

Target-Method Match Activity

Instructions:

1. Attached are five scenarios, each relating to a different type of student learning target: content knowledge, skills, reasoning, products, and affect (dispositions). Read through the scenario(s) assigned to your group and answer the four questions.
2. Based on your discussion, put a large "X" in the boxes that represent the best fit of method to target type. Put an "O" in the boxes that represent a partial fit.
3. Compare your responses to those elaborated by previous groups. Where do you agree? Disagree?

There are no single correct answers, however some answers are better than others. The important thing is to have good reasons for your choices.

| | Selected Response & Short Answer | Essay | Performance Assessment | Personal Oral Communication |
|-----------------------------|---|--------------|-------------------------------|------------------------------------|
| Knowledge | | | | |
| Reasoning | | | | |
| Skills | | | | |
| Products | | | | |
| Affect/ Dispositions | | | | |

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Assessing Student Mastery of Content Knowledge

Scenario: Assume you want your students to master some specific subject matter knowledge because it represents an important foundation for later work. To reach this goal, you plan a series of instructional activities to help your students master this required material. Now you want to assess to be sure they've got it. In this particular case, you want them to know the material outright, not through the use of reference materials.

Question #1: Should you assess mastery of this material using selected response or short answer modes of assessment, such as multiple choice, true-false, or matching exercises? Yes or No. Please briefly explain your response.

Question #2: Should you assess your students' mastery of this material using an essay form of assessment. Why or why not? Please write a brief defense.

Question #3: If you wanted to assess students' mastery of content knowledge as specified above, should you use a performance assessment? Yes or No. Defend your answer.

Question #4: Do you think the personal oral communication form of assessment—for example, by oral exam, interview, conference, or discussion—could provide you with a viable assessment of your students' mastery of this content knowledge? Why or why not?

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Assessing Mastery of Skills

Scenario: Although assessing reasoning proficiency is next on our list, let's hold on to that for just a bit and focus instead on skills outcomes. This will permit us to return to reasoning targets from a more informed perspective in Scenario #3.

In this scenario, assume that you teach French and wish to assess your students' skill at communicating in that language in a conversational situation. So the skill of *oral language proficiency* is your target.

Question #1: Can you assess oral language proficiency in a conversational context using a selected response or short answer mode of assessment? Why or why not? Defend your answer.

Question #2: Can you assess these skills using an essay form of assessment? Yes or No. Why?

Question #3: Will performance assessment work as a basis for assessing the foreign language speaking proficiency of your students? Why?

Question #4: Can you use personal oral communication as a basis for assessing conversational skill in a second language? Defend your response.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Assessing Reasoning Proficiency

Scenario: Now let's turn to reasoning targets, evaluating matches with various kinds of assessment methods. In this case, you are a teacher who has seen to it that your students are able to access important knowledge when required. Now you want to see if they can use that knowledge productively to solve relevant problems. You want to see if they can reason analytically (think about the parts of things) and comparatively (think in terms of similarities and differences), draw inferences, and think critically (take and defend a position on an issue, for example).

Question #1: Can you get at these things with selected response or short answer assessments? Explain why or why not.

Question #2: Does the essay method of assessment work in contexts where we seek to assess reasoning proficiency? Why or why not?

Question #3: Is performance assessment a viable alternative when assessing reasoning proficiency? What do you think? Why or why not?

Question #4: Can we use personal oral communication as an assessment method to probe a student's ability to use knowledge to reason effectively and solve problems? Defend your response.

Application Question: Let's say you want to assess your students' ability to use a certain knowledge base to reason productively, but you are not sure all of the students have had a chance to master that important knowledge. Could you still assess their reasoning proficiency in this context or would you have to abandon your assessment? Under what conditions, if any, could you proceed?

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Assessing the Ability to Create Quality *Products*

Scenario: You want your students to be able to create quality products—products that meet certain specified standards. They might be samples of writing, term papers, technology products, craft products, artistic creations, or others. Your instruction has centered on helping students learn the differences between products that are of high and low quality. You have provided practice in developing products that meet your standards. Now it is time to assess the students' achievement to see if your instruction was effective.

Question #1: Can you assess the ability to create these kinds of products using selected response or short answer modes of assessment? Why or why not?

Question #2: Will essay assessment work for evaluating this kind of achievement? Explain.

Question #3: Can performance assessment provide the evidence of proficiency needed to evaluate this kind of achievement target? Defend your response.

Question #4: Is personal oral communication a viable way to assess when products serve as the source of evidence of proficiency? Yes or no. Why?

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Assessing *Affect* and *Dispositions*

Scenario: Now let's turn to affective targets. In this case, you are a teacher who has seen to it that your students are able to access important knowledge when required; you've determined that they possess the knowledge and skills needed to do quality work. Now you want to see if they have certain habits of mind and other organization skills that will enable them to *want* to use what they know when it's needed. Such affective and dispositional skills include: attitude toward school or a specific subject area; self-confidence; perseverance; and motivation.

Question #1: Can you get at these things with selected response or short answer assessments? Explain why or why not.

Question #2: Does the essay method of assessment work in contexts where we seek to assess affect? Why or why not?

Question #3: Is performance assessment a viable alternative when assessing affect? What do you think? Why or why not?

Question #4: Can we use personal oral communication as an assessment method to probe a student's dispositions? Defend your response.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Check Your Responses to the *Content Knowledge Mastery Scenario*

Question #1: If you answered, "Yes," to the query about assessing mastery of content targets using selected-response or short answer assessment formats, you were correct. These kinds of test items can sample student mastery of knowledge very effectively and efficiently. But remember, they tend to focus on mastery of individual concepts and facts and typically pay less attention to student mastery of the relationships among elements of knowledge.

Question #2: The match between knowledge targets and the use of the essay form of assessment can be a strong one, too. Further, this match permits a careful analysis of the learner's mastery of the relationships among the parts. But remember, since it takes far more time to respond to each exercise, we can include fewer essay questions than selected response items in the same amount of testing time. So the scope of the coverage is narrowed.

Question #3: The performance assessment option is far trickier in assessing knowledge mastery as a distinct target. In one sense, it appears that performance assessment could provide a quality match. If we give students a performance exercise that requires the creation of a complex product and the performer does an outstanding job, we have in hand compelling evidence that the student has (a) mastered the requisite knowledge, (b) reasoned productively, and (c) performed required steps in a skillful manner—all building blocks of the product development competence demonstrated. "Well, then," you may be saying, "that means there is a strong match between the knowledge target and the performance assessment method." Not necessarily.

The problem with using performance assessment to assess knowledge mastery becomes apparent in those instances in which the student fails to perform adequately on the complex performance assessment. When this happens, all we can see is the inadequate product. But we don't know why the performer failed. Was it due to a lack of knowledge, a failure to reason, or a failure to carry out steps in a skillful manner? We cannot know the answer to this question unless and until we use one of the other three assessment methods in a follow-up assessment to determine if the prerequisite knowledge is present or absent. So, if our goal was to assess mastery of that knowledge, why not simply start with one of those other methods? Why waste time on the performance assessment? Also, each performance assessment takes longer. Covering *all* important content using a series of performance assessments is not efficient.

With this kind of target, performance assessment is just too complex. We can choose from three better options, each of which is more focused and more efficient.

Question #4: Yes, we can assess mastery of content knowledge using personal oral communication—we can ask content questions and listen to the respondent's answers. While this might not be the most efficient way to assess mastery of content, it is an option.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Check Your Responses to the *Skill Mastery Scenario*

Question #1: If the objective is to assess ability to demonstrate the actual skill, we cannot do it with a selected response or short answer method of assessment. Remember, we are dealing with speaking and listening competence here. Reading and writing are not going to work. But don't overlook the fact that we can use the selected response or short answer methods to assess: (1) student mastery of some of the prerequisites of effective communication, such as vocabulary; or even (2) knowledge about important things to remember when, say, giving an oral presentation.

Question #2: In this case, the same is true of the essay method of assessment. We can't assess speaking and listening competence with a written assessment, but we can get at some of the important prerequisites.

Question #3: Here is where we begin to find the good matches between assessment method and target. Yes, we can use performance assessment to reflect conversational skill in a second language. For example, we can have two students converse, observe, and listen to the interaction. To make this work, we must have clear criteria in mind—what does "conversational skill" look like? What are the features you'll look for? This is required in order to make dependable judgments about proficiency.

Question #4: We get a similarly strong match when we use personal oral communication assessment methods in cases such as this, when oral communication proficiency is the target. Of course, you realize that this works best when you, the teacher, know the language too! And, you'll need high quality performance criteria.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Check Your Responses to the Assessing Reasoning Scenario

Question #1: Can you use selected response or short answer for assessing reasoning targets? You bet—but not for all kinds of reasoning. We can pose multiple choice questions, for example, that ask students to select the best analysis from among several, identify an important similarity or difference, or make the correct inference from among several possibilities.

But to make this work, three critical conditions must be satisfied. The assessor must (1) start with a clear sense of the kinds of reasoning to be assessed (analytical, comparative, etc.), (2) know which of these valued targets can be translated into selected response methods of assessment (some cannot), and (3) know how to write test questions that tap different kinds of reasoning and result in only *one* correct answer. Also remember that using selected response assesses reasoning skills in *isolation*. If you want to know whether students know *when* to use a skill, or *how* to use skills together to actually *do* something, another format is required. So, selected response and short answer are partial matches.

Question #2: The essay mode of assessment can work very well for assessing reasoning when students are asked to describe their reasoning processes in their responses. But to make this method work, there is a condition to be satisfied. We must evaluate student essays using scoring criteria that include a focus on effective reasoning. For instance, if students are to write a comparative essay in response to an exercise, what does a good comparison look like? What are the active ingredients? These need to be reflected in the scoring criteria.

Question #3: Yes, performance assessment can work too. We can present students with an exercise that asks them to demonstrate the skillful performance of reasoning—for instance, designing a science experiment. Or we can ask them to create a complex achievement-related product such as a comprehensive laboratory research report, and we can apply evaluative criteria reflective of proper reasoning as we evaluate that work. But again, a clear set of reasoning targets, sound exercises, and appropriate criteria are all essential.

Question #4: This makes four for four! Personal oral communication can work well for assessing reasoning. And one of the great strengths of this option is the fact that we can ask follow-up questions to examine more carefully the kinds of reasoning that underpin student responses to our problem-solving challenges. Of course, appropriate criteria for judging reasoning are essential.

Application Question: We can proceed in the absence of assurance that all examinees have had access to the prerequisite knowledge if we give them that knowledge and then ask them to use it. One way to do this is to offer an open-book test. Another is to provide a map, chart, or brief passage of material along with the assessment exercises and then ask respondents to use this material to answer the questions. A third way is to have students work in groups to share or generate important prerequisite knowledge before individually attempting the reasoning task.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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Check Your Responses to the *Product Development Scenario*

Questions 1-4: Of the four, only one method can work in this case: performance assessment. Students must create the actual product for observation and evaluation. But that does not mean that there is no role for the other three in contexts in which learners are striving to become proficient at creating such products. Selected response, essay, and personal communication methods can help us to determine if students are mastering the knowledge that is a prerequisite to such creation. This might include knowledge of the attributes of quality products or of the steps to be taken to produce quality products.

Here again, there must be clear and appropriate performance criteria for judging the quality of the resulting products.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

Handout A1.7,H2, p.9

Check Your Responses to the Assessing *Affect/Dispositions* Scenario

Question #1: Can you use selected response or short answer for assessing affective targets? You bet—there are many surveys and self-rating forms for looking at dispositions. Remember, though, that these are all self-report—the student is answering for him or herself; and sometimes students answer in ways that are socially acceptable or that they think the assessor wants to hear.

Question #2: The essay mode of assessment can work for assessing dispositions. In this case students can write about, for example, their attitude toward reading. Remember, however, that the assessor will have to interpret what the student says to draw conclusions about affect; so criteria for desirable responses must be developed. In other words, what do responses from highly motivated students look like?

Question #3: Yes, performance assessment can work too. We can engage a student in a task and look for evidence of perseverance, attitude, etc. But again, appropriate criteria for judging performance are essential. What does it look like when a student is self-confidently pursuing a task?

Question #4: This makes four for four! Personal oral communication can work well for assessing affect. And one of the great strengths of this option is the fact that we can ask follow-up questions to clarify what students are telling us. Here, again, we need criteria for judging and interpreting what students say.

Caution: As everyone is well aware, the affective domain represents student learning targets that are very sensitive. In fact, some states and districts leave affective targets out of official content standards. We must be very clear that what we assess is achievement related and that everyone agrees on the importance and definition of the target. We must also be very careful that how we assess such targets is non-invasive.

Adapted from Rick Stiggins, Assessment Training Institute, Portland Oregon, 1995

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1. Matching Achievement Targets and Assessment Methods

| Achievement Target | Selected Response Short Answer | Essay | Performance Assessment | Personal Oral Communication |
|-----------------------------|--|---|--|--|
| MASTERY OF KNOWLEDGE | Can be used to assess content knowledge | Can serve to assess student mastery of complex structures of knowledge | Cannot be used as efficiently as the other three methods | Can assess small domains of knowledge when short-term record keeping is required |
| REASONING | Can be an excellent way to assess <i>some</i> kinds of reasoning in isolation | Can provide a window into reasoning | Strong match—products or performances can be observed for reasoning | Can ask student to "think out loud" to examine reasoning proficiency |
| SKILLS | Can only test for mastery of simple prerequisite procedural knowledge | Can ask students to describe complex "how to" procedural knowledge. Good match if the skill being assessed is writing. | Strong match—can observe and evaluate skills as demonstrated | A strong match when the skill is oral communication proficiency; can ask student to describe and discuss complex "how to" procedural knowledge |
| PRODUCTS | Can only test for prerequisite knowledge of the attributes of quality products | Can only tap ability to describe the attributes of a quality product, unless the product being assessed includes writing. | Strong match—can assess (a) proficiency in carrying out the steps required to create a quality product, and (b) the product itself | Can probe procedural knowledge and/or knowledge of attributes of a quality product |

Adapted from Rick Stiggins, *Assessment Training Institute*, Portland Oregon, 1995

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