

The Problem of Teaching Critical Thinking: Three Approaches

ISIDORO TALAVERA
TENNESSEE STATE UNIVERSITY

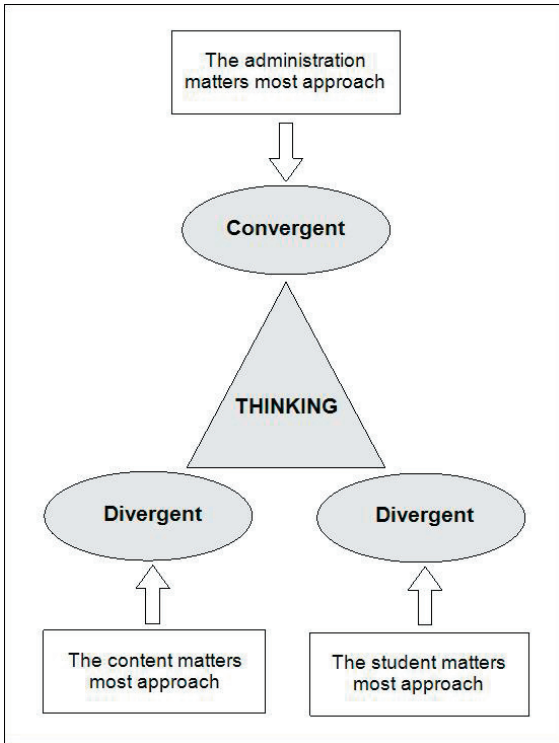
A standardized program of instruction usually demands common syllabi, texts, and tests. Since teaching under this type of program is seen as stimulus (or cause) and learning as response (or effect), much stress is placed on the effectiveness of the classroom teacher. This effectiveness is usually gauged by the technical skills of the instructor to meet the demands of common syllabi, texts, and tests. And yet, in applying other than the administration matters most approach to teaching (e.g., the student matters most approach or the content matters most approach), the developmental teacher seeking to teach critical thinking will be at odds with the standardized educational goals and practices of the administration.

There are certainly different ways to implement an educational program and different ways to conceive of the role of the developmental teacher under the program. Consider three main approaches: (a) the administration matters most; (b) the student matters most; and (c) the content matters most. Each approach can give the developmental teacher a way to think about and respond to why the educator cannot teach critical thinking. Under the administration matters most approach, the administration views the teacher as an executor, a person charged with the management of the classroom and the production of learning. The teacher engages the student in the study of some content for the purpose of helping the student acquire specified knowledge. Since teaching is seen as stimulus, or cause, and learning as response, or effect, much stress is placed on the effectiveness of the classroom teacher. This effectiveness is usually gauged by the technical skills of the instructor to meet the demands of common syllabi, texts, and tests.

But teaching in the administration matters most approach is a form of persuasion, a deliberate attempt to change attitudes. To change the attitude of a student is to alter belief, emotion, and/or action, since attitude is a function of belief, emotion, and action (Coon, 2003). To predispose the student to meet the demands of common syllabi, texts,

and tests, there must be uninterrupted attention to the task, lesson plan preparation to the minute, point by point PowerPoint presentations, orchestrated class discussions, step-by-step film clip instruction, scheduled worksheet or computer guided drilling, end-of-the-semester teacher evaluations, achievement results, and accountability for failure to retain students in the program. So teaching, in the administration matters most approach, amounts to any deliberate attempt to change a mixture of belief and emotion that predisposes the student to respond to the teacher in the administration's way. Accordingly, adherence to rules, deference to authority, and strict norms of acceptable behavior are stressed, since a standardized curriculum is to be spoon-fed to a captive audience of students to meet the demands of common syllabi, texts, and tests. As a result of all of this, convergent thinking is encouraged (see Figure 1).

FIGURE 1
THE PROBLEM OF TEACHING CRITICAL THINKING: THREE APPROACHES



To be sure, there are some problems to consider. First, the administration wants the developmental teacher to be like the manager of a kind of production line, where students enter the factory as raw material and are somehow assembled as graduates. Second, the administration matters most approach does not account for, and is independent of, the content taught, the context in which teaching occurs, and the backgrounds of the students and teachers. This is not surprising since the administration is outside the process of teaching and learning: the administration merely regulates the content and activities of the teacher and learner. Finally, the administration matters most approach leads to alienation by driving a wedge between the student and the teacher. When the teacher becomes the executive, the learner, overwhelmed into passivity, always acquires someone else's knowledge, on someone else's terms, for someone else's purposes. All this breeds animosity toward the teacher who is unwaveringly following the administration's call to fill the student's head with specified content that has been selected, packaged, and conveyed by others to force the student to attend, not to his or her own feelings, thoughts, and ideas, but to the sterile thoughts, images, and attitudes of others.

To teach otherwise, is to engage in what seems to be academically irrelevant activity. For instance, the practice of acting friendly with the class is not a practice usually associated with gains in student learning. The students are not learning the subject matter when a teacher is talking about ballgames, the latest national news, and the hot gossip around the university. Nonetheless, the student matters most approach to teaching may be incongruously piggybacked onto the already established the administration matters most program by the administration, usually stimulated by the customer is always right campaign in demand these days by the administration because of the corporatization of American universities. This approach to teaching may be diametrically opposed to the administration matters most approach, since it views the teacher as an empathetic person charged with helping individuals grow personally and reach higher levels of self-actualization, understanding, and acceptance. As the Chinese proverb notes: teachers open the door, but you must enter by yourself. The teacher engages the student in the study of some content for the purpose of helping the student become an authentic person, for who the learner is, cannot be separated from what is learned and how it is learned. The student matters most approach emphasizes who the student is, and what he or she chooses to become. Furthermore, student-centered instruction is encouraged when the teacher is likable,

expressive, trustworthy, and similar to the students in some respect, since the teacher provides an environment that reduces fear or anxiety in the classroom.

Accordingly, the teacher elicits student interest in what he or she plans to teach by asking: What are the backgrounds of these students in my class? What do they care about and what is their interest, if any, in the study of the subject matter of our course? So what is important, then, is not what can be taught, but rather what is learned. And the only significant learning is self-discovered and self-appropriated learning. Hence, the focus of the student matters most approach is not on what the administration wants the teacher to do, but on the learner. As a result of all of this, divergent thinking is encouraged, i.e., differing thinking that does not evaluate the reliability of reasoning and information (see Figure 1). And divergent thinking is typically incompatible with a standardized program of one-size-fits-all instruction. This is because a standardized program of instruction encourages convergent thinking through the demands of common syllabi, texts, and tests. Moreover, the notion that the teacher, as a facilitator, is not one who imparts knowledge and skill to another, but one who helps another gain his or her own knowledge and skill, is typically not well-received by the administration. Furthermore, with a large number of sometimes apathetic or cynical developmental students in a classroom and the heavy demands of the curriculum, some administrators argue that they are simply unable to deal with the multiple characteristics and needs of students in the program unless standardization is in place across the board. Unfortunately, in the balancing act between the standardized program and the student matters most approach, the administration's student retention goals may tilt the scale in favor of the customer, who more than likely is not interested in the active and difficult academic study of critical thinking.

The last approach to teaching brings content to the forefront. In this approach, students are engaged in the many sides of the subject matter through class participation that aims at self-disclosure and discovery learning or understanding. But the aim is not simply to help the student to acquire content, but to enable and empower the student to grasp, interpret, and extend the content beyond the limits of everyday experience. The content matters most approach views the teacher as liberator, a freer of the individual's mind and a developer of well-rounded, autonomous, rational, and moral human beings. Here, the teacher engages the student in the study of some content for the purpose of help-

ing the student liberate the mind. The teacher appears to have nothing to gain if the students accept the information and arguments. So if something interesting happens in the class discussion, in the content matters most approach the teacher does not cut it off in order to get to the next planned event. Correspondingly, teachers, as educators, never let their instructing interfere with their educating. As a result of all of this, critical thinking is encouraged to evaluate the reliability of reasoning and information (see Figure 1). This is because critical thinking is a purposeful mental activity that takes something apart and analyzes it on the basis of an intellectual standard, e.g., clarity, accuracy, precision, relevance, completeness, reliability, soundness, fairness. But, critical thinking is typically incompatible with standardized programs of developmental instruction, since convergent thinking is encouraged via a program that usually demands common, one-size-fits-all syllabi, texts, and tests. And, if everyone is thinking alike, no one is thinking very much.

With a large number of students in a class, a large amount of content to be covered from a common textbook, and standardized tests to be taken on a rigid schedule, some administrators argue that they are simply unable to allow for more time for the educator to follow a discussion in the classroom to its conclusion and make the class more interesting for all concerned. This is unfortunate, since liberating the mind requires a manner of teaching that is heavily influenced by the content itself. For example, if as a developmental math teacher, you hope your students become critical, analytical thinkers (because that is a prerequisite mindset for doing good mathematics), the nature of your subject demands that they observe you doing critical thinking. So the developmental math teacher strives to teach students to apply reasoning and critical thinking to develop their conceptual understanding of mathematics so that they may understand better the universe in which they live and the quantitative problems affecting their lives.

However, given the broad range of individual differences of our students in most developmental classrooms, and that these students must be actively involved in determining how they are going to learn in the content matters most approach, not all standardized programs will be able—or even want—to develop the critical thinking skills espoused by the content matters most approach. Moreover, many instructors (not to be confused with educators) are simply not able to master and teach the content matters most approach well. And this is a problem, since learning also occurs by doing what the teacher models.

CONCLUSION

In conclusion, the administration matters most approach to teaching is indeed, for all but the most engaging teachers, a lesser form of instruction and scarcely to be idealized. Accordingly, this approach to teaching will not always lend itself for the developmental educator to teach critical thinking. This is because to teach critical thinking, our developmental classes must provide educational opportunity for all individuals, appropriate to their needs, goals, and abilities. To develop reasoning and critical thinking skills in our classrooms, the developmental educational program must provide an independent teaching and learning environment so that educators and students alike may indeed take command of their intellectual lives.

When the educator is allowed academic freedom to set the content and method of his/her course, teaching appeals not only to behavioral, but cognitive learning, avoiding the bifurcation of learning. This is important, since "critical thinking [as a purposeful mental activity] is an active skill-building process, not a subject for passive academic study. Moreover, . . . it cannot be mastered through knowledge of norms and rules alone" (Mayfield, 2001, p. 5). This suggests that once unfettered by the demands of a standardized program of developmental instruction, e.g., common syllabi, texts, and tests, teaching critical thinking is improved or enhanced. Accordingly, the developmental educator is in a better position to encourage his or her students to interrupt lectures with questions, partly to raise the plane of comprehension, partly to keep them (divergently and critically) thinking, and partly to generate self-discovered and self-appropriated learning through discussion. So the very act of participating in class becomes a way of engaging the material, wrestling with it, struggling to comprehend or to take issue, but in any case entering into the subject.

As we have seen, the administration matters most approach highlights what the administration wants the teacher to do. But this approach generally misses several of the crucial keys to learning and education. Learning begins with participation, immersing oneself in the activity at hand, listening, judging, and offering active responses, often thinking outside the box. Education is a meeting of independent minds, a process through which the student draws from within a response to what an educator teaches, unrestrained by the shackles of common, one-size-fits-all syllabi, texts, and tests.

REFERENCES

- Coon, D. (2003). *Essentials of psychology* (pp. 569-571). Belmont, CA: Wadsworth.
- Fenstermacher, G. D., & Soltis, J. F. (1986). *Approaches to teaching*. New York: Teachers College Press.
- Mayfield, M. (2001). *Thinking for yourself: Developing critical thinking skills through reading and writing* (pp. 4-6). Orlando, FL: Harcourt, Inc.
-

For 17 years, Isidoro Talavera has taught a variety of courses at the high school and college level in Central and North America. In Guatemala he taught English as a second language and Mathematics in a bilingual setting. He created the English Department for Distance Education and served as English Coordinator at Francisco Marroquin University, as Math Coordinator for the program at Colegio Metropolitano and as a Math Instructor at Del Valle University. He is presently an assistant professor in the AEAO Mathematics Department of Tennessee State University actively teaching Mathematics, Learning Strategies, and Critical Thinking. His Vanderbilt University Doctoral thesis in the field of Philosophy is entitled Time and the Nature and Possibility of Knowledge.

Call for Manuscripts

The NADE Digest is a publication of the National Association for Developmental Education. We invite articles of interest for Developmental Education professionals including developmental educators, learning assistance personnel, academic counselors, and tutors who are interested in the discussion of practical issues in post-secondary developmental education. Articles should relate to issues that inform and broaden our understanding and practice of teaching and learning in developmental education. The subject of the article may emphasize innovative approaches, best practices, how meaningful research affects teaching and learning, or techniques to enhance student performance.

1. The manuscript must not exceed 10 pages, including references, tables, and figures. The body should be double-spaced with one-inch margins, 12 point font. Only the title of the article and the page number should appear on each page. Your name should not appear on any body pages.
2. Manuscript and references must adhere to APA 5/e guidelines.
3. The manuscript cover page must include the title of the article (maximum 75 characters), the name(s) and institutional affiliation(s) of all authors, and an abstract (maximum 125 words).
4. The lead author must provide work, home and email addresses, and phone and fax numbers. All correspondence will be with the lead author.
5. The manuscript must not have been published previously nor be scheduled for publication.
6. Manuscripts must be electronically submitted in MS Word or RTF to Laura Villarreal at *Laura.Villarreal@utb.edu*.
7. The Digest is published twice a year, in the spring and fall. Manuscripts are accepted continuously.
8. Manuscripts will be sent to two or more members of the Ad Hoc Editorial Advisory Committee or other experts for masked review.
9. For more information contact Laura Villarreal at *Laura.Villarreal@utb.edu*