



Assessment of Affective Outcomes

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Truth in advertising

- What this workshop will **not** do:
 - Present an academic discussion of assessment
 - Give you the **answers**
- What this workshop **will** do:
 - Share with you some practical approaches in assessment
 - Help you ask the right **questions**



Classification of outcomes dimensions (types)

Knowledge outcomes	What you know (e.g., mathematics, engineering)	<ul style="list-style-type: none">● General knowledge (breadth)● Knowledge of specific fields (depth)
Skill outcomes	What you can do (e.g., communication, problem-solving)	<ul style="list-style-type: none">● General competence (social-functioning) skills● Professional/occupational skills
Attitudinal or affective outcomes	A desire to do what needs to be done (e.g., work attitude, integrity)	<ul style="list-style-type: none">● Personal goals and aspirations● General attitudes, values, and satisfactions● Attitudes toward self (development of identity)● Attitudes toward others

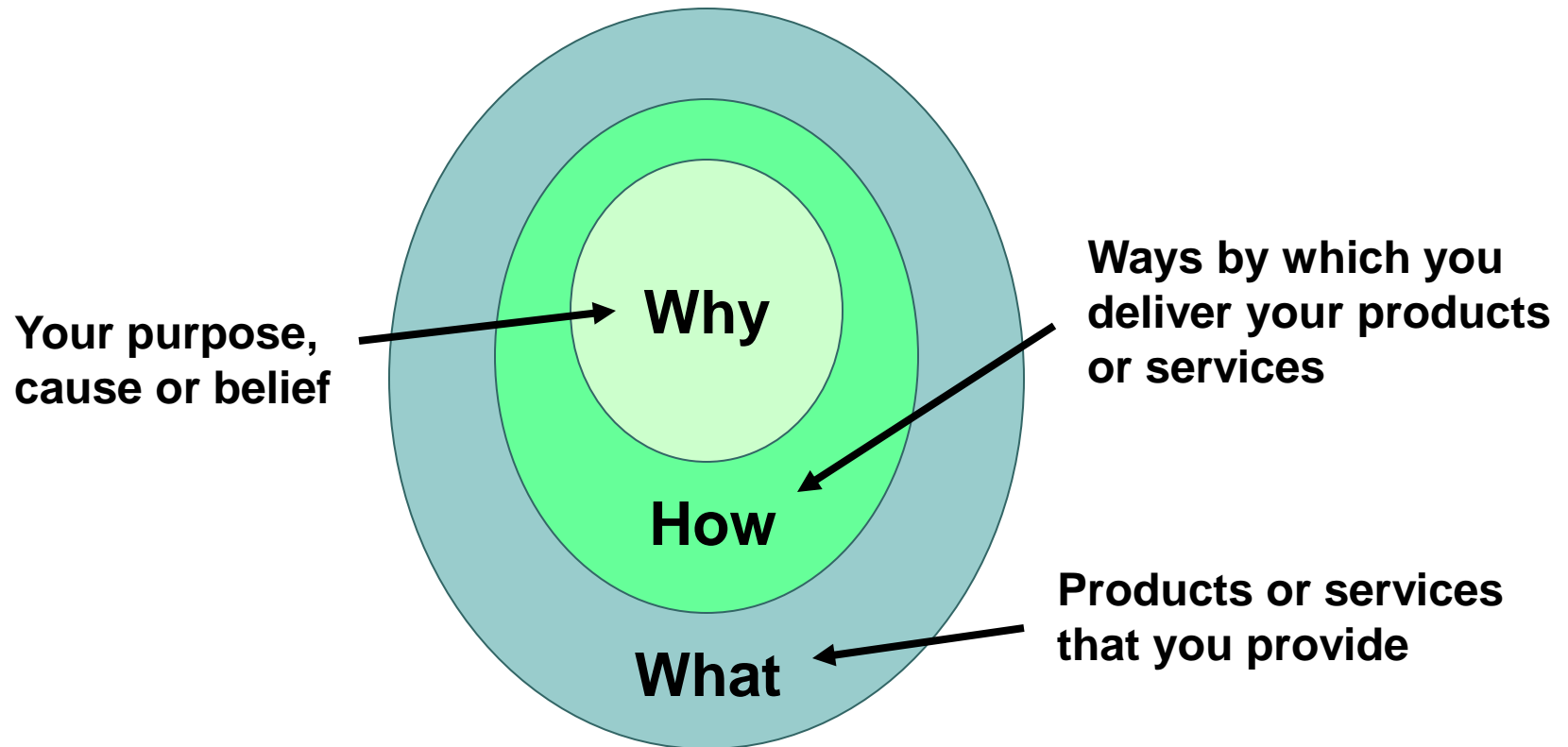
Source: Peter Ewell (1984)



Three levels of knowing

Knowledge outcomes	Knowing what
Skill outcomes	Knowing how
Attitudinal or affective outcomes	Knowing why

The Golden Circle

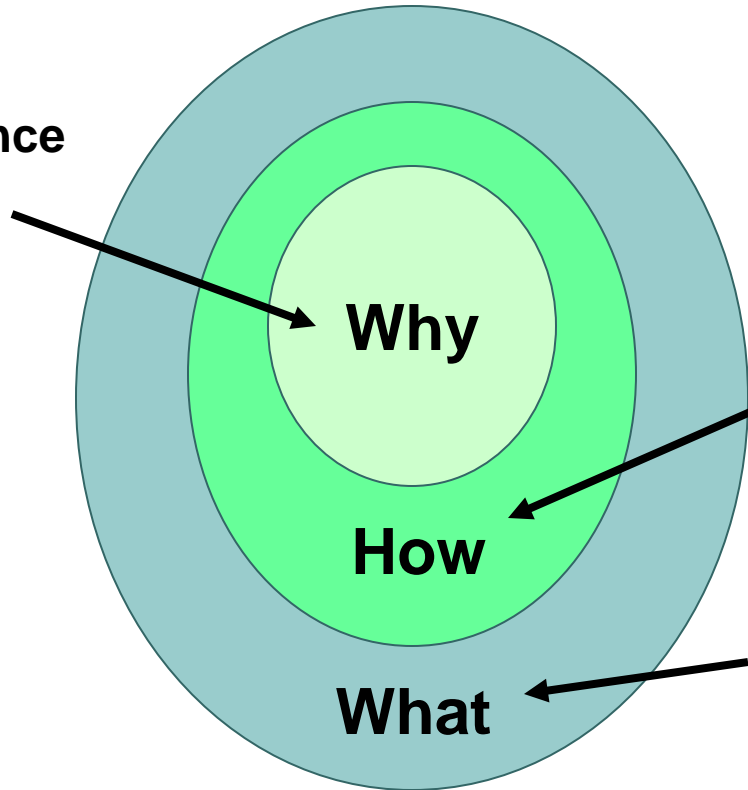


Simon Sinek (2009) *Start with Why: How Great Leaders Inspire Everyone to Take Action*. New York: Portfolio.



Roles of students

**Students as
learning experience
designers**



Students as process owners

Students as participants



Bloom's Taxonomy

Knowledge (Remembering)	define, identify, state, recite, quote, list
Comprehension (Understanding)	discover, relate, explain, summarize, describe, interpret
Application (Applying)	apply, show, predict, solve, demonstrate, use
Analysis (Analyzing)	diagnose, distinguish, discriminate, examine, analyze, outline
Synthesis (Creating)	combine, propose, create, integrate, design, develop
Evaluation (Evaluating)	assess, evaluate, appraise, critique, compare



**Skill
Outcomes**

Mastery
Production
Conformation
Simulation
Perception



**Attitudinal
Outcomes**

Behaving
Believing
Valuing
Responding
Receiving

What do I want my students to learn?



Learning Outcomes



Learning Centered

How can I facilitate that learning?



Assessment

What do I know about my students?



Teaching and Learning Activities



‘Wicked’ competences

“Wicked competences are achievements that cannot be neatly pre-specified, take time to develop and resist measurement-based approaches to assessment... Yet these competences are often soft skills and other complex achievements that graduate employers say they value.”

--- Knight and Page (2007)





Activity 1

- Think of an affective outcome that you would like to help your students develop.
- If your students indeed acquire this outcome, what can they actually do?
- Write this down as an outcome statement and discuss it with your neighbor. Be prepared to share with the group.



“Some learning outcomes related to personal and social growth are difficult to measure – for example, self-understanding and appreciation of human differences. But outcomes that are difficult to define and measure are at times more important in student learning than are some clearly stated, more easily measured ones. Innovative methods such as peer assessments can be helpful in these circumstances.”

“Learning Reconsidered”, NASPA and ACPA, Washington, DC (2004), p.24



Some useful approaches

- Assessment rubrics
- Self- and peer-assessment
- Learning portfolios

Note: These are not separate approaches and could be effectively integrated.



Assessment rubrics

- Rubrics are scoring criteria that identify the characteristics and mastery levels one will use to assess students' work. They contain:
 - levels of achievement
 - criteria that distinguish good work from poor work
 - descriptions of criteria at each level of achievement (e.g., grade descriptors)



The meaning of grades

- In criteria-referenced assessments, grades indicate standards of achievement in specific learning outcomes, which can be described in an *assessment rubric*.



Levels in an assessment rubric

- A, B, C, D
- 1, 2, 3
- Excellent, good, average, fair
- Exemplary, competent, developing
- Strong, satisfactory, weak
- Acceptable, unacceptable
- Exceptional pass, pass, fail

Regardless of how many levels there are or what they are called, having a clear description of the expected performance at each level is key.



Examples of Assessment Rubrics

- Learning Taxonomy
 - Krathwohl's Affective Domain



Examples of Assessment Rubrics

- ABET Engineering Criteria 2000
 - (f): an understanding of professional and ethical responsibility



Examples of assessment rubrics

- AACU's VALUE Rubrics
 - http://www.aacu.org/peerreview/pr-wi09/documents/Peer_Review_Winter_2009.pdf
 - <http://www.aacu.org/value/rubrics/index.cfm>
- Example: Ethical Reasoning

AACU: Association of American Colleges and Universities

VALUE: Valid Assessment of Learning in Undergraduate Education



Activity 2

- After reading these three examples, can you think of ways to apply these rubrics to enhance student learning?
 - If so, how?
 - If not, why not?
- Think on your own first, then discuss with your neighbors. Be prepared to share with the group.



Using assessment rubrics to promote assessment as learning

- Think “SPA”
 - Self
 - Peer
 - Authority (teachers, employers, supervisors)



Evolution of assessment



Assessment *as* learning

Assessment *for* learning

Assessment *of* learning



Assessment *of* learning

- Traditional approach in finding out what a student has learned.
- Typical assessment tools include examinations, term papers, reports, etc.
- Assessment result is usually a grade, with little feedback for improvement.
- Assessments tend to promote surface learning and extrinsic motivation.



Assessment *for* learning

- Emphasis is on using assessment to promote learning.
- Students are given clear expectations of the intended learning outcomes and their roles in managing their learning.
- Students are engaged in meaningful learning activities.
- Students are given specific and timely feedback for continuous improvement.



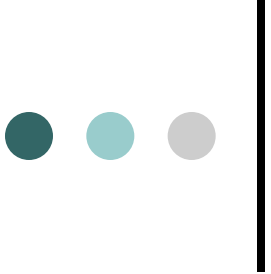
Assessment *as* learning

- Students are actively engaged in the assessment process.
- Students play an active role in assessing their own work.
- Self- and peer-assessments become an integral part of the learning process.
- Learning portfolios are used to capture a body of evidence, both qualitative and quantitative.



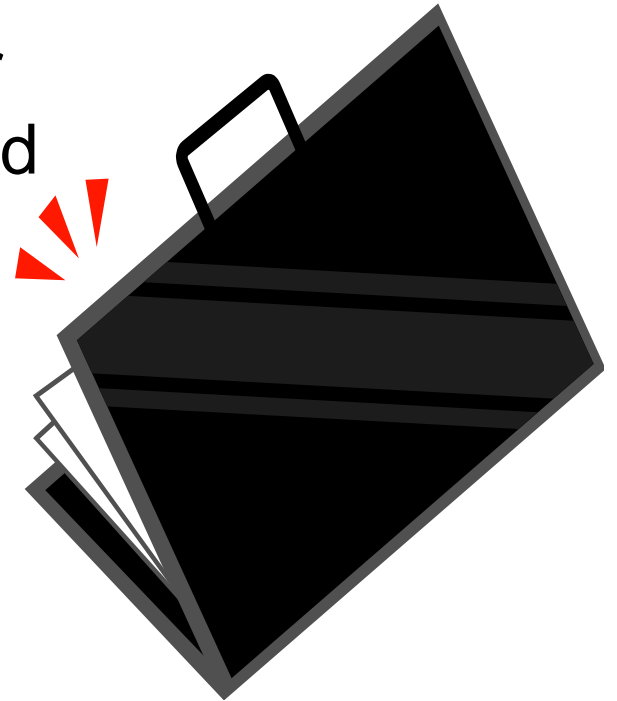
Using assessment rubrics to promote assessment as learning: A recommended process

1. Write an assessment rubric for a particular learning outcome and establish its validity and reliability.
2. Create an opportunity for students to demonstrate that outcome and ask them to evaluate their performances afterwards by making reference to the rubric.
3. Ask them to work in pairs and evaluate each other's performance.
4. Ask them to compare the results of self and peer assessment and explain similarities and differences between the two.
5. Share with students assessment results done by an expert and help each student develop an action plan for improvement upon synthesizing all assessment results.



“Portfolios, along with performance appraisals and behavioral observations, offer the most comprehensive information for measuring many outcomes and are conducive to evaluating professional skills.”

--- Shuman et al. (2005)





Advantages of portfolios

- Portfolio as an self-assessment tool
 - engages students as learning partners
 - encourages ownership of learning (students as process owners and as learning experience designers)
 - promotes self-reflection and lifelong learning
 - develop their ability to represent their learning to others (“claim-making”)



e - Portfolios

- e-Portfolios are attractive to students because they are comfortable in:
 - creating content using multimedia
 - participating in virtual social networks
- Portfolio assessment could be useful in building a learning community.



Disadvantages of portfolios

- Time and effort required:
 - To help students put together high-quality portfolios
 - To provide feedback to students
- Resource intensive
 - Supporting technology
 - Human resources

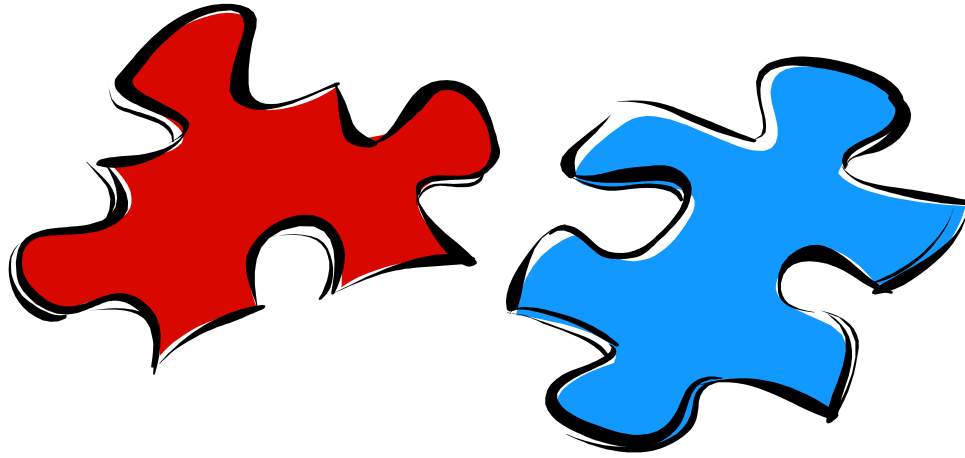
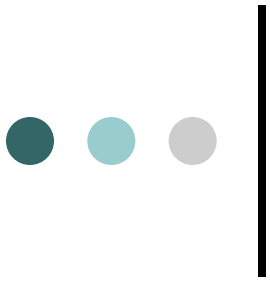


Integrative assessment for integrative learning

“An overview...reveals a fairly small number of assessment strategies: papers, projects, presentations and portfolios are student, peer, and/or teacher-assessed through formal or informal rubrics and several kinds of reflection.”

For details, see Ross Miller, “Fostering Integrative Learning through Assessment”

- o http://www.carnegiefoundation.org/files/elibrary/integrativelearning/uploads/assessment_copy1.pdf



- Are you still confused?
- But are you now confused at a deeper intellectual level?



References

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