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The Gritty Reality of Teaching and Learning

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Abstract

Educators cannot realistically know what, how, or when to teach until they understand both whom they are teaching and the turbulent cross-currents in the world in which students are being educated. Research suggests that the nation's schools are disproportionately not providing deeper learning opportunities for students in the core curriculum. Deeper learning evokes an emotional sense in students that they are self-educating to where their passions and interests lie. Inspiring and mentoring the world's future leaders in a school setting merits being an educator's highest priority and most lasting legacy.

Introduction

In an age of viral epidemics, technological disruption, ubiquitous terrorist acts, large-scale ecological destruction, disquieting natural disasters, fractured global political consensus, asymmetric wealth, and deep social change, educators cannot realistically know what, how, or when to teach until they understand both whom they are teaching and the turbulent cross-currents in the world in which students are being educated. The idea that "the only constant is change" has been a truism of life since the Greek philosopher Heraclitus, circa 500 B.C. In speaking for a generation more than fifty years ago, Bob Dylan's lyrics foreshadowed what is perversely evident today, "The times they are a-changin'." Organizational thinker Margaret Wheatley (2017) argues that "this is the age of retreat, from one another, from values that held us together, from ideas and practices that encouraged inclusion, from faith in our leaders, from belief in basic human goodness" (37). In the gritty reality of teaching and learning, this is an age of relational blindness.

Selflessly, thoughtful teaching centers on creating opportunities for the students that one serves. Inspiring learners amid the gritty reality of teaching and learning to develop the courage and hone the skills necessary to confront the ambiguities, anxieties, and uncertainties that students face almost daily is a noble calling. Effective instructional goal setting in a volatile-uncertain-complex-ambiguous world requires reflectively confronting the contextual challenges to learners' cognitive well-being and life satisfaction. Without reflection, educators go blindly on their way, creating unintended consequences for learners and society. Do students, for example, experience a sense of connection and emotional intimacy with their classmates and the world around them, or a worrisome sense of detachment and despair? Do students' middle and high school experiences enlighten them about the pursuit, attainment, and maintenance of happiness in later life?

The National College Health Assessment recently revealed that over forty percent of college students reported "being too depressed to function well in the previous year." Another sixty percent "reported being lonely most of the time" (Santos 2019, 99). Strikingly, social science research suggests that there is a negative correlation between school grades and students' well-being. Yale University psychologist Laurie Santos (2019) contends that "the kids who get the best grades are the most miserable. They also have the lowest levels of self-esteem and the lowest levels of optimism" (101).

The Purposes of This Paper

The purposes of this paper are fourfold: To delineate the contextual challenges to learners' cognitive well-being in a volatile-uncertain-complex-ambiguous world. To describe the vital role of students' emotions in sustaining academic engagement. To define deeper learning as a complex portfolio of ever-evolving academic relationships in which mastery, identity, and creativity intersect. To illustrate the leadership opportunities and responsibilities of students in a globally interconnected, morally interdependent world.

Students' Emotions are a Critical Force in Learner Engagement

Multiple social science studies suggest that happiness is not about self-care. It is about being open to others and being other-oriented in one's personal and academic experiences. In instructional settings, do secondary students implicitly trust others, freely expressing positive or negative emotions which subjectively reveal how they feel in their lives, including smiling frequently, laughing spontaneously, or crying occasionally? When educators fail to appreciate the importance of students' emotions, they fail to recognize a critical force in student engagement. In a word, educators fail to appreciate the very reason that students learn at all (Immordino-Yang and Damasio 2016). In academic environments, deeper learning is synonymous with emotional engagement. Because deeper learning activates brain mechanisms that originally evolved to manage human beings' survival, sociality lies at the heart of deeper learning. Learners crave community and form learning communities naturally in a mind-set of discovery and shared meaning (Bowman 2019b).

Deeper Learning: The Place where Mastery, Identity, and Creativity Meet

Mehta and Fine (2019) recently embarked on a cross-country research tour to discover how progressive, well-funded, reform-minded schools in the United States exemplify what in practice is referred to as deeper learning. Deeper learning is defined as a set of competencies that include content mastery, critical thinking, collaboration, effective communication, and the ability to see connections across disciplines and time periods (Schoenberger 2019). For their part, the researchers defined deeper learning as the place where mastery, identity, and creativity meet. Students who engage in deeper learning, for example, are given regular opportunities to develop significant knowledge and skills, to connect their learning to who they are and who they seek to become, and to use their knowledge to produce something original. In academic environments, these qualities produce deep engagement when students perceive that they are part of a community that not only supports them but also holds them to high standards (Mehta and Fine 2019).

Counterintuitively, what Mehta and Fine (2019) encountered was an all-too-familiar gritty reality of teaching and learning in which disengagement is the norm: Students sitting in rows of desks, listening to teachers lecturing, students going to the board to solve problems, small groups meeting to complete worksheets, and intense preparation for high-stakes testing including memorization of facts and theorems (Schoenberger 2019). After sitting through hour after hour of interminable lecture classes, the researchers concluded that these ostensibly successful schools were disproportionately not providing deeper learning opportunities for students in the core curriculum. For well-meaning educators, change remains an elusively complex entity. Organizational change pioneer Richard Beckhard (1992), however, pinpoints a key variable in the lack of fundamental change in the nation's classrooms: Individuals do not resist change; they resist being changed.

In contrast, Mehta and Fine (2019) discovered that in elective classes, for older students who had completed a state-mandated curriculum, passionate educators and interested students often worked collaboratively on group projects and innovative lessons involving analytical, critical, and creative thinking. Research suggests that to sustain engagement in innovative lessons and group projects, learners require more autonomy over tasks (what they do), time (when they do it), technique (how they do it), and team (whom they do it with) (Pink 2009). Not surprisingly, research also suggests that students are happiest and perform best when they are thinking about instructional activities in terms of maximizing their strengths (Santos 2019).

Getting Emotions Right: The Heart of Resilient Teaching and Deeper Learning

Mehta and Fine's (2019) analysis of what works and what does not in American high school education revealed that for many students the most memorable parts of the school experience were participating in all-consuming activities such as a drama production, debate, school newspaper, and school yearbook, all of which occur on the edges of the core curriculum. The implication for educators is that meaningful thinking and learning are inherently emotional, essentially because learners think deeply about things that they care about. Relatedly, students learn best when they are motivated by real-world activities that have a distinctive social purpose and allow learners to collaborate in

teams and groups to achieve a shared goal. Deeper learning is not a solo act for either students or educators. It is a complex portfolio of ever-deepening relationships. The philosopher and Jewish theologian Martin Buber (1958) argues that in the ultimate sense “it is relationship which educates” (11). Ironically, the COVID-19 crisis has triggered an abrupt transition to emergency online teaching using videoconferencing programs like Zoom as the default mode of remote instruction. As a result, placing students in face-to-face small groups to complete projects involving collaborative learning has given way to large-group synchronous instructional lessons that tend to create teacher-centered learning emphasizing one-way communication.

Emotion scientists and pedagogical experts argue that engagement is a vital force in stimulating and sustaining deeper learning. Immordino-Yang and Damasio’s (2016) neuroscientific findings suggest that in academic environments emotional engagement is a necessary first step in learning. Instructionally, engagement means setting up challenges for students, for example, that are meaningful beyond getting a good grade. Mehta and Fine’s (2019) research findings suggest that both in life and in school deeper learning occurs when students embrace challenges by trying to produce something consequential, when they see purpose in what they are doing, when they have a choice involving what they are doing, when they have constructive feedback on their work, and when they are part of a community that not only supports them but also holds them to high standards.

Creating Safe Spaces for Deeper Learning

Harvard University professor Amy Edmondson (2019) coined the term psychological safety. The vital role of psychological safety in deeper learning was pinpointed in Google’s now-famous Project Aristotle in which Google’s researchers identified psychological safety as the key determinant of a team’s performance (Edmondson). In a culture of psychological safety, teachers make it safe for students engaged in collaborative activities to speak freely, share information, contribute imaginative ideas, value diverse perspectives, take risks, and to recontextualize failure. This is precisely what scientists at 3M did with the Post-It Note: glue that initially failed to adhere became one of its greatest corporate successes.

Mitigating fear in instructional settings begins with modeling for students the importance of being open-minded, non-defensive, and intellectually curious in discussing potentially sensitive topics, including climate change, illegal immigration, gun control policies, and community-police relationships. In practice, however, students often sense that classroom conversations dealing with culturally sensitive topics are somewhat risky and scary, because it potentially exposes one to the threat of being converted to another’s point of view. Recently, a change agent articulated that fear piercingly: “Most of us hate to hear new ideas.” Yet, unless educators create safe spaces for students to encounter new ideas, learners are denied important opportunities to experience significant intellectual and emotional growth.

Adaptive capacity is applied creativity. In instructional settings, “it is the ability to look at a problem or crisis and see an array of unconventional solutions” (Bennis and Thomas 2002, 101). The ability to recognize and understand context lies at the core of adaptive capacity. Across the educational landscape, the coronavirus pandemic currently tests the adaptation capacity of instructors and students alike. As many schools and universities shut down in-person instruction and transition to teaching remotely, there is an adaptive realization, for example, that some assignments are no longer possible, that some expectations are no longer reasonable, and that some instructional objectives are no longer attainable.

In traditional academic settings, the instructional challenge for educators remains one of highlighting the role of students’ adaptive skills in situation-sensing moments dealing with potentially divisive issues. Just as the chameleon adapts dramatically to its environment or context without ever ceasing to be a chameleon, it is essential that students develop their adaptive skills without ever losing their sense of self (Goffee and Jones 2006). To the extent that in life “any single quality defines success, that quality is adaptive capacity” (Bennis and Thomas, 91). Engagingly, for school-age youth adaptation capacity is a pivotal variable in the sustained enjoyment and mastery of video games (Bowman 1982).

In a culture of psychological safety, teachers reassuringly invite challenges to their own views and beliefs and acknowledge and affirm constructive feedback. In academic environments, educators create an aura of psychological safety through modeling the essential skill of active inquiry: “What leads you to think so?” “Can you give me an example?” “What might we be missing?” “Who has a different perspective?” (Edmondson) Such questions signal to students that their voice is desired and that it is psychologically safe to offer a thoughtful response in which

participants seek greater understanding of each other and a deeper truth (Bowman 2019b). In instructional settings, teaching students how to know what is true is an interdisciplinary pursuit.

Wisdom is perspective taking. To enhance students' and faculty members' ability to engage in clear and focused interpersonal exchanges, educators might consider introducing the four-sentence rule. Each participant in a class discussion or faculty meeting is encouraged to speak in four sentences or fewer. Doing so encourages others to think clearly about what they want to say before they speak, thereby enhancing understanding of mutual needs, common interests, and holistic understanding. In dialogic academic settings, the discipline of the four-sentence rule highlights the need to know when to speak, when to be silent, and when to listen (Kohlrieser 2006).

The Role of Learners' Values and Passions in Deeper Learning

Students pursue intrinsically-rewarding learning experiences that mirror their values and passions. Activities such as painting elaborate sets for a drama production, learning to hang stage lights, or taking charge as a stage manager encourage risk without unduly punishing missteps (Schoenberger 2019). As a first-year teacher, I was unexpectedly assigned the role of high school yearbook advisor. An initial audible gulp was emergently supplanted by the reassuring realization that committed learners pursue collaborative roles in how work gets accomplished through goal-directed adaptive behavior---the very core of intelligence. Decades later I recall resonantly the all-hours work with passionate, committed students that ignited a collegial sense of intense focus, excitement, stress, resiliency, and deeper learning. Remarkably, the small yearbook office became the place where mastery, identity, and creativity intersected: Students produced something academically consequential, saw instructional purpose in what they were doing, had choice in how they learned, received supportive feedback on their work, and felt that they were part of a school community that held them to high standards.

The congratulatory smiles that greeted the subsequently-published yearbook served as a refreshing reminder that students are wonderfully talented, are internally motivated when they believe in what they are doing, and are naturally creative when they wish to contribute (Wheatley 2017). Relatedly, for the yearbook students and their advisor the publication experience unmasked the face of collective leadership in life and in school: "Leaders need many others leading with them. Not under them. Not for them. Not following them. But leading with them" (Carucci 2006, 49).

The Gritty Reality of Teaching and Learning: A World of Raw Emotions

In print and social media, educators and students are being insistently exposed to a world of emotions in which visceral dislike borders on hatred, anger becomes narcissistic rage, opponents become enemies, and dismay teeters on despair. It is a world where individuals hear ideologically only what they want to hear always confirmed and never contradicted (Bowman 2019a; Wheatley 2013). In our media-drenched culture, the recent impeachment proceedings in the halls of Congress serve as a window into a world of raw emotions in which life is viewed through the prism of the present political moment. Still, political leaders tell us that all people want to belong and be part of a community that creates possibility and humanness in the midst of fear and turmoil (Wheatley 2017).

In a world that is confronting poverty, inequality, injustice, and viral epidemics, are today's students experiencing values-driven learning bounded by the philosophical question: What does it mean to be truly human? (Handy 2019) For educators and students engaged in a shared struggle to confront COVID-19, Albert Camus' *The Plague* serves as a profound meditation on life in the shadows of death. Seventy-three years after its initial publication, the French philosopher's novel forces learners to ask: What matters? Why do we live? How serious are we about our values? What is decency? What do we owe one another?

While empathy is innate among humans, it often requires an immersive real-life experience to bring it to the surface. Are class discussions centered on a theoretical analysis of the multidimensional phenomena of poverty, homelessness, and infectiousness illnesses followed-up with opportunities, for example, for students to serve as volunteers in a food pantry or shelter for the intermittently homeless or to bring food and medicine to the socially-isolated elderly? Neuroscientist Donald Calne frames the instructional implications for educators compellingly: The difference between reason and emotion is that emotion leads to action, whereas reason leads to conclusions.

Students seek intrinsically rewarding experiences that also allow them to make a contribution to society that fits their values (Sethi and Stubbings 2019, 41). In daily instructional activities, are students' direct experiences with adversity in the cauldron of everyday life tapped to inspire learners to think futuristically about not just how to make

a living, but how to live life in a more equitable, sustainable world (Krishman 2019). Instructional activities focused on furthering humanity serve to awaken students' recognition that at some moment in the near future each individual will be called upon to lead in some tangible way to truly care about what Pope Francis (2015), in his second Encyclical Letter *Laudato Si'*, eloquently calls "Our Common Home."

In the Gritty Reality of Teaching and Learning, Leadership Is Everyone's Responsibility

Today, spectacular leadership failures abound at the highest levels in public, private, military, and faith-based institutions (Chamorro-Premuzic 2019). The most powerful dimension of professional influence is inspiration. Inspiring and mentoring the world's future leaders in a school setting merits being an educator's highest priority and most lasting legacy (Bowman 2014). The primary ethical question in public life is: What's going on? The leadership challenge for aspiring student leaders in a connected world is arresting: "To see as clearly as possible what's going on in the tumult around us" (Wheatley 2013, 48). The leadership lesson for middle and high school teachers and students is to seek to understand the globally destructive behaviors of self-interest, incivility, greed, coercive power, zealotry, and violent extremism exhibited so provocatively on the world stage (Bowman 2014). Perceptive educators sense that life's most profound realities are often the most difficult for students to see and talk about. The role of educators as instructional leaders is to support students in interpreting uncertainty and managing meaning when others are unwilling or unable. In daily practice, teachers as leaders frame here-and-now global and societal challenges in ways that invite learners to connect with each other in the co-creation of meaning (Fairhurst 2011). In the co-creation of meaning, teaching and learning function as a network of relationships.

In a global culture which satisfies almost nobody, moving in a direction which confounds attempts to change it, leadership becomes everyone's responsibility. No one has permission to stand aside. In his last speech, shortly before he died in February 2002, John W. Gardner delivered a thunderous exhortation to students, educators, and citizens who seemingly give only fractured thought to the well-being of their schools, their community, and their nation. Gardner exclaimed: "Who gave them permission to stand aside? I'm asking you to issue a wake-up call to those people---a bugle call in their ear. And I want you to tell them that this nation could die of comfortable indifference to the problems that only citizens can solve. Tell them that" (Hesselbein 2003, 4).

The implication of Gardner's exhortation for today's middle and high school students is that leadership responsibility in a globally interconnected, morally interdependent world must be shouldered by everyone, right now (Bowman 2014). Leadership is no longer just for heroic leaders. Because emerging leaders will face challenges increasingly more complex than in the recent past, the nation's schools must find ways to cascade collaborative leadership opportunities across the campus which support students in experiencing leadership as a collective process, not a position.

Developing a Leadership Perspective on Campus

Leadership is learnable in school settings. Leadership is not a technical practice. Leadership is a calling to lead out of what is in one's soul. In every stage of life, leadership is a social obligation (Gopalakrishnan 2019). Educational institutions have a social license to lead in the development of society. Because the exercise of leadership is contextual, the skill set for today's students as emerging leaders is captured resonantly in President Theodore Roosevelt's enjoinder: "Do what you can, with what you have, where you are." As an initial step in assisting students to develop a leadership perspective, educators might well invite students to create journal entries related to self-reflective questions such as: Who is the individual who has most influenced my life in a positive direction? What are the events that have shaped my outlook on life in the deepest sense? What are the beliefs and convictions that I live by each day as I encounter events on the street and in social media? (Bowman 2014) Through the straightforward process of self-examination, students discover the awareness needed to lead.

Class discussions related to issues such as poverty, homelessness, climate change, and community-police relations invite students to calibrate their inner compass: What do I believe in? What principles do I stand for? What are the core values that have guided my daily life? Why would anyone in my school want to follow me? Why is it important for me to be viewed as an informal leader? (Bowman 2014) In a dialogic instructional setting, a shift in self-perception allows learners to see themselves in relation to others. To the degree that students hold values in common, they create an instinctive sense of community.

All-consuming extracurricular activities such as theater production, school newspaper, student year book, community-service activities, and athletics permit students to absorb the leadership skills and dispositions central to

achieving success and significance in later life. Thoughtful educators sense that the greatest challenge for middle school and high school students as developing leaders is not “understanding the practice of leadership, it is practicing their understanding of leadership in the everydayness of campus life, one conversation, one selfless act, one instructional activity, and one community-service project at a time” (Bowman 2014, 63). In every opportunity that students are given to speak and to serve, they are auditioning for informal leadership.

Conclusion

For teachers and their students, nothing changes without a personal transformation. For many well-meaning educators, however, change remains an elusively complex entity. Neuropsychologists contend that “the key to learning is that it is a fundamentally emotional process” (Fabritius and Hagemann 2017, 186). Adaptive teaching demands “getting emotions right” student-by-student in a classroom of emotional diversity. Deeper learning evokes an emotional sense in students that they are self-educating to where their passions and interests lie. For educators, student engagement is a vital force in stimulating and sustaining deeper learning. In the everydayness of instructional activities, deeper learning involves students in their own learning through an alchemy of shared inquiry, meaningful challenges, applied curiosity, working memory, and passion.

Ironically, in the interest of efficiency and control, traditional one-size-fits-all classroom management practices tend to neutralize students’ emotions in a setting in which educators have traditionally functioned as managers: plan, organize, coordinate, command, and control. In contrast, deeper learning activities serve to enhance instructional effectiveness by evoking students’ emotional engagement in tasks in which they seek out others to get their work accomplished collaboratively. In instructional networks, learners do not need to be managed in the traditional hierarchical sense. Rather, they need guidance, essentially because they are already self-motivated.

A Last Word

Culture is an organization’s basic personality. It is a self-sustaining pattern of behavior that determines how things get done. The culture of a school characteristically reflects the tension between four competing values: collaborate, create, compete, and control (Ulrich et. al 2017). How that tension is managed defines the culture of a school, either enhancing or diminishing organizational effectiveness. Schools that provide promising opportunities for deeper learning in elective courses, for example, honor the values of collaborate and create. Core courses that emphasize preparation for high-stakes testing, frequently in response to parental pressure, mirror the gritty reality of compete and control. In academic environments, educators turn those values into learner behavior: Deeper learning that is inherently emotional versus sitting through lecture classes, memorizing dates and facts, and yielding the social control of the educational process to the teacher. Importantly, how schools manage the tension between the four competing values of collaborate, create, compete, and control determines whether or not the school serves as an influential institution in society. In influential institutions, educators create a climate that evokes a sense of common purpose, belonging, emotional engagement, and a shared vision in which learners’ best ideas and insights surface spontaneously in a self-renewing environment of ever-deepening relationships. In influential institutions, a vision is honored only through action.

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