

Ersatz Learning, Inauthentic Testing

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This is a true story. A colleague of ours teaches an introductory calculus section. Early one term, he and his class were working through some standard motion problems: "A boy drops a water balloon from a window. If it takes 0.8 seconds to strike his erstwhile friend, who is 5 feet tall, how high is the window?" On the exam, the problem took this form: "Someone walking along the edge of a pit accidentally kicks into it a small stone, which falls to the bottom in 2.3 seconds. How deep is the pit?" One student was visibly upset. The question was not fair, she protested. The instructor had promised that there would not be any material on the exam that they had not gone over in class. "But we did a dozen of those problems in class," our colleague said. "Oh no," shot back the student, "we never did a single pit problem."

Consider the "pit problem." The student's response nicely illustrates the nature of ersatz learning, just as the problem itself exemplifies inauthentic testing. Let us look at the learning side of the coin first. This student had studied, but she had not learned—at least, not mathematics. How had this come about? What did she actually do when she studied in this course? Studying, for this student as for a great many others, meant linking specific mathematical operations with specific problem shapes, to use a term to which we shall return. Someone looking over her

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shoulder would have observed her "solving" the review problems in the back of her textbook just as her instructor had recommended. What did solving these problems entail? The student would write down the review question, flip through the textbook chapter dealing with motion problems, find a model problem that looked like the one she was trying to solve, substitute the values in the review problem for the ones in the model, perform the specified operations, and arrive at an answer. If the answer matched the one given in the book, she had solved the problem correctly. If it did not, she checked her arithmetic.

The limits of her mastery of this technique show up in her plaintive "We never did a single pit problem." On the other hand, her approach is by no means inherently unworkable. It is worthless as a way of learning mathematics, but it can be a highly effective way of solving problems (Schoenfeld, 1985). If she had developed a second technique, as her instructor had urged, she would have had no trouble with the exam. That technique is to draw each problem. Then she would have seen that she was dealing not with a unique and terrifying pit problem, but with merely another motion problem. She would have gotten the correct answer, passed the exam, and deprived our colleague of the frightening insight that students could do well in his course without learning any mathematics.

His insight informs the central thesis of this essay: Not only can students study without learning, they also can do passable work (the pun is very much intended) in our courses. More precisely, students can succeed by engaging in ersatz, as opposed to real, learning. This takes us to the testing side of the coin. Students succeed because, despite the fact that the techniques and strategies they employ have only incidental connections to the disciplines involved, they are exceedingly well adapted to the sorts of tasks we ask them to perform in our courses.

Those tasks—the exams we give, the papers we assign—are "inauthentic," to use Wiggins' term (1989a, 1989b). They not only fail to measure the knowledge and competencies that actual mastery of the subject matter at issue entails, they measure other skills altogether. They test rote memorization, or the ability to recognize that information contained in multiple choice question #22 can be used to answer question #9. An "authentic" test, according to Wiggins, is one that requires the student to undertake some real task. Students in acting classes, for example, who have to perform scenes from plays as their final exam, are tested in an authentic manner. Inauthentic tests, in contrast, confront students with questions contrived simply for the purposes of the exam. The pit problem is a case in point: The task is inauthentic. No one wishing to know the depth of a pit would set about finding the answer by attempting to measure precisely how long it takes a stone to hit bottom. It is so much simpler, and more reliable, to tie the stone to a string, lower it to the

bottom, and measure the length of string required. The problem is inauthentic in a second sense as well. It has nothing to do with the sorts of questions that mathematicians actually use calculus to address. Students, however ignorant of mathematics they may be, recognize unflinchingly the artificiality of the pit problem and its analogues. They recognize that, whatever else they may be doing, it is not real mathematics.

The underlying premise of authentic testing is that examinations should ask students to engage in the kinds of activities performed by practitioners in the discipline. Unfortunately, too many of our tests call upon students to engage in activities, such as recalling specific bits of information without checking them in standard reference works, from which they would be actively discouraged were they to become real practitioners. Students study without learning, in short, because they study to pass our tests. We then reward their mastery of the appropriate ersatz knowledge with passing grades.

Much of our argument is congruent with recent research into student learning. Ramsden provides a useful summary: "The message of scores of studies is unambiguous: many students . . . can reproduce large amounts of factual information on demand; they have appropriated enormous quantities of detailed knowledge; they pass examinations successfully. But [these same students] are unable to show that they *understand* what they have learned. They harbor profound misconceptions about mathematical, physical and social phenomena" (1988, p. 14).

We dissent from the conventional wisdom expressed in Ramsden's assertion that such students "are highly adept at very complex skills in science, humanities and mathematics" (1988, p. 14). We suggest instead that these students are more or less adept at some fairly complex skills that bear upon passing science, humanities, and mathematics *courses* but that have little to do with mastering those *subjects*. These skills, such as the math student's ability to recognize appropriate model problems, are forms of ersatz learning. They enable students to "reproduce large amounts of factual information on demand" and to "pass examinations successfully." Further, because the skills in question deal with meeting the demands of courses rather than of disciplines, their exercise normally will not disturb whatever conceptions, profound or shallow, correct or mistaken, students might harbor about "mathematical, physical and social phenomena."

Our dissent derives in a general way from observations of student behavior in our own classes, but it also rests upon a systematic sample of work completed by Assumption College students in a broad range of courses during the Spring 1986 semester (Castaldi, Fry, & Scarlett, 1986). It rests as well upon the work of more than a dozen of our colleagues in subsequent studies of critical thinking, or its lack, in their own courses. These collaborative efforts have persuaded us that most formulations of

student learning problems and/or deficits err in utilizing an unacknowledged "best-case" model.

Most discussions assume that course assignments faithfully reflect the demands and rigors of the fields in question, that they are authentic tests. Our study of the examinations given and projects assigned at Assumption (and Assumption is by no means aberrant in this regard) shows that this belief frequently is unjustified. Much of what we ask students to do in our courses has little or nothing to do with genuine mastery of our disciplines (Haney & Madaus, 1989; Perry, 1963). A related and equally unexamined source of optimism in the literature is the presumption that all students are trying to reach the goals listed in our course syllabi. Our review of actual student work leaves us convinced, in contrast, that much of the time students are seeking to pass courses and that they quite correctly regard any real learning they engage in as incidental, rather than central, to that task.

We propose rejecting the best-case model in favor of a more realistic understanding of student learning, both ersatz and real, and of our own testing practices. Doing so will not only sharpen our analysis of what is going on in our courses, but also suggest specific pedagogic strategies to address problems we had previously underestimated or overlooked. Such is the argument we advance in this essay. We do not seek to apportion blame. At various points we will focus upon student or faculty behavior, but we wish to insist throughout that ersatz learning and inauthentic testing are complementary aspects of a single phenomenon.

A useful way of thinking about both inauthentic testing and ersatz learning is to consider genuine learning. For this, we employ Perkins' notion of "thinking frames" (1986). A "thinking frame is a representation intended to guide the process of thought, organizing and supporting that process" (p. 7). It can be a highly general rule of thumb, like "Look before you leap," or a field-specific strategy such as "Gain control of the center" in chess. His point is that powerful thinking requires mastery of a rich array of such frames.

Academic thinking, Perkins argues, depends upon four basic types of frames, shown in Figure 1 (Perkins & Simmons, 1987). It is crucial to recognize the descriptive nature of his model. It does not purport to set forth "stages" of cognitive development.¹ Nor does it stipulate any necessary, logical relationships between frames. It simply describes thinking behaviors which, Perkins contends, are common to successful practitioners in all academic disciplines.

First is *information*, or *content*, the body of factual material that every practitioner in a given discipline is expected to know. All chemists have to be familiar with the periodic table, for example. The second frame Perkins labels *problem solving*, by which he means knowledge of the classic questions and answers that largely define the ways fields are

Figure 1
Thinking Frames: A Descriptive Model

<i>Information (content)</i>	What every practitioner knows
<i>Problem solving</i>	Familiarity with classic questions and answers in the field
<i>Epistemic</i>	Mastery of styles of analysis prevalent in the field
<i>Inquiry</i>	Ability to undertake original research

organized. This frame "encompasses more general knowledge concerning problem management, generic problem solving heuristics, and the like" (Perkins & Simmons, 1987, p. 3). Therefore, practicing biologists need to know that much of the discourse in their field turns on contending theories of how species evolve. Perkins' third frame is the *epistemic*. This refers to the styles of analysis prevalent in fields, to the preconceptions about reality that give the classic questions their force, to the logic(s) underlying the standard answers. Practitioners realize that many issues, such as the question of free will versus determinism in philosophy, cannot be settled simply by amassing additional information. Instead, the power of authoritative answers often rests upon other criteria altogether, such as elegance and/or simplicity of argument. The final frame is *inquiry*, the sorts of thinking associated with original research in a discipline. We do not presume to give a two-sentence example of original thinking, much less a formal definition. (An engaging introduction to the complexities involved is Bronowski, 1978.)

Authentic tests, in the terms of this model, challenge students to perform within the problem-solving, epistemic, or inquiry frames. As Wiggins puts it, "Mastery is more than producing verbal answers on cue; it involves thoughtful understanding as well. And thoughtful understanding implies being able to do something effective, transformative, or novel with a problem or complex situation" (1989b, p. 705).

We also can use the Perkins model to define ersatz learning and inauthentic testing. Ersatz learning consists of techniques that permit the student to avoid the problem-solving, epistemic, and inquiry frames, most commonly by transposing a problem-solving question into one involving content. Typically, the student remembers an answer rather than figures one out. Inauthentic tests elicit and reward these techniques, frequently by seeming to call for problem solving or analysis but actually

seeking information. An example may make the mutually reinforcing nature of the process clearer. The following is from a midterm exam in a 19th-century U.S. history course: *Discuss the causes of the U.S. Civil War.* It looks like a problem-solving question, but the prudent student recognizes that the real question is informational in character, namely: Summarize the textbook and lecture discussions of the coming of the Civil War.

The causes of the Civil War are not pieces of information, at least not to the practicing historian who is intensely conscious of the epistemic dimension underlying the question. For the student, however, there need be no difference, so far as thinking frames employed are concerned, between a question that requires recall of the provisions of the Compromise of 1850, which really are matters of information, and one that asks for a discussion of the causes of the Civil War. Both can be treated as matters of fact. The student can construct a list of causes, drawn from the textbook and lectures, and commit it to memory in exactly the same fashion as the provisions of the Compromise. Not only will this technique work, that is, permit passing the exam, it almost certainly will work better than real learning might, given the inauthentic nature of the question. The student who genuinely undertakes to wrestle with the complexities of historical causation in the 15-20 minutes available is unlikely to do a good job. The essay may be poorly organized, and the student is unlikely to reach a clear conclusion.

It is our central contention that, far from attempting—with limited success—to engage in the sorts of genuine learning that our tests and assignments ostensibly call for, students frequently engage—with considerable success—in a variety of acritical coping techniques well adapted to the inauthentic tasks we set before them. They are embarked upon an academic enterprise that mimics (perhaps we should say parodies) genuine learning, just as the question about the causes of the Civil War apes the kind of question historians ask of themselves without, however, requiring the sort of answer they would give. These surface similarities allow us and our students to pretend that what we have asked for and they have produced is an honest attempt to engage in the rigors of critical thought. But the inauthentic questions and the student coping techniques we will describe are substitutes for teaching and learning, not pallid reflections of it.

Let us start with the ways in which students cope rather than learn. What are some of the acritical, even anticritical, procedures they employ? We are not able to offer an exhaustive catalog, but we do wish to offer a preliminary and partial taxonomy. Ersatz learning techniques can be grouped into two main categories, *clumps* and *shapes*. By *clumps*, we mean those acritical responses to assignments that entail the amassing of elements found in critical analyses minus their underlying logic. These

clumps may consist of data, technical terms, or assertion. By *shapes*, we mean simulations of the logical forms of critical analysis without the substance. Shapes may be borrowed analysis (as with the math student's hunt for the correct model problem), analysis that treats surface meanings (the sequence of events in a historical narrative, the plot in a novel) as the sum of the knowable, or analysis that insists upon a single thread of meaning.

Let us take a quick look at some *clumps*. *Data packing* is surely something we all are familiar with. The student produces a paper rich in information but impoverished in thought. Perry, in "Examsmanship and the Liberal Arts" (1963), refers to this as "cow" (the complement to "bull") (pp. 286-287). As he notes, it reflects the notion that "a fact is a fact" (p. 288), irrespective of context, and so represents "a knowledge downright inimical to understanding" (p. 291). Thus, we have the student who *knows* that Christopher Columbus discovered America but never reflects on the assumptions of European primacy that the word *discover* connotes.

Jargon packing, the use of technical language at every opportunity, is a way of appearing more learned than we really are. Students quickly realize that certain terms recur with great frequency in their readings or in the teacher's presentations. Use of the terms suggests mastery of the concepts. However, as we all know, one need not grasp the concept in order to use the word.

The third sort of clump we want to describe, *assertion packing*, commonly is used in conjunction with the other two. Students confidently set down the symbolic import of nature, for example, in a Robert Frost poem. As we will examine later, they usually surround these assertions with wads of data, extended quotations from the poem, say, or facts about the poet's career, and interlard them with literary terms, like *irony*. Unfortunately, the quotations need not be apt; the terms need not be appropriate. The assertions, all too often, stand alone.

Acritical coping mechanisms do not always involve the piling on of information, jargon, and assertion. They can mimic the forms as well as the substance of scholarly discourse. The most obvious of these *shapes* is the borrowed analysis. The student locates a bona fide critical analysis of some topic, perhaps in the assigned reading for the course, and presents it more or less as found. Or, in a mild variation, the student locates an analysis of some topic related to the one raised in our assignments and gives us that. What makes this a coping mechanism is not that the student consulted some authority but appropriated the analysis wholesale.

A second popular shape is the analysis confined arbitrarily to surface meanings. We should be clear that we are not saying that there are no surface meanings or that they are not worth analyzing. Rather, we are saying that students often choose to limit their inquiries to the surface

features of a topic. A colleague of ours who teaches a course on infant and child development routinely receives final project proposals that set out to show that mothers influence their offspring. Yes, he says, but what do you mean by *influence*? Well, his students reply, you know, sort of help shape how the kids turn out. A lot of papers, as evidenced by a sample of Assumption student work done in the Spring 1986 semester (Castaldi, Fry, & Scarlett, 1986), similarly seek to demonstrate truisms rather than to explore some aspect of a genuine question.

A third shape—and recall that this is not a complete listing—is the analysis of a single thread of meaning as though it exhausted the topic under consideration. Math students, for example, want to solve problems, by which they mean, come to the correct answer. For this they want a single technique. Ask even good math or science students to work out alternative ways of solving a problem, and you will be told that it is enough for them to know one (Chi, Feltovich, & Glasser, 1981).

Perhaps the easiest way to appreciate how students use these mechanisms as substitutes for real thinking is to examine in some detail an example of how students can cope with the demands of a course without mastering its material or its ways of thinking. This particular example comes from an Introduction to Literature assignment that asks students to develop an interpretation of Frost's "Birches" (1969). Ostensibly, the student must engage in the sort of close reading of the poem that comes to terms with its complexities. Such a reading would demonstrate what Wiggins calls *intellectual competence*, that is, "the use of judgment to recognize and pose complex problems as a prelude to using one's discrete knowledge to solve them" (1989b, p. 706). In terms of Perkins' model, this sort of reading would employ problem-solving, epistemic, and even inquiry frames.

Whether this functions as an authentic assignment, however, depends on how the instructor and the students have agreed to understand the term *interpret*. Are the students supposed to locate and grapple with the poem's complexities? Or is there a tacit agreement that students simply are to demonstrate some knowledge, for example, of what several major critics have said about the place of the poem in Frost's total output, or the metrical scheme employed? Another determinant of authenticity is how the teacher evaluates the students' work. What will be accepted as a moderately good response, as we will argue later, is a key question.

For now, we wish to explore how students can cope with such an assignment without engaging in genuine learning, specifically, how they can substitute for critical reading the ability to locate and then summarize material. To succeed in summarizing, students must learn to identify a single main idea for each unit of material they encounter. This is the shape we have titled *the hunt for the single thread of meaning*. Nuances, conflicting evidence, ambiguities—the very things around which the

practitioner organizes an interpretation—all are so much “noise.” Not only do many students not seek to incorporate such dissonant elements into their understanding of a text, they have learned to filter them out. So the student reporting on the poem will look for a single motif or pattern of imagery, find univocal meanings for its symbolism, and attribute a singular intent to the poet. The student’s impoverished reading of a potentially rich text, that is, need not arise simply out of unfamiliarity with techniques of critical reading. It also may come directly from expertise in using particular techniques of anticritical reading.

Confronted with the assignment on Frost’s “Birches,” the student may define the task as showing that it is a “happy” or “sad” poem and then summarize those parts of the “story” that support the chosen view. The poem may be described as the tale of a man who reminisces about what fun it was to be a boy, beginning with a citation of the opening lines of the poem: “When I see birches bend to left and right/Across the lines of straighter darker trees,/I like to think some boy’s been swinging them.” The student will talk about the delight the speaker finds in imagining a boy swinging birches as a break, when he was supposed to go “out and in to fetch the cows—,” all the while getting better and better at his chosen sport: “He learned all there was/To learn about not launching out too soon/. . . He always kept his poise.” The conclusion of Frost’s poem will provide the conclusion to the essay: “One could do worse than be a swinger of birches.”

As this student produces a reading of Frost’s “happy” poem, a colleague sitting one row over is writing about a much more depressing piece of literature. This student’s paper tells the tale of a lonely child: “Some boy too far from town to learn baseball,/Whose only play was what he found himself,/Summer or winter, and could play alone.” Eventually, this boy is deprived of his only form of recreation, riding birches, for “not one but hung limp, not one was left/For him to conquer.” When this boy grows up, he finds “life is too much like a pathless wood/Where your face burns and tickles with the cobwebs/Broken across it, and one eye is weeping/From a twig’s having lashed across it open.” No wonder, comments the student, that this man would “like to get away from earth”

Although the students came to opposing readings of the poem, they both engaged in the same forms of ersatz learning. Each defined the task as explaining the poem’s meaning in terms of a single idea. This ersatz definition of the assignment then determined each student’s strategy. Consider the use of quotations. Both students engaged in data packing; each quoted the poem extensively, as a serious reader would, but each chose only those lines that lent themselves to the single meaning the student advocated as *the* meaning of the poem. A genuine interpretation, in contrast, would seek to determine the relationship between the

different patterns noted by the two students. In other words, coping techniques involve doing exactly the opposite of what you must do in order to learn. A student who wants to cope with a poem must systematically ignore those elements that seem confusing or contradictory, but a student who wants to construct a real interpretation must seek out the most puzzling elements in the work.

Consequently, a seriously intended interpretation might well quote the following lines that reveal the intersection of the themes treated separately by the coping students.

I'd like to get away from earth awhile
And then come back to it and begin over.
May no fate willfully misunderstand me
And half grant what I wish and snatch me away
Not to return. Earth's the right place for love:
I don't know where it's likely to go better.

Once this passage is brought into the discussion, the inadequacy of any description of this poem as simply happy or sad becomes apparent. So too for the notion that the poem is about a boy who swings birches or the man he grew up to become.

If one of the hallmarks of a serious interpretation is a willingness to confront complexity, it behooves us to practice what we preach. There is more to the student use of ersatz learning techniques than their instructors' failures to provide authentic tests. There are also important connections between the coping techniques our students employ and their understanding of the place of education in their lives. As a result, we need to explore how our students think about the academic enterprise and their own roles within it.

Our discussion of how students regard learning is grounded in an Assumption College survey of its incoming classes between 1986 and 1989 (McClymer, Slavkovsky, et al., 1986, 1987, 1988, 1989). The initial survey instrument was designed by Professors John McClymer and Thomas Slavkovsky. Subsequent versions were modified by members of the Freshman Orientation Committee, which included students, faculty, student life administrators, and representatives from the Office of Academic Affairs. The survey was administered during the first morning of the two-day summer orientation program for beginning students.

Of key importance are the differences between the students' agendas for higher education and those propounded in college mission statements. Assumption College, for example, requires all students to study literature in the fond hope that these courses will support students in their future reading. But reading is something many of our students do almost exclusively *in* courses. Seventy percent of our first-year students read five books or fewer outside of class during their senior year in high

school. So, although we offer literature courses to help them read more insightfully, they read literature to pass our courses. Similarly, we require them to take history courses so that they will learn about the past. They study the past, however, to pass history courses. As a consequence, their failure to take from such courses the lasting benefits envisioned in the college catalog does not seem at all tragic to many of our students. We see their insipid readings of classic works of literature as a great loss, as a diminishment of their capacity for insight into themselves and the world around them, as an impairment of their ability to respond to beauty. We see these things. Many of our students do not.

When asked to rank their principal responsibilities as students, our entering freshmen placed *mastering the informational content* of their courses first (39.8%), followed by the *acquisition of critical skills* (35.4%). Least important to them were *becoming scholars* in their own right (16.1%) or *developing their own interpretations* of the course material (19.6%). They expressed a strong preference for multiple choice and short answer tests (47.3% and 40.0%, respectively, chose these, out of five possibilities, as their preferred method of evaluation). Both emphasize the recall of specific bits of data. Students expressed a complementary aversion to oral reports and term papers (54.5% and 29.1%, respectively, ranked these as their least preferred method of evaluation). These, of course, are precisely the academic tasks that call for assessing the meaning and significance of information.

When asked to rank the most important qualities a professor could bring to the educational process, they placed *being supportive of students* first (46.1%). They ranked the *professor's competency in the field* last, behind both *clarity of presentation* and *ability to sustain student interest*. Indeed, only 1.8% chose *encountering challenging teachers* as chief among their hopes for academic life at Assumption.

In their answers to these survey questions, students are telling us something about what education means to them. Education is a matter of passing courses and acquiring usable skills, especially of a task-specific sort. Students also expect to acquire a broad familiarity with the content of their major fields. They do not expect to become intellectuals. They do not anticipate developing new tastes or standards of judgment.

Practical is the word to conjure with, so far as our students are concerned. Students see practical applications as the real meat and drink of education. It is what most of our survey respondents had in mind when they described the value of college in terms of getting ahead in today's world. Students appreciate how little true understanding is required to carry out many workaday tasks. The evidence of this is all around them. They know that the so-called knowledge explosion has created a situation in which even the most brilliant minds can understand the underlying principles of only a fraction of the procedures and devices

they use in their own work, to say nothing about those they encounter outside that world of personal expertise. A focus upon practical applications can seem simple realism.

It is not surprising that students tend to define their task as passing the courses that will enable them to gain the diplomas that will enable them to get the jobs that will enable them to get on with the rest of their lives. We need to recognize that they often can achieve these academic goals with their current academic repertoire. This is perhaps the most important reason why students will not abandon acritical strategies. Why, after all, should anyone give up what works?

Unfortunately, they work because we faculty all too often reinforce, and even encourage, acritical coping mechanisms by the way we test and grade. It is "through our grades," Perry points out, that "we describe for the students, in the showdown, what we believe about the nature of knowledge" (1963, p. 291). So, too, it is through what we ask students to *do*, in examinations, term papers, and other course projects, that we describe for them what we believe about the nature of work in our disciplines.

To what extent do our assignments call for genuine learning? One need only look at some typical college essay questions in contrast to the ways academics pose those same questions in their own writing to appreciate how many of us tacitly have forsworn the challenge of introducing students to the rigors and delights of academic life. Instead, we tend to design tasks for students that they can complete easily without going beyond their repertoires of ersatz learning techniques.

Consider this question from a midterm exam in modern European history: *Analyze the main causes of the Spanish Civil War*. One can substitute any question of equal scope and complexity, in any field. Our point is that we all ask this question or its cousins. What are we saying about the nature of learning when we do? First, note the word *analyze*. We ask students routinely to analyze and/or evaluate issues when we really expect them to summarize material they have read in a textbook. What does this tell students about analysis? Next, note the definite article in the phrase *the main causes*. We all know that there are no fixed lists, chiseled into marble, itemizing the sources of complicated events or movements. But the question invites students to treat the interpretations they find in scholarly sources as though they were information. Indeed, many college textbooks present interpretations of the causes of this or that war, say, in the same manner as they do genuinely factual material such as names and dates. Then we come to the reference to *main causes*. For historians, this would raise all sorts of methodological issues. They would rewrite the question to stipulate the sort(s) of causality intended; they would seek to pin down criteria for distinguishing *main* from other kinds of causes. The question, as written, disavows this complexity. And

the simplicity with which we encourage students to treat complicated issues raises an issue most of us prefer not to face, namely, what is history—or literature or mathematics—once the analytic rigor is removed.

Analyze the main causes of the Spanish Civil War was only one of several essay questions on this particular midterm exam. Students had 75 minutes for the whole exam, 20 to 25 minutes for this one question. One can compute a ratio expressing the time the student has or, in the case of term papers, the space in pages the student can utilize, in relation to the scope of the question. Our survey of assignments at Assumption disclosed that this time/space/coverage ratio oscillates between the shockingly small and the fairly big. It is ordinary practice (and Assumption presumably is not unique in this respect) to ask students to treat large subjects in essays for which time constraints dictate simplicity of argument. Further, the questions typically are phrased in a manner that suggests the student answer can and should achieve closure, can and should say what the *main causes* are. Time and space both are very short, coverage vast.

On the other hand, it is also ordinary practice to ask students, in term papers that allow the student several weeks and 20 pages or more to work with, to focus upon some narrowly defined aspect of some large question. We do not ask students to do a term paper on the causes of the Spanish Civil War. That, we tell them, would take years to do properly. No satisfying analysis would be possible in anything less than book length. Because time and space are limited (although both are enormous when compared to the typical midterm or final exam), the student should choose an appropriately limited topic to explore.

What are students to make of these contradictory messages about the nature of academic discourse? The most intellectually ambitious somehow figure out that the second message is the correct one and that the first is false. These students figure out, that is, that the examinations largely determining their grades are artificial enterprises bearing little or no relation to genuine scholarly activity. For those other students—and they are the large majority—who do not seek admission into the academy, the contradiction remains. They seldom feel the need to resolve it, however, or to decide which of the messages is correct. Rather, they suspect that neither message matters. What does matter is surviving each set of demands in the most energy-efficient fashion possible, and this brings them once again to the use of coping mechanisms.

We may attempt to comfort ourselves with visions of the power of the grade. We perceive the rewards and punishments meted out in grade form as a powerful force, capable of stimulating into action otherwise languorous minds. And certainly, grades could be used in this fashion. Unfortunately, however, our grading standards tend to be as inauthentic as our tests.

We are not parroting the frequently heard claim that standards are too low, although we *are* saying that standards are too low. Rather than saying that students should know more, we are arguing that they should be expected truly to *know*, in the sense of having a genuine academic understanding of the material that makes up the substance of their college courses. In a true academic culture, it should not be possible to pass a course by using coping mechanisms.

Yet it happens all the time. We allow it to happen. Consider the literature student who turned in the essay on Frost's "Birches" that reduced the poem to a happy reminiscence of a boy's encounters with nature. We cringe when we receive such a paper. We call the student's attention to alternate readings of central images; note how the poet uses the same image in multiple, sometimes contradictory, senses; suggest that artists can intend ambiguity or ambivalence. We urge the student to test generalizations about the poem's meaning by looking for contrary instances. We protest what we see as the student's too simple reading of the poem, hint at its true riches, and, if there are not too many mechanical errors, give the student a C+.

When we receive essays that offer only clumps of information, or that borrow analyses, or that oversimplify a topic to the point of misrepresentation, it is easy to respond with comments of the "You just need to" variety. "You just need to provide a bit more explanation of how these things connect to the topic and to one another," or "You just need to eliminate some of the things that don't apply," or "You just need to take into account this or that additional factor." But these answers are not nearly right, they are simply wrong. We don't need less or more of what is already in these essays, we need something entirely other.

In reducing our response to "You just need to," what are we saying to our students about the nature of academic knowledge? We are saying that clumps of data and discussions that duck all the serious issues are close enough to thinking to pass for thinking. We are saying to students that they can come reasonably close to whatever academic standards we purport to uphold without ever abandoning their precritical learning practices. To be blunt, we are saying that we will conspire with them in a game of academic charades in which they pretend to grapple with our questions and we pretend that they have grappled.

Our comments have given the wrong message, and so have our grades. Faculty tend to see the C+ as recognizing the effort the student invested in the paper but also penalizing the superficiality of the approach. We see it, that is, as a way of letting the student down gently. The paper was not very good, but the student did try.

Our students may see grades very differently. The Assumption College survey data are suggestive here. Only 2.3% of our entering students described themselves as *outstanding* students; 62.5% said they

have *selective* strengths; and 30.7% claimed to be only *average* students, a number that strikes us as high given the availability of the selective strengths response. About one incoming student in five (19.5%) admitted to fears of not being smart enough to do college-level work, and another third (33.3%) confessed the fear that their verbal or quantitative skills might be too undeveloped for them to succeed in college. These students did not expect to set the academic world on fire. They did care about grades, however. Only 1.4% responded that grades were not important to them; another 1.4% said that grades could be misleading or worse as measures of the student's real abilities. The remaining 97.2% said that grades were either *fairly important* (39.4%) or *very important* (57.7%).

These percentages, of course, describe Assumption College students, but we think they convey a generally valid message. Assumption students, in terms of standardized test scores such as the SATs, are just above the mean for entering college freshmen. Most graduated in the top third of their high school classes. So, they are fairly representative along these measures. Moreover, Assumption students are not unique in having a kind of comfort zone with respect to grades. Most students hold to a similar notion of the minimally acceptable grade, one that defines academic success for them.

What does it mean for the educational process when you have large numbers of students who have limited expectations concerning their ability to excel but who also place a good deal of emphasis upon grades? The C, C+, or B- grade is success for students who do not have academic interests outside of those we impose upon them through core and distribution requirements, and who do not expect to do B+ or A- work outside of their major fields of concentration, or even within them. We need to understand that students can care about Cs and C+s just as much as they can about As, and that, when students tell us that grades are important to them, it may not mean that they are seeking high grades.

This, then, is our revision of the best-case model underlying most discussions of student learning. It reminds us of something that we all knew perfectly well but which we nonetheless excluded from our analytic models, and that is that many students are motivated primarily by the desire to survive rather than to excel. They often find it more effective to cope than to learn, not least of all because we teachers offer up assignments, comments, and grades that reinforce the use of ersatz learning.

Despite the gloom of our analysis, in it is a basis for optimism. It deepens our understanding of the complexity of the problem. Our students are not blank slates. When they come to us, they already have mastered tactics for coping with academic tasks without doing the sorts

of learning we intend for them to do. We cannot simply write upon them the critical skills we seek to foster.

Further, it calls our attention to the ways in which we unwittingly reinforce students' acritical approaches. We have been expecting both too much and too little from our students. We do not hesitate to ask them questions that we would not dare to answer ourselves, questions about *the causes* or *the significance*. We do not hesitate to ask them to achieve a definitiveness, a closure, that our own understanding of the scholarly enterprise suggests is rarely, if ever, attainable. We ask too much but also too little, because in asking students to do the implausible and the impossible, we also must pretend that they can succeed in meeting our expectations. They can do this only if we lower those expectations. So we accept analyses that are oblivious to the complexity of the issues they address. We accept information posing as explanation. We accept the wholesale appropriation of other people's definitions of problems, and cavil only when it is done without attribution. The too little we accept, in short, follows from the too much we ask.

Acknowledging our complicity in our students' attachment to ersatz learning practices is painful, but it also enables us to identify some of the things about our current teaching practices that we *can* do something to improve. No single change in the way we teach will be adequate. But, as Wiggins suggests, our greatest leverage for influencing student learning lies in the exams we give and the projects we assign: "Reform begins, then, by recognizing that the test is central to instruction. Any tests and final exams *inevitably* cast their shadows on all prior work. Thus they not only monitor standards, but also set them" (1989b, p. 704).

If we are to set such standards, our assignments must meet the following criteria: (a) They must pose the kind of real questions addressed by practitioners in the discipline in question; (b) they must make scholarly sense, that is, permit real answers, within the time/space/coverage constraints that the student is dealing with; and (c) they must challenge students to move beyond the content frame and to perform, rather than simply to remember. Because ersatz learning is fundamentally reductive in character and commonly transposes problem-solving or epistemic questions into ones calling simply for mastery of content, the last of these three criteria is the most crucial.

We need, in sum, to stop thinking about examinations and assignments as collateral elements of course design, useful for evaluation but not for learning. Instead, we need to grasp the extent to which they shape the way students read and write and think in our courses. From this perspective, authentic testing is the single most powerful step we can take to improve student learning.

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