: Identify which courses in the program meet which learning goals. This will help you identify where/how it would be assessed.
4. Assess two learning goals in courses using existing data and rubrics.
5. Close the Loop: Identify gaps/deficiencies → take action → Repeat.
What Is Assessment?

Assessment is the ongoing process of:

1. Establishing **clear, measurable expected outcomes of student learning** -- *aka* *learning goals*

2. Ensuring that students have sufficient opportunities to achieve those outcomes -- *mapping to the curriculum*

3. Systematically gathering, analyzing, and interpreting evidence to determine how well student learning matches our expectations
   -- *conducting an assessment*

4. Using the resulting information to understand and improve student learning -- *completing the loop*

Figure 1.1. Teaching, Learning, and Assessment as a Continuous Four-Step Cycle

1. Establish Learning Goals
2. Provide Learning Opportunities
3. Assess Student Learning
4. Use the Results
Coaching Assessment: Student Learning Outcomes

Avoiding Garbage In / Garbage Out

WEAVE Online Seminar
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Winona State University
Visiting Scholar, Higher Learning Commission
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Guiding Assumption:

Assessing student learning at the program level starts with well written student learning outcomes.

There’s nowhere for a program to go if they are starting with poorly written student learning outcomes.
Language of Assessment (Why everyone is so confused)

- Goals
- Objectives
- Outcomes
- Competencies
- Proficiencies
- Dispositions
Language of Assessment

A. General skill or knowledge category / statement

GOAL

B. Specific accomplishments to be achieved

STUDENT LEARNING OUTCOME

C. The key elements related to the accomplishment of the outcome

COMPONENTS –

What are you looking for in student work to be able to tell if they “get it”; aka grading criteria.
Student Learning Outcomes

What the student will

√ Know
√ Do

….at the end of the course or program

Students will be able to

<<action verb>> <<something>>
“Students will be able to…”

NOT

- Curriculum emphasizes xyz
- Institution values xyz
- Institution prepares students for xyz.
- Students are exposed to xyz.
- Students participate in xyz.

Communication

- Write
- Relate
- Speak
- Listen
- Participate

Lab report
- mechanics
- style
- organization
TIP:
It is impossible to assess an outcome if there is no agreement on what that outcome means.
Example #1

Gather factual information and apply it to a given problem in a manner that is relevant, clear, comprehensive, and conscious of possible bias in the information selected

BETTER: Students will apply factual information to a problem

COMPONENTS:
  - Relevance
  - Clarity
  - Comprehensiveness
  - Aware of Bias
Example #2

Imagine and seek out a variety of possible goals, assumptions, interpretations, or perspectives which can give alternative meanings or solutions to given situations or problems

BETTER: Students will provide alternative solutions to situations or problems

COMPONENTS:

  Variety of assumptions, perspectives, interpretations

  Analysis of comparative advantage
Rubrics

• Analytical tool
  • Numerous **components** which you want to assess individually
    • Summative
    • Developmental

• [www.winona.edu/air/rubrics.htm](http://www.winona.edu/air/rubrics.htm)
Outcome:

Components

Exceeds expectations
Analytical / Developmental Rubric

Outcome:

Components

sophistication
# Critical Thinking VALUE Rubric

**Definition**
Critical thinking is a habit of mind characterized by the comprehensive exploration of issues, ideas, artifacts, and events before accepting or formulating an opinion or conclusion.

Evaluators are encouraged to assign a zero to any work sample or collection of work that does not meet benchmark (cell one) level performance.

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<thead>
<tr>
<th>Capstone</th>
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<th>Milestones</th>
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<th>Benchmark</th>
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<tbody>
<tr>
<td><strong>Explanation of issues</strong></td>
<td>Issue/problem to be considered critically is stated clearly and described comprehensively, delivering all relevant information necessary for full understanding</td>
<td>Issue/problem to be considered critically is stated, described, and clarified so that understanding is not seriously impeded by omissions.</td>
<td>Issue/problem to be considered critically is stated but description leaves some terms undefined, ambiguities unexplored, boundaries undefined, and/or backgrounds unknown.</td>
<td>Issue/problem to be considered critically is stated without clarification or description.</td>
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<td><strong>Evidence</strong></td>
<td>Information is taken from source(s) with enough interpretation/evaluation to develop a comprehensive analysis or synthesis. Viewpoints of experts are questioned thoroughly.</td>
<td>Information is taken from source(s) with enough interpretation/evaluation to develop a coherent analysis or synthesis. Viewpoints of experts are subject to questioning.</td>
<td>Information is taken from source(s) with some interpretation/evaluation, but not enough to develop a coherent analysis or synthesis. Viewpoints of experts are taken as mostly fact, with little questioning.</td>
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<td><strong>Influence of context and assumptions</strong></td>
<td>Thoroughly (systematically and methodically) analyzes own and others' assumptions and carefully evaluates the relevance of contexts when presenting a position.</td>
<td>Identifies own and others' assumptions and several relevant contexts when presenting a position.</td>
<td>Questions some assumptions. Identifies several relevant contexts when presenting a position. May be more aware of others' assumptions than one's own (or vice versa).</td>
<td>Shows an emerging awareness of present assumptions (sometimes labels assertions as assumptions). Begins to identify some contexts when presenting a position.</td>
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<td><strong>Student's position (perspective, thesis/hypothesis)</strong></td>
<td>Specific position (perspective, thesis/hypothesis) is imaginative, taking into account the complexities of an issue. Limits of position (perspective, thesis/hypothesis) are acknowledged. Others' points of view are synthesized within position (perspective, thesis/hypothesis).</td>
<td>Specific position (perspective, thesis/hypothesis) takes into account the complexities of an issue. Others' points of view are acknowledged within position (perspective, thesis/hypothesis).</td>
<td>Specific position (perspective, thesis/hypothesis) acknowledges different sides of an issue.</td>
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<td><strong>Conclusions and related outcomes (implications and consequences)</strong></td>
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<td>Conclusion is logically tied to a range of information, including opposing viewpoints, related outcomes (consequences and implications) are identified clearly.</td>
<td>Conclusion is logically tied to information (because information is chosen to fit the desired conclusion); some related outcomes (consequences and implications) are identified clearly.</td>
<td>Conclusion is inconsistently tied to some of the information discussed; related outcomes (consequences and implications) are oversimplified.</td>
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SOME TIPS

1. Programs don’t need a lot of outcomes. 4-7 is enough.
2. The more complex the outcome, the harder it will be to assess.
3. Stay away from multiple <action verbs> and multiple <somethings>.
So, let’s look at your goals.

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Levels of Learning Outcomes

- University/Institution
- General Education
- Academic Programs
- Courses
- Classes
Mission

Vision

University Student Learning Goals

General Education

Student Life & Development

Academic Programs

External Agencies
**Institutional level:** Students will communicate effectively in writing to a variety of audiences.

**Program level:** Students who complete the business major will communicate effectively to professional and lay audiences using the common business formats.

**Course Level:** Students who complete this finance course will be able to write xyz financial reports.

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Mapping to University Goals

• Where do your program goals “fit” the university goals?
• Not every university goal requires a program goal.
• You might have a program goal that is not covered by the university goals, e.g. teamwork.
• Your program goals should stand on their own and be stated at the appropriate level.
Let’s compare your goals to university goals.

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1. Establish Learning Goals
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Assessment at the academic program level

An academic program should be integrated -- more than a collection of courses.

- but the program is actualized through the curriculum.

TIP:
The curriculum should support the learning outcomes

Use the curriculum map to identify assessment points
• **Program**: Outcomes that the program has defined for *all* students graduating in that program. Program goals are broader than courses. *Department website.*
  - **Program goal**: design appropriate approaches to a variety of problems in the discipline

• **Course**: Outcomes that are shared across all faculty teaching sections of the same course. *Course catalog description*
  - **Course goal**: solve a specific kind of problem

• **Class**: Outcomes individual faculty have developed for their class. *On syllabus*
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K = Knowledge/Comprehension;  A = Application / Analysis;  S = Synthesis / Evaluation
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Build a curriculum
Program Level
Student Learning
Outcomes

1xx 1xx 2xx 2xx 2xx 3xx 3xx 3xx 4xx  Capstone

1

K K K

2

K A A

3

K A S

4

S A S

5

K K K

6

K K A

7

S A A

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Analyze Curriculum
Program Level Student Learning Outcomes

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Assessing Learning
embedded – direct measure

- Test – course or field test
- Project
- Presentation
- Performance
- Case Study
- Exhibit
- Internship or field experience
- Portfolio
- Capstone experience
TIP:

One data point is not a pattern of evidence no matter how soon the accreditors are coming.
Some comments

• Don’t try to pack too much into one goal – understand + apply + present… and try not to use “subgoals” – a, b, c,….

• The “knowledge” goal should not describe the curriculum. The goals should drive the curriculum, not be a description of the curriculum.

• Think of the goals as telling your students your expectations. If they decide to major in your program, this is what you expect them to learn. If you have multiple degrees in your department, how are these expectations different?

• Think about how you would assess any of these goals with direct measures. If there is no way to measure it, or it is too complicated to measure, either it is not a good goal, or you will need to do something differently in your program.
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