EDUCATIONAL REFORM AND COMMUNITY COLLEGES

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While there is some risk, I suppose, in assuming that the problems with community college education in the United States translate directly to the educational issues in Canada, there is not much risk in assuming that education can be improved everywhere in the world and that there is considerable interest in improving it. In fact, there appears to be a widespread desire to return to the "good old days" when everyone--from automobile workers to students in school--took pride in doing good work.

Somewhere, a couple of decades ago, pride in accomplishment got lost, and a number of authors set out in search of excellence with the notion of returning it to the workplace. Peters and Waterman (1982), authors of the best-seller entitled In Search of Excellence, claim to have found excellence in highly successful corporations. Peters then teamed with Austin to write a sequel best-seller, entitled A Passion for Excellence thereby boosting the hyperbole a couple of decibels from the "search for" excellence to a "passion" for it.

Given our international passion for excellence, it is understandable that education should be the starting point. Fortunately, perhaps, education as a profession has a lot of accumulated experience in looking for excellence. For the

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past fifty years, educational reform efforts have appeared in cycles, each about a decade long (Sizer, 1983, p.1). The history of educational reform is that we generate intense criticism of the schools, followed by reform-minded commissions and study groups. We then reform the curriculum, raise standards, restore prestige to teaching, and then somehow it is all swept away again by the rising tide of mediocrity.

John Gardner wrote one of the most articulate and thoughtful books on excellence in 1961. He observed that one of the "absurdly obvious truths of which we must continue to remind ourselves" is that there are many varieties of excellence.

> "In the intellectual field alone," he wrote, "there is the kind of intellectual activity that leads to a new theory, and the kind that leads to a new machine. There is the mind that finds its most effective expression in teaching and the mind that is most at home in research. There is the mind that works best in quantitative terms, and the mind that luxuriates in poetic imagery.
>
> ...There is a way of measuring excellence that involves comparison between people...and there is another that involves comparison between myself at my best and myself at my worst." (p.152)

There are many kinds of excellence, and at the center of the community college philosophy is the conviction that each student should have the opportunity to develop excellence in some area of human performance. Unfortunately, I think, our current educational reform movement defines excellence in rather narrow ways.

Many of the school reform reports that have surfaced in the United States and Canada attribute the erosion of quality in education to the permissiveness of the 1960s and 70s and

reason that the solution is to swing the pendulum in the opposite direction, toward more control, more requirements, and tougher standards. These prescriptions call for simple corrections of perceived excesses of the past. Not enough homework?--assign more. Not enough testing?--require more. Too many electives?--insist on more requirements. These undimensional corrections might be labeled the swinging pendulum solution. A pendulum is in constant motion, but it never goes anywhere. It simply swings from one extreme to the other. Indeed, the momentum gained from a swing to the left provides the energy for the swing to the right.

If we are not more thoughtful about the goal of quality in education and how to attain it, we will spend the 1980s correcting for the permissiveness of the 1960s and 1970s, and we will spend the 1990s correcting for the overregulation of the 1980s. We might, I suppose, recommend more modest corrections, but that would simply slow down the pendulum, eventually stopping all movement.

The spiral staircase would appear to be a more apt metaphor for educational reform than the swinging pendulum. Whereas the swinging pendulum involves retracing old ground, the spiral staircase rises to new levels. We may circle back to look at old problems from new perspectives, but our motion is constantly upward to a higher plan of action. Educational institutions of the 1980s are operating in a different plane from those of the 1950s, and no one is more aware of that than community colleges who are dealing with large numbers of students who would not have attended college in the 1950s. We need to find

some new perspectives on educational reform if we are to avoid educational faddism and swinging pendulum solutions.

I would like to address myself to three new perspectives today. The first might be labeled "Creating Environments for Success," the second, "Teaching for Success," and the third "Taking Action."

Creating Environments for Success

Although I poked a little fun earlier at the excesses of the business world in their search for excellence, their research and writing on how to develop the human capital that is so essential to productivity in the 1980s, has some powerful messages for educators. Leaders in business are now paying a great deal of attention to the environments in which people work.

The general conclusion from research on the question seems to be that people will perform at their best in environments that encourage and reward excellence and that demonstrate respect for workers. If you read In Search of Excellence, you may remember that this study of the most successful companies in America concluded that the single most pervasive theme in excellent companies is their profound respect for the individual worker. Rosabeth Kanter, the respected scholar on corporate management, also emphasizes industry's recent shift from scientific management techniques to the cultivation of environments which nurture people and their ideas. She claims that there is a renaissance in the business world that calls for "a wholly new mode of operation" consisting of a shift from "trusting the system" to "trusting people" (Kanter,

1983).

There are many explanations for the search for people-based excellence, but one of the most compelling hypotheses is that proposed by Alvin Toffler, the futurist author of The Third Wave (1980). He identified three successive waves of economic growth in our history. In the First Wave, land was the capital asset of an agricultural society, and land owners became the barons of a growing economy based on the productivity of the land. In the Second Wave, the machines of the industrial revolution created economic power. Plant expansion, labor saving machinery, and the assembly line became the routes to prosperity. In the Third and current wave, dominated by computers and the production and processing of information, the capital asset is human beings. It is people who are the source of the creative ideas that provide the competitive edge in the information society. Ideas, says Rosabeth Kanter, are the "most potent economic stimulus of all (1983, p.18).

No wonder then that employers, states, and nations are concentrating so hard on the development of our human resources. For once, interest in people and interest in productivity and profits seem to coincide. How ironic, then, that the environments which have been found to stimulate excellence in corporations are frequently the opposite of what is recommended for excellence in our schools and colleges.

When Peters and Waterman set out to look for corporate excellence, they found it at both MacDonalds and IBM--in the production of the lowly hamburger as well as in the glamour of high tech. Their criteria for excellence seemed not to reside in the

prestige of the thing produced, but rather in the attitude and enthusiasm of the workers. They concluded that one of the main clues to corporate excellence lay in "unusual effort on the part of apparently ordinary employees" (p.xvii). There is a lot to think about in that deceptively simple conclusion. What do the books and reports on educational reform have to say about that? Are there recommendations that stimulate "apparently ordinary" people to unusual effort?

In the first place, there is surprisingly little attention given to "ordinary people" in the current educational reform reports. There is the clear implication that the rising tide of mediocrity is made up of embarrassing numbers of ordinary people, and that if excellence is our goal, then the selection of better students and teachers is the route. Colleges of education are advised to select better candidates; colleges are encouraged to raise admissions standards, and the Federal government is urged to offer scholarships to attract top high school graduates into teaching. There is not a lot said in the education reports about how to stimulate unusual effort on the part of the ordinary people that we seem to be faced with in schools and in colleges.

"Excellent companies," say Peters and Waterman, "require and demand extraordinary performance from the average man" (p.xxii). Since the tips for getting such extraordinary performance are scattered throughout their book, let me select a few of them and measure them against the recommendations of the educational reform reports.

"We observed, time and again," wrote Peters and Water-

man, "extraordinary energy exerted above and beyond the call of duty when the worker...is given even a modicum of apparent control over his or her destiny" (p.xxiii).

With a few notable exceptions, there isn't much inclination to give workers in education more control over their own destinies. In fact, external top-down control is frequently recommended as the proper antidote to the permissiveness of the 1960s and 1970s. Even the language of many of the recommendations implies an external authority who would regulate, control, and see that the proper check points are established and maintained. Peters and Waterman observed, however, that the encouragement of individualistic entrepreneurial spirit was more a hallmark of excellent companies than central control. The most successful corporations tended, they observed, "to create decentralization and autonomy, with its attendant overlap, messiness around the edges, lack of coordination, internal competition, and somewhat chaotic conditions in order to breed the entrepreneurial spirit." Excellent companies they found "had forsworn a measure of tidiness in order to achieve regular innovation" (p.301).

It doesn't take much reading of the reform reports to conclude that schools, if they follow the recommendations, will do the reverse and forswear innovation in favor of tidiness. The curriculum will be tidied up, goals will be articulated, standardized tests will control transitions, prospective teachers will pursue a core of common learning, and their curriculum will be tidied up to include certain courses and certain experiences in specified sequences. Actually, there isn't much evidence that

our current mania for tidiness will result in orderly schools with students and teachers pursuing learning with the contagious enthusiasm so essential to excellence.

Rosabeth Kanter (1983) warns against the mechanical solutions "that meet ever more refined minimum standards." She says "innovation is beginning to be recognized as a national priority" and our "emerging world requires more social and organizational innovation" (1983, p.19). Her solution is "to create conditions, even inside large organizations, that make it possible for individuals to get the power to experiment, to create, to develop, to test--to innovate." "Whereas short-term productivity can be affected by purely mechanical systems," she writes, "innovation requires intellectual effort. And that, in turn, means people. All people. On all fronts" (p.40).

The school reform movement of the 1980s is heavily into creating mechanical top-down solutions that can be quickly implemented. While control and specification may define minimal standards, they may also stifle the spirit of innovation and experimentation that researchers are finding so essential to excellent organizations.

My conclusion from these recent works is that until we can stimulate the ordinary people who inhabit our schools and colleges to "unusual effort" we will not have lasting excellence in education. Certainly, concern about minimal standards is necessary, but it is hardly sufficient, and we may be doing more harm than good in the long run if we send forth messages that educational excellence can be legislated and regulated from state offices without also working at the task

of creating climates of excellence in local colleges.

Peters and Waterman suggest that one of the ways to stimulate unusual effort on the part of ordinary people is to make people members of winning teams while also recognizing each individual as a star in his or her own right. "Each of us," they say, "needs to stick out--even or maybe particularly, in the winning institution" (p.xxiii).

Here I have to hand it to the reformers. I don't think there is one of them anywhere who does not want schools to be proud of their programs, proud of their teachers, and proud of their students. They sincerely, and even desperately, want education to field a winning team. It is also quite clear that they recommend rewarding outstanding achievement. There will be special encouragement for outstanding students; there will be master teachers, plus travel funds and extra bonuses. All of this recognition will be done on a competitive basis, with the appropriate reward going to the winners. So far, so good. Winning people on winning teams seems a sure-fire formula for success.

But that isn't really what Peters and Waterman observed in excellent companies. They found that excellent companies, "turn the <u>average</u> Joe and the <u>average</u> Jane into winners" (p.239, emphasis added). That is a bit more difficult, it seems, than recognizing winners. The tough problem is not in identifying winners; it is in making winners out of ordinary people. That, after all, is the overarching purpose of education. No one in education, I think, works harder at that task than community college educators. Yet historically, in most of the periods emphasizing excellence, education has reverted to <u>selecting</u>

winners rather than creating them.

In any era, colleges that are able to select winners among both students and faculty, are most likely to be perceived as quality institutions. Although "value added" is a sound educational concept and the ultimate educational challenge, it has not often been pursued with any vigor in education. Community colleges are frequently considered lower quality educational institutions than research universities, not on the basis of comparing the "value added" to their graduating classes, but by comparing the selectivity exercised in admitting their entering classes.

Peters and Waterman insist that there is no reason why organizations cannot design systems to support and create winners. Most excellent companies, they say, build systems "to reinforce degrees of winning rather than degrees of losing" (p.57).

At IBM, for example, sales quotas are set so that 70-80 percent of its sales people meet their quotas. As a less successful company, only 40 percent of the sales force meets its quota during a typical year. "With this approach," say the researchers, "at least 60 percent of the salespeople think of themselves as losers. They resent it and that leads to dysfunctional, unpredictable, frenetic behavior. Label a man a loser and he'll start acting like one" (p.57).

There is much in the present educational reform movement that should frighten us if, in fact, winning is important for ordinary people. Peters and Waterman observed that less-than-excellent organizations take a negative view of their workers.

"They verbally berate participants for poor performance....They want innovation but kill the spirit of the champion....They design systems that seem calculated to tear down their workers' self-image" (p.57).

That sounds a lot like what we are about in the educational reform movement of the 1980s. We are telling college administrators that they are not spending their limited resources wisely. We are telling teachers that they are not to be trusted to enforce standards. We are telling students that they are losers and threatening them with loss of further educational opportunity if they don't shape up. It is very hard to feel like a winner anywhere in the educational system today. But, the critics will object, how can you improve the educational system if you don't face the facts? Fair question.

The "facts" seem to be that there are some excellent schools and colleges out there, that there are some exceptional teachers, that we do know something about making teaching and learning more effective, that high expectations are important to performance, and that political and financial support are absolutely essential. We also know that expectations for students are not high enough to demand their best performance, and that until students experience success as a result of their own efforts, it will be hard for them to feel like winners. We also know that unless community college teachers see evidence that students are learning, it will be hard for them to feel like winners.

Now the question is, what do we know about making

"average" students into winners? Community colleges have worked hard at that in the past. What have we learned about how to teach for success?

Teaching for Success

One of the better applications of research knowledge on teaching and learning in higher education is found in the recent educational reform entitled, Involvement in Learning (Study Group on the Conditions of Excellence in American Higher Education, 1984). The committee of educational researchers who prepared the report conclude that "The quality of undergraduate education could be significantly improved if American colleges and universities would apply existing knowledge about three critical conditions of excellence--(1) student involvement, (2) high expectations, and (3) assessment and feedback"(p.17).

They define student involvement as the amount of "time, energy and effort students devote to the learning process" (p.17). It doesn't take research to convince any teacher that involvement in learning is critical; our own learning experiences and those of our students offer ample testimony. But the two fundamental principles derived from research by the authors of the NIE Report bear highlighting:

1. The amount of student learning and personal development associated with any educational program is directly proportional to the quality and quantity of student involvement in that program, and,

2. The effectiveness of any educational policy or practice is directly related to the capacity of the policy or practice to improve student involvement in learning (Study Group, 1984,

p.19).

The research findings of the past twenty years show quite conclusively that students who are involved in almost anything on the campus are more likely to learn and less likely to drop out than students who remain on the periphery (Astin, 1985). Students who live on campus are significantly more likely to graduate than commuters. This positive effect occurs in all types of institutions and among all types of students regardless of race, gender, ability, or family background. Holding a part-time job on campus, participating in athletics, student government, honors programs and almost anything else that brings the student into closer contact with faculty and fellow students seems to result in a closer identification with the college with the attendant positive effects on student retention.

The problem for commuter colleges is that it is extraordinarily difficult to get students involved in the life of the college. Because residential living and student activities are not significant aspects of the commuter college environment, the burden of involving students falls heavily on classroom teachers. Some teachers, especially those in community colleges do quite well at involving students in learning, but on the whole the typical college classroom doesn't demand much involvement on the part of students.

Lecturing to students has long been decried, yet it is the overwhelming method of choice for college teachers. It is estimated that teachers in the average classroom spend about 80% of their time lecturing to students, who are attending to what is

being said only about half of the time (Pollio, 1984). Added to the evidence of rather poor attention in the first place is the finding that the curve for forgetting course content is fairly steep. A generous estimate is that students forget 50% of the content within a few months (Brethower, 1977); a more devastating finding comes from a study that concluded that even under the most favorable conditions, "students carry away in their heads and in their notebooks not more than 42% of the lecture content" (McLeisch, 1968, p.9). Those were the results when students were told that they would be tested immediately following the lecture; they were permitted to use their notes; and they were given a prepared summary of the lecture. The test for immediate understanding was bad enough, but when students were tested a week later, without the use of their notes, they could recall only 17% of the lecture material. There must be a better way to teach subject matter. Fortunately, there is.

Research on mastery learning and its various offshoots is showing very positive results when the goal is the mastery of course content. Ben Bloom and his colleagues at the University of Chicago, after years of research on mastery learning, continue to show rather remarkable results, most recently that the average mastery learning student out-performs 84% of the students in control classes (Bloom, 1984).

Also promising for those of us working at the college level are the research findings on PSI (Personalized System of Instruction). PSI uses the mastery learning concept through insisting that students learn the material to 80% mastery before proceeding to the next step, through providing immediate feedback

on performance, through frequent testing, and through permitting students to learn at their own pace, encouraging them to distribute their time according to their needs.

After completing a comprehensive review of the substantial research that has been done on PSI over the past quarter of a century, James Kulik (1982) of the University of Michigan concluded that the average study showed that PSI was "remarkably effective." More than 80% of the studies found PSI significantly better than control classes when it comes to student achievement. When Kulik and his colleagues (1979) did a meta-analysis of 75 of the best studies, they found that PSI boosted average student achievement on final exams from the 50th to the 70th percentile. That is impressive, but equally persuasive are these findings:

1. PSI's superiority over control classes is especially clear in studies calling for integrative responses on final exams; there is less difference on exams calling for simple recall of information.

2. Achievement effects are clearest in studies using delayed measures of learning (i.e. exams weeks or months after completion of the course).

3. PSI is equally effective for high- and low-aptitude students.

4. Students consistently rate PSI higher than conventional classes.

There are other methods of teaching that appear promising, but none, I think, with quite the extensive evaluation that has been done on mastery learning and PSI.

The success of these teaching methods would appear to lie in the three conditions for excellence identified in the NIE Report, namely the demand for student involvement, frequent testing and feedback, and high expectations in the requirement that

students meet pre-set standards.

Now it should be said that research shows that community college teachers are more likely to strive for student involvement in the classroom than are teachers at the four-year college level (Wilson, et al., 1975). And they are also somewhat less likely than their counterparts in four-year colleges to make the unwarranted assumption that students are learning when teachers are talking. Where many community college teachers seem to fall short is in failing to hold high expectations for student performance.

Dick Richardson, who has done research in community college classrooms, claims that the response of many teachers to the perceived poor quality of today's students is to reduce cognitive demands to rather low-level skills. Thus instructors and students may jointly buy into classes with low-level cognitive demands in an unspoken agreement to make education less demanding for both students and teachers (Richardson, et al, 1983).

If students and teachers are to take pride in their accomplishments, then they have to accomplish something worthwhile. That moves me to my third and concluding question which is what actions might we take to make community college teachers and students winners who can take pride in their accomplishments?

Taking Action

I will not have time today to discuss the variety of things that might be done to increase student and faculty involvement in learning. My hope is that you will be able to see and support practices that lead to that goal, once the goal has been identified. Perhaps it is obvious by this time that I

believe that the two research themes that I have talked about today--one from research on climates of excellence in corporations and one from research on student learning--are sound principles on which to base action.

I might summarize by stating two principles of my own:

1) Excellence in student learning is directly proportional to excellence in teaching.

2) Excellence in teaching is a function of the extent to which teachers are involved in their work, treated like professionals, and encouraged to teach as well as they know how.

It may not be amiss to apply the research-based conditions for excellence in learning to teaching. Teachers should be involved; they should receive frequent feedback and evaluation; and they should be held to high expectations.

I contend that policies that support those conditions are likely to result in better education, whereas policies that undercut them will result in long-term losses for education.

Let me give one example of a concrete suggestion for action that incorporates the principles I have been talking about. Last month at the annual meeting of the American Association for Higher Education, I proposed the development of a new breed of college teacher that I labeled a Classroom Researcher. A Classroom Researcher is a teacher who uses the classroom as a laboratory, collecting data on student learning and using a variety of research methods appropriate to the study of teaching and learning in his or her particular subject matter. The purpose of the research is to provide immediate and appropriate feedback to the teachers on what students are learning. The advantages are

these:

1. Teachers need feedback on their accomplishments as much as students do. For most teachers, the intrinsic rewards of helping students learn are just as important as any extrinsic reward we can provide. Immediate feedback on performance measures that are credible to teachers themselves is an important reward in itself and an appropriate stimulus to improvement. Thus, I think it is important that teachers collect their own information on student learning. I am not opposed to collecting information on student learning at institutional and state levels as well, but if we want to make on impact on teaching, feedback should be immediate and credible to teachers.

2. While it is clear that good teachers have certain characteristics in common--knowledge of their subject and enthusiasm for teaching it, for example--good teaching cannot be universally defined; it is not the same in history as in auto mechanics. Research in cognitive psychology, while useful in pushing back the frontiers of knowledge, has not proved useful in actual classrooms because of the complexity of applying the knowledge to different types of students, in different subjects, with different teachers. If teachers want to understand how to improve their own teaching, they will do well to study the impact of <u>their</u> actions on <u>their</u> students.

3. Teachers, like students, need to be involved mentally in their work. If we want to return dignity and pride to the profession of teaching, we need to make teaching more intellectually interesting and challenging. Discipline-based research is not a mission of community colleges nor an interest of most

community college teachers. But teaching the same subject year after year without refreshment and renewal can become tedious. Classroom research has self-improvement as a goal, and self-improvement is a source of never-ending challenge and interest. It involves people in a way that externally imposed standards do not, and it is uniquely geared to the level of individual development.

4. Classroom Research should be the special province of teaching institutions, i.e., community colleges, state colleges, and liberal arts colleges. We in higher education have greatly overvalued research at the expense of teaching, building a hierarchy of institutional excellence that places research universities at the top and community colleges on the bottom. That false prestige hierarchy is most certainly not the route to improved education for undergraduates. Teaching institutions need to have their own dignity, worth, and intellectual challenges. It is my observation, from having spent more years in research than in teaching, that teaching in a dynamic atmosphere with constant interaction between teacher and student is a far more intellectually challenging task than conducting research in the quiet controlled environment of the laboratory. But teachers, like researchers, need to know what they have learned and they need to collect and analyze data to understand it.

My proposal to involve teachers in classroom research is but one concrete, immediately achievable action that we can take to improve teaching and learning in community colleges. It is one way to take us up the spiral staircase to look at old problems in new ways. Today's search for educational excellence will

be found, not in swinging pendulum solutions, but in the framing of new questions. The question I have addressed today is how can we involve teachers directly in the improvement of instruction. Making teachers successful is, I suggest, the best route to making students successful.

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