



Learning Styles Can Become Learning Strategies

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In the last 30 or 40 years, a number of educators have proposed that teaching would be more effective if faculty members took account of differences in students' learning styles. A number of different conceptions of learning styles have been proposed, each with some plausibility. Probably the most widely accepted and best validated is Marton and Säljö's (1976a,b) "deep processors" vs. "surface processors" based upon the levels of processing theory developed by Craik and Lockhart (1972). Deep processors think about the author's purpose and relate a reading assignment to prior knowledge; surface processors read with little thought. Another well validated style is "field dependent" vs. "field independent" (Witkin and Goodenough, 1981). In addition to these, there are also ten or twelve less well validated attempts to describe differing styles of learning. Probably the most over-generalized and misused has been "right-brain dominant" vs. "left-brain dominant."

Regardless of their validity, any of these methods may have heuristic value for faculty development by drawing attention to the fact that learners differ and that we need to take account of these differences in teaching. Too many teachers think

of students as a featureless mass; too many rarely vary their teaching methods, thinking that the method by which they were taught is best for everyone.

A method appropriate for most students may be ineffective for other students who could learn more easily with a different approach. Methods of teaching (e.g., graphic or verbal), ways of representing information, personality characteristics of teachers — all affect learning and affect different learners differently. Thinking about learning styles can lead a teacher to think about different ways of teaching, and that is good. An effective teacher needs to vary techniques and to have an *armamentarium* of teaching methods and learning activities that can be drawn upon from moment to moment or from week to week to facilitate maximum learning for as many students as possible.

Nonetheless, as in most things, there are potential undesirable side effects from the use of learning style concepts. Probably the most serious is that styles are often taken to be fixed, inherited characteristics that limit students' ability to learn in ways that do not fit their styles. Thus, some teachers draw the implication that they must match their teaching to the student's particular style, and some students

who have been labeled as having a particular style feel that they can only learn from a certain kind of teaching. Learning about learning styles may be helpful to teachers who have not previously thought seriously about differences among students. Where they go awry is when teachers become so committed to a particular set of learning style categories that they miss individual differences and changes over time.

Similarly, students who believe they have a particular style that cannot be changed are likely to give up when taught by a teacher whose method doesn't match their style. Having classified the students into particular learning styles, a teacher often feels that the problem of learner differences has been solved. Some teachers become devotees of one or another learning style system. However, the "styles" or "types" identified by learning style inventories are not little boxes, neatly

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separated from one another; rather, they represent dimensions along which learners may differ. Each individual is unique, falling at different points along the various continua that the learning style inventories purport to measure. Even when considered as dimensions rather than as categories, few measures of learning styles have been validated as being useful.

Most of the attempts to match students with teachers have proved to have relatively little effect upon learning. It is plausible that, at least initially, trying to fit teaching to a student's learning style may be helpful. But the important thing to remember is that what are called "learning styles" are preferences and

habits of learning that have been learned, and that everyone is capable of going beyond the particular "style" preferred at the time. Regardless of their learning "styles," students can learn *strategies* that enable them to be effective when taught by methods that are not compatible with their preferred "style."

To assume that one must teach to a particular learning style misses the fact that a given student may be best taught by one method early in learning and by another after the student has gained some competence. For example, anxious students need a good deal of structure when they first encounter a new instructor and new material. But if they are to overcome their anxiety, they later need challenges that they can successfully overcome.

None of the learning styles makes nearly as much difference as the student's prior knowledge, intelligence, and motivation. All of these characteristics are learnable. My own research and teaching has focused upon teaching students skills and strategies so that they can learn more effectively regardless of differences in instruction. Our research group has developed the Motivated Strategies for Learning Questionnaire (Pintrich, *et al.*, 1991), which assesses such things as the degree to which students try to relate ideas in a subject to what they already know, and the methods they use for organizing course materials.

In my "Learning to Learn" course I also teach motivational strategies. When students learn to learn in more meaningful ways they are more likely to develop intrinsic motivation for learning rather than being solely focused on the tests and grades or credentials. Similarly, when students become interested in a topic they are likely to think more about it. Cognition and motivation are interdependent.

It is important for both teachers and students to realize that learners always encounter many situations that are not adapted to their own preferences. What we teachers need to do is to help students develop the skills and strategies needed for learning effectively from teachers

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Editor's Note:

I'm cooking supper and Sophia — who is five — exclaims from the dining room, "Dad, look! I'm coloring between the lines!" It's been a long week, full of sundry annoyances and I answer, "Great, honey — that's what society rewards." We all have different styles of learning, and I don't think I ever colored within the lines in my life. I've had to learn to color within the lines, of course. I even have a grudging respect for the lines now, and for the people who draw well enough to lay them out for me. But mostly, when I've learned, it's been the hard way.

Bill McKeachie's review of what's really known about learning styles as they relate to teaching reinforces the point that no matter where one begins in learning, some lonesome valleys always lie ahead. If we're visual, we still need to learn to listen. If we're abstract thinkers, we still need to understand the concrete, and so on. Beyond sorting out what's really known about learning styles, McKeachie's article sets the stage for some future issues of *The National Teaching and Learning Forum*. In the United States, we talk a lot about "learning styles." In other parts of the English-speaking world, they speak more of research into "deep and surface approaches" to learning. We'll report on that research in our next issue.

This issue also looks forward to an upcoming issue in another way. Here, **Horace Rockwood III** begins a spirited discussion of the intellectual differences between Cooperative Learning and Collaborative Learning. In the next issue, he concludes by describing how he applies the strengths in these differences to his own teaching.

There's a significant political dimension to Rockwood's essay. Spirited intellectual activity often has its political side. That dimension shows up again in **Jane Isenberg's** report on the sixth annual convening of the International Federation for the Teaching of English held at New York University in July. It wasn't an ordinary conference. It ranged far and wide, but, as Isenberg reports, it got down to the cases faculty are likely to confront in their profession well into the next century.

It's been our habit in this publication to present a case study on teaching and two responses to it in every other edition. This time, instead, we present **Mike Godfrey's** reflections as a faculty member on participating in a case writing group for five months. Such groups have begun to appear on campuses all over the country. As Godfrey reports, his group started out stormily, but, in the end, it opened an important door to deeper experience of what it is to be a faculty member, and left Godfrey awed at the power of listening.

Everyone knows how computers are transforming everyone's work life. From time to time a program or service that may be of particular value to our readers — one that might get lost in the mass-market reviews — seems worth devoting space to here. This issue reports on two such items. **Writing Coach**, a computer program **Paul Hagood** wrote to help his students face the blank page, actually lives up to its name by putting friendly, supportive writing heuristics into common word processors. **UnCover** is an online database of some 17,000 journals that faculty can search for free to stay on top of the latest research in their fields.

Finally, *The National Teaching and Learning Forum* has its own home page on the World Wide Web. It's part of the Oryx Press site, and I urge you to pay a visit. The page contains some of the best articles from past issues, including Parker Palmer's "The Courage to Teach." Point your web browser to <http://www.oryxpress.com/ntlf.html>.

— James Rhem

who do not match the students' preferred learning "style." Methods of teaching learning strategies are described in Weinstein and Mayer (1986) and McKeachie, Pintrich and Lin (1985). Good teaching involves more than communicating the content of one's discipline; a good teacher also needs both to motivate students to continue learning and to teach them the skills and strategies needed for continued learning. ■■■

(The author gratefully acknowledges helpful suggestions from Paul Pintrich and Barbara Hofer.)

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Copies of the Motivated Strategies for Learning Questionnaire (MSLQ) are available for \$10 each from

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SOFTWARE

Writing Coach

For most students — and many faculty — writing remains a daunting challenge. Facing the blank page, writers often feel they don't know what to do next. They may feel they have something to say, but don't know how to organize it. Lists of rules about grammar and structure don't help; they just darken those clouds of judgment. Word processors don't help; they just sit there like typewriters.

To help students get through these challenges and actually learn something about writing along the way, Paul Hagood, who teaches English at Linn-Benton Community College in Oregon, has devised a computer program called *Writing Coach*. Having worked with it for a month and a half, I've found it lives up to its name. Basically, the program gathers together practical heuristics for approaching a very wide range of writing tasks and reduces them to a series of reminders that encourage deepening of thought, structural clarity, and critical reflection, all in a very friendly, supportive way.

The program is really a series of macros designed to work within the most popular DOS, Windows and Macintosh word processors. Suppose you need to write an evaluative essay. Among its 67 worksheets and outliner options, *Writing Coach* offers one on evaluating. Call it up, and it appears as a series of on-screen prompts within the word processor you're used to using. You respond to the questions — which tend to be general and thoughtful, never sophomoric or machine-like — writing your thoughts in the free-form spaces provided. When you're done, a simple keyboard command caused the prompts and questions to vanish, and you often find you have composed a well-outlined first draft of the essay you wanted to write. Many of its worksheets take on writing tasks in less goal-directed and genre-

limited ways. There are "brainstormers," "reader analysis worksheets," "organizers," worksheets on revising and editing and three levels of "integrated worksheets" which combine brainstormers, reader analysis, and organizing prompts. In addition, Hagood has included an "outline bank" offering help with a range of letter- and memo-writing tasks, business and technical writing assignments, and common academic and general writing assignments. And the program comes with an excellent user's guide which constitutes a small, genial course on writing.



"The program is classical and formalist to some degree," says Hagood. "I like structure and clarity." Hagood describes the theoretical base of *Writing Coach* as "an eclectic blend." Basically, he calls it "reader-centered." Its focus is on the audience and critical thinking about the task at hand. "Theories that focus predominantly on free writing may end up encouraging student writing with little structure and few details," he says, and there are lots of times when what you basically want to do is help the student get the job done in a formally clear way.

Grad students, who may not have thought critically about writing since their freshman year, and business people seem to find the program especially useful. "People tell me,

almost as though they don't know whether to be angry about it or not, 'After I use this 10 - 15 times, I don't need to use it anymore,'" says Hagood. He's happy to think they feel able to write on their own without a coach. "[The program] helps them improve, but it doesn't do their thinking for them," he says. "It's basically like anything else: The more they put into it, the more prompts they respond to, the richer and more thoughtful their writing becomes."

At the same time, Hagood, who very much believes in encouraging writers to "find their own voice," admits, "My frustration with *Writing Coach* was that it tended to classical formalism in its emphasis on being 'reader-centered.' The brainstormers probably do the best job of freeing up the writer's imagination, but even there, they tend to promote critical thinking rather than totally unfettered original thought."

An avid journal writer and serious meditator himself, Hagood has addressed his frustration by creating an online meeting place for journal writers. His newly constructed "home page" on the Internet includes a "Memo from the Soul" to which anyone may contribute. It also offers an e-mail correspondence course Hagood has created called "Journal Writer." For a low monthly fee (\$5), subscribers receive twenty new prompts to thought and reflection designed to help them enrich their practice as journal writers and — one hopes — as writers in general. ■■■

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Hagood's World Wide Web site is located at <http://surf.rio.com/~wplace/> *Writing Coach* is priced at \$45 for students and academics.