Sustaining Institutional Vitality in a VUCA World
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The concept of a VUCA world—one that is **v**olatile, **u**ncertain, **c**omplex, and **a**mbiguous—is often used to describe the turbulent, unpredictable, and rapidly changing environmental context considered by many to be the "new normal" for higher education. Some management experts believe that to survive and thrive in a chronically turbulent (VUCA) environment, leaders at all levels will need the mindset and capabilities of an educational innovator—an agile learner and innovator who embraces and exploits change in the delivery of educational programs and services to sustain competitive advantage.

This article is organized into two parts. **Part I** presents the concepts of a VUCA world in the context of higher education, explores emerging leadership paradigms as a counter-response, and examines six (6) essential skills for entrepreneurial success based on research conducted by Amy Wilkinson, author of *The Creator's Code: The Six Essential Skills of Extraordinary Entrepreneurs* (2015). Drawing from a decade of my experience as a higher education consultant, **Part II** presents an analysis of the restraining forces that work contrary to Wilkinson's essential skills most frequently encountered at client institutions. From this analysis, six (6) axioms are posited as essential enablers to innovation and change in the higher education context, along with proven leadership strategies from the field.

Part 1: Higher Education in a VUCA World

The New Normal in Higher Education

As a higher education consultant, I routinely ask institutional leaders, "What leadership issues keep you up at night?" Not surprisingly, the responses have reflected the myriad environmental factors that oft impact the vitality of the academic enterprise—institutional image problems, changing demographics, intensifying competition, funding reductions, enrollment volatility, budget pressures, academic program relevance, to name a few. While the types of issues cited have remained fairly consistent over the years, the complexity of leadership challenges have intensified due, by most accounts, to the interconnectivity of issues and accelerating pace of change.

This complex and chronically turbulent higher education context is often described as a "VUCA" environment—a U.S. military term for a turbulent, unpredictable and rapidly changing environment that is characterized as:

- **V**olatile: Change happens rapidly and on a large scale.
- **U**ncertain: The future cannot be predicted with any precision.
- **C**omplex: Challenges are complicated by many factors and there are few single causes or solutions.
- **A**mbiguous: There is little clarity on what events mean and what effect they may have before becoming disastrous.

Many higher education experts assert that the challenges presented by the global economic downturn in 2008-09, in combination with other environmental forces (e.g., demographics shifts, declines in government funding, technology innovations), have dramatically altered the terrain for colleges and universities—creating a "new normal" that requires a strategic rethinking of existing structures and operating models to thrive (Lumina Foundation, 2010).

Leadership Paradigms for a VUCA World

According to research conducted by The Boston Consulting Group (BCG, 2011), organizations that are adaptive and agile are more likely to thrive during turbulent times. In a similar vein, a report by the Center for Creative Leadership (Petrie, 2011) suggested that to lead and thrive in a VUCA context, leaders must be more adept than in the past at *complex and adaptive* thinking abilities, such as rapid

learning and problem-solving, self-awareness, comfort with ambiguity, and strategic thinking. Indeed, even the most experienced higher education leaders may be taxed in addressing the challenges of an ever-changing (VUCA) environment.

Bob Johansen, distinguished fellow at the Institute for the Future and author of *Leaders Make the Future* (2012) proposed an antidote, coined "VUCA prime", as a counter-response for effective leadership in a VUCA context. In his leadership paradigm, VUCA leaders possess:

- **V**ision, the ability to communicate a clear intent of the desired future—a counter-response to *volatility.*
- **U**nderstanding, the ability to stop-look-and-listen—a counter-response to *uncertainty.*
- **C**larity, the ability to simplify and make sense out of chaos—a counter-response to complexity.
- **A**gility, via the fostering of two-way flow of power and authority across an organization to enable adaptive and rapid decision-making and action—a counter-response to *ambiguity.*

Other leadership paradigms have emerged in recent years that build on these concepts. For example, the notion of an educational innovator (sometimes referred to as an edu-preneur) has gained some attention. A recent EDUCAUSE Review blog referred to an entrepreneurial leader as "an enabler, one who uses their leadership skills to motivate teams to innovate and create, take appropriate risks, and not fear failure or focus too much on success when moving ideas into action" (Gray, 2016).

The leadership paradigms posited by Johansen and others are grounded in many of the principles that have long been considered critical to achieving a high performing organization. Yet, the literature is rife with references to the slow pace of change in colleges and universities despite pressures to the contrary (Armstrong, 2013). Often said assertions are presented as sweeping generalizations of the higher education landscape. However, without doubt, there is some truth to the arguments presented.

In my experience, while colleges and universities excel in generating and transferring knowledge; many fall short (at least on a systemic basis) in being agile and adaptive in creating and translating new ideas into action. Therefore, upon reading Amy Wilkinson's book, *The Creator's Code: The Six Essential Skills of Extraordinary Entrepreneurs* (2015), many of the perspectives presented truly resonated as having relevance to the higher education context.

Based on research with over 200 top entrepreneurs across diverse fields, Wilkinson observed that the fundamental skills for entrepreneurial success required daring and disciplined leadership, along with the mastery of six essential skills of an "idea creator" that can be learned, practiced, and passed-on. These included:

1. **Find the gap:** Spot opportunities that others don't see.
2. **Drive for daylight:** Manage speed by focusing on the horizon.
3. **Fly the OODA loop:** Master fast-cycle iteration to observe, orient, decide, and act.
4. **Fail wisely:** Set a failure ratio and hone resilience.
5. **Network minds**: Harness cognitive diversity to build on each other's ideas.
6. **Gift small goods:** Unleash generosity to increase productivity.

Wilkinson's six essential skills presented a useful construct for considering two critical questions within the realm of higher education:

(a) What restraining forces work contrary to Wilkinson's six essential skills?
(b) What strategies have proven to be effective enablers that counteract the restraining forces?

The remainder of this article addresses each of these questions from my experience in consulting with a multitude of institutions for more than a decade.
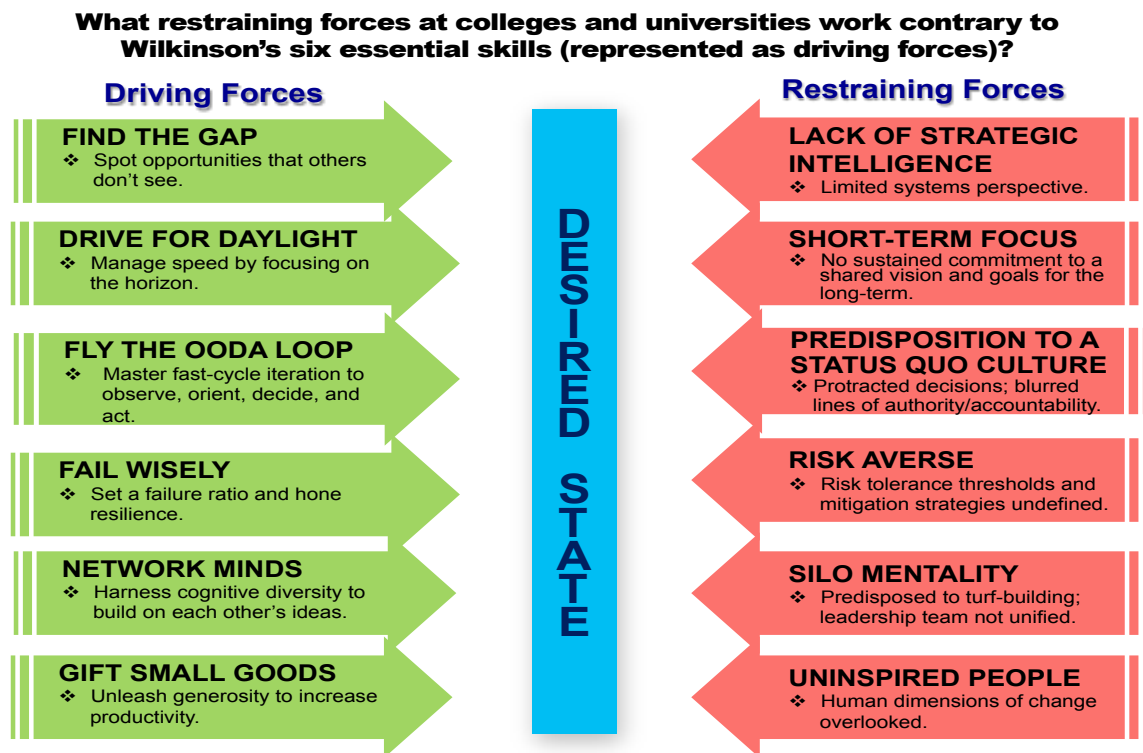
Part II: Sustaining Institutional Vitality in a VUCA Higher Education Context

Key Restraining Forces to Change

Representing Wilkinson's six essential skills as "driving forces" for innovation and change, *Figure 1* presents a Force Field Analysis (Kurt Lewin, ©1940) of the "restraining forces" that work contrary to the essential drivers most frequently encountered at client institutions. These include:

1. **Lack of strategic intelligence:** Insufficient research and data to bring a systems perspective to inform institutional planning efforts.
2. **Short-term focus:** Lack of commitment to a shared vision and goals over the long-term.
3. **Predisposition to a status-quo culture:** Protracted decision processes, outdated policies and practices, and/or blurred lines of authority and accountability.
4. **Risk averse:** Absence of bold leadership to challenge the status quo, embrace innovation, act on ideas, accept risks within reasonable limits, and tolerate potential failure.
5. **Silo mentality:** Pervasive turf-building mentality and information silos.
6. **Uninspired people:** Organizational culture and the human dimensions of change are underleveraged in the change process.

Figure 1: **Common Restraining Forces to Wilkinson's Six Essential Skills**

What restraining forces at colleges and universities work contrary to Wilkinson's six essential skills (represented as driving forces)?

Driving Forces

FIND THE GAP
❖ Spot opportunities that others don't see.

DRIVE FOR DAYLIGHT
❖ Manage speed by focusing on the horizon.

FLY THE OODA LOOP
❖ Master fast-cycle iteration to observe, orient, decide, and act.

FAIL WISELY
❖ Set a failure ratio and hone resilience.

NETWORK MINDS
❖ Harness cognitive diversity to build on each other's ideas.

GIFT SMALL GOODS
❖ Unleash generosity to increase productivity.

DESIRED STATE

Restraining Forces

LACK OF STRATEGIC INTELLIGENCE
❖ Limited systems perspective.

SHORT-TERM FOCUS
❖ No sustained commitment to a shared vision and goals for the long-term.

PREDISPOSITION TO A STATUS QUO CULTURE
❖ Protracted decisions; blurred lines of authority/accountability.

RISK AVERSE
❖ Risk tolerance thresholds and mitigation strategies undefined.

SILO MENTALITY
❖ Predisposed to turf-building; leadership team not unified.

UNINSPIRED PEOPLE
❖ Human dimensions of change overlooked.

Each of the identified "restraining forces" is well documented in the literature as a common obstacle to high performance. Therefore, it stands to reason that the more obstacles that exist within an institutional context, the greater the potential for institutional atrophy. This begs the question, *what can be done to mitigate atrophy and enable institutional vitality*?

While there are no magic bullets for ensuring institutional vitality, I have observed several enabling conditions among client schools that are more adept than others at navigating turbulent times. A discussion of these follows.

Six Axioms for Enabling Institutional Vitality

In considering each of the six restraining forces presented in *Figure 1* relative to effective practices observed at client schools, six axioms emerged as essential enablers to innovation and change. These include:

1. Build capacity in **strategic intelligence.**
2. Leverage the **power of process** in visioning and integrated planning.
3. Promote a **high performance organizational culture** focused on continuous improvement.
4. Foster a **learning environment** that encourages innovation and managed risk-taking.
5. Develop a **unified leadership team**.
6. Invest in the development of your most valuable asset…**your people.**

A brief description of each axiom follows, along with enabling strategies that have proven successful in the field.

Axiom 1: Build capacity in strategic intelligence.

Wilkinson's first essential skill was the ability to "**Find the gap: Spot opportunities that others don't see.**" An organization's ability to do so depends in large measure on its ability to collect, analyze and effectively use strategic intelligence (referring to research, data, and analytics) to identify and address the environmental factors that are most likely to impact institutional vitality.

A study conducted by the EDUCAUSE Center for Applied Research (Bichsel, 2012) found that while most institutions were awash with data and viewed its use as important to gain insights and act on complex issues, the reality for many was that they lacked the capacity to do so. Among the major barriers identified was that building capacity in strategic intelligence was viewed as an expense rather than as an investment. The study concluded that expensive tools and methods were not what were needed most. Rather, investment was needed in professionals who possess skills in defining strategic research questions, developing data models, and in designing and delivering recommendations and reports.

From my experience, in the absence of strategic intelligence, institutional planning efforts tend to realize only short-term tactical benefits. Client institutions successful in navigating turbulent times typically invest in two areas:

1. In building staff capacity and expertise in quantitative and qualitative research; and
2. In collecting, analyzing and using strategic information to gain insights on known issues or assumptions regarding the forces of change most likely to impact institutional vitality.

In building staff capacity, there are numerous effective strategies that may be considered:

- Hire/designate a skilled institutional researcher/analyst—If a skilled analyst is lacking, this should become an institutional budget priority.
- Identify and empower a talent team of 4-6 faculty/staff with diverse backgrounds (e.g., a social science research expert, a student data expert, an IT reporting expert, a librarian, etc.)
- Engage students in class-based research projects
- Host a summit with industry leaders to identify emerging needs
- Establish a rolling annual reserve fund to support systematic research (e.g., image and demand studies)
- Secure third party research services
- Secure a full-service higher education consulting firm to guide initial efforts

In terms of where to invest time and effort in the development of strategic intelligence, a framework that has proven useful at many client schools is presented in *Figure 2*. The framework consists of eight

planning filters that are commonly considered to be forces of change in the higher education context including: image and market position, student demand, industry demand, competitive opportunity, program relevance, program capacity, institutional capability, and enrollment and cost performance.

In application, following consultations with institutional leaders to identify known issues and/or commonly held assumptions pertaining to each of the planning filters, strategic research questions can be formulated and used to focus a situational analysis that is conducted by a designated talent team. A systems perspective is taken in the formulation of the research questions in order to bring alignment between the institution's external environmental context and internal operational context.

Figure 2: **Eight Common Forces of Change**

FORCES OF CHANGE	EXTERNAL FACTORS	ALIGNMENT WITH INTERNAL FACTORS
Image & Market Position	Perceived image and reputation are aligned with the desired institutional identity and market positioning	Features of the desired institutional identity AND existing recruitment/ marketing communication messages
Student Demand	Identifiable and sizable student demand exists among priority student markets	Trends in the profiles of applicants, newly enrolled & successful completers
Industry Demand	Career/job prospects exist for program graduates	Trends in program demand, completions & graduate employment at your institution & key competitors
Competitive Opportunity	Sustainable competitive advantage is feasible relative to the saturation and market share of competitors	Trends in institutional applicant market share AND in applicants selecting your school as their 1st choice
Program Relevance	Learning needs and preferences of target student markets (e.g., high school students, adult learners)	Satisfaction levels of current students and graduates among priority student markets AND by program
Program Capacity	Programs with growth potential (i.e., demand & competitive opportunity)	Program capacity exists or can be created at modest cost (e.g., instructors, space, technology)
Institutional Capability	Programs with growth potential (i.e., demand & competitive opportunity)	Institutional capacity is scalable or can be created at modest cost (e.g., advisor to advisee loads)
Enrollment & Cost Performance	Perceived value and affordability of a degree/credential (funders, prospective students, others)	Return on Investment (holistically defined) to students AND institution in realizing enrollment & net revenue goals

To illustrate, using the planning filter on *Image and Market Position*, the following two aligned strategic research questions may be framed:

- *External Context:* What are the perceptions of prospective student markets and their influencers regarding the institution's image and reputational advantages/disadvantages relative to key competitors?
- *Internal Context:* What are the features of the institution's desired brand identity, and associated marketing messages used to convey the institution's differential advantages to prospective student markets and their influencers?

By comparing available information on the institution's perceived image/reputation (e.g., college/university rankings on related factors, institutional image/applicant studies), to the key messages that are currently communicated to prospective student markets, a gap analysis can be conducted to identify areas of institutional strength, weakness, opportunity and threat; as well as critical information gaps to be addressed. From the information collected across all eight planning filters, strategic issues and opportunities can be identified to focus institutional planning efforts on what matters most.

Axiom 2: Leverage the power of process in visioning and integrated planning.

Wilkinson's second essential skill was the ability to **"Drive for daylight: Manage speed by focusing on the horizon."** The need to create and focus on a shared vision has long been argued by management scientists such as Peter Senge, Peter Drucker, among many others, as a fundamental requirement in leading change. Yet, time and again, when institutional leaders are asked about their commitment to a vision and long-term planning, a common retort is "planning takes too much time" or "the process never yields useful results".

Frequently overlooked by many campus leaders is the **power of the process**. Effectively implemented, an inclusive, systematic and integrated approach to planning can be a powerful tool in building campus-wide awareness and understanding of the issues at hand, a compelling and shared vision and goals for the future, as well as engagement and buy-in to change.

Effective strategies client institutions have used to build awareness and foster campus-wide engagement in integrated planning include:

- **The World Café** approach to broad-based consultations. This approach is grounded in the principles of **conversational leadership** as a process for hosting and engaging large groups in dialogue on strategic issues that matter. Through progressive rounds of hosted conversations, participants share diverse perspectives on well-crafted questions and learn from the contributions of others. Key insights are recorded and infused into planning and decision processes. When academic and administrative leaders jointly host events, commitment is demonstrated to integrated planning.
- Conducting **root cause analyses.** Diverse teams of frontline staff/faculty are assembled who have the expertise to contribute to the problem-solving process. Through expertly facilitated brainstorming sessions, each problem can be deconstructed to identify the sequence of actions that contributed to it through a process that brings collective understanding and engagement to the issues at hand.
- An **internal communications and engagement strategy**. Campus-wide engagement is promoted via a targeted, audience-specific communications strategy that conveys the vision for change relative to the current reality, a rationale for why there is a need for change, audience-specific messages that convey the vision in terms that people care about, a call to action that provides concrete opportunities for engagement, and a mechanism for garnering constituent feedback.

Axiom 3: Promote a high performance organizational culture focused on continuous improvement.

Wilkinson's third essential skill was the ability to **"Fly the OODA loop: Master fast-cycle iteration to observe, orient, decide, and act."** From her perspective, creators move nimbly from one decision to the next. They master fast-cycle iteration and in short order gain an edge over less agile competitors. Yet, many client institutions have been challenged in their ability to action innovative ideas. Often, issues associated with organizational culture were at the heart of the matter.

An organization's culture is a reflection of what is valued, the dominant managerial and leadership styles, the language and symbols, the procedures and routines, and the definitions of success that make an organization unique (Cameron and Quinn, 2006). A "high performance culture" is one where all individuals work collectively toward a shared vision and results-based goals, people trust and value each others' contributions, values-based differences are leveraged to inspire innovation, and individual and team learning is encouraged and rewarded (Reid and Hubbell, 2005). In effect, organizational culture drives how people behave, and the collective behavior of the organization's people drives performance. Therefore, an organization's culture is a unique defining feature. Competitors can copy strategies, but not culture. Thus, culture is too important to be left to chance.

Research suggests that a lack of attention to the human and cultural dimensions of change is among the most frequently identified factors contributing to why change efforts fail (Strategy&, 2013). To effectively leverage culture in the change process, an understanding is needed of the prevailing culture value orientations relative to those of a high performance culture. Typically, such understanding stems from conversations with individuals who occupy both formal and informal positions of influence to garner insights on the historical factors that have contributed to current behaviors, attitudes, performance management and incentive systems. Some client schools have worked with their human resource specialists to identify and administer a structured organizational cultural assessment survey to inform this process. Regardless of the approach used, once cultural readiness for change is ascertained, a determination can be made of what leadership strategies are needed to support the transitioning process.

Axiom 4: Foster a learning environment that encourages innovation and managed risk-taking.

Wilkinson's fourth essential skill was the ability to **"Fail wisely: Set a failure ratio and hone resilience."** Wilkinson found that creators viewed small failures as essential to avoiding catastrophic mistakes; and that by learning from what went wrong, setbacks could be turned into successes. The concept of a learning organization (Senge, 1990)—one that continually expands its capacity to learn and innovate—is not new. Yet, from my experience, many institutions lack tolerance for experimentation and risk-taking.

Few would argue that institutions and individuals must continue to learn in order to address evolving student needs, improve practices, and remain agile in the current day's complex higher education context. In effect, innovation is a learning process that often involves missteps and recovery along the way. All strategies (even maintaining the status quo) involve an element of risk and uncertainty. Therefore, as enablers of innovation, institutional leaders need to be more adept than in the past in:
- Inspiring strategic thinking and experimentation to advance the vision
- Willingly assuming risks and uncertainty within established limits
- Ensuring risk-mitigation strategies accompany new initiatives
- Addressing emergent issues expediently
- Promoting knowledge sharing and learning
- Empowering people and holding them accountable for performance results
- Being resilient when missteps occur
- Rewarding creativity and *intelligent* performance

A useful tool for enabling innovation and managed risk-taking is the **accountability charter**—a living agreement that infuses the organization's vision and strategy into the daily work and purpose of individuals/units/teams (BCG, April 2011). Accountability charters differ from job descriptions, which tend to describe existing roles/responsibilities. The process of chartering enables discussions to clarify the purpose for work assignments within the context of the institution's vision, define roles/responsibilities in change, articulate performance expectations and accountabilities, establish decision authorities, ensure enabling support systems, determine performance effectiveness indicators, identify learning and development needs, as well as performance incentives/rewards (as appropriate).

To mitigate risk associated with change strategies, performance indicators, metrics, risk-tolerance thresholds, and reporting systems need to be defined at all levels (strategic, tactical and operational) and approved as part of the chartering process to ensure agility in performance management. In this way, those accountable for strategy execution have the tools to routinely monitor the impact of the strategy employed to identify performance issues early in the implementation process; not just at the end of a reporting period or year when it is too late to take corrective action.

Axiom 5: Develop a unified leadership team.

Wilkinson's fifth essential skill was the ability to **"Network minds: Harness cognitive diversity to build on each other's ideas."** Wilkinson found that to solve multifaceted problems, creators harness the brainpower of diverse individuals to build on each other's ideas. Yet, many institutions suffer from a pervasive silo mentality that impedes information sharing. Unfortunately, a lack of collaboration is often dismissed as simply an inability of some to play nicely with others. However, said behaviors tend to be symptomatic of a much larger organizational problem—a leadership team that is not unified. At some client institutions, a silo mentality was considered to be the number one impediment to innovation.

A cohesive leadership team collectively understands the vision, assumes shared responsibility for its realization, fosters a culture of continuous improvement, and actively promotes and contributes to its achievement. A unified leadership team is built on trusting relationships (Gleeson and Rozo, 2013).

From experience, I have learned that the ability to establish, grow, extend, and (where needed) restore trust among constituents is among, if not *the* most critical competency of a leader of transformative change. When working with individuals who possess differing viewpoints, some conflict is inevitable. Effectively managed, conflict provides an opportunity to build trust, team cohesion and creative solutions—and therefore should not be purposefully avoided. As a trust builder, leaders must be adept at managing conflict and leveraging the positive elements by facilitating learning conversations that allow others to share their views, opinions and values respectfully and without fear of reprisal. Trusting relationships develop when leaders consistently act with integrity and visibly demonstrate their commitment to supporting others by asking good questions, actively listening, addressing emergent issues head-on, communicating the rationale for decisions taken, holding people accountable for their behavior and performance, rewarding creative efforts, and extending trust to others.

Axiom 6: Invest in the development of your most valuable resource…your people.

Wilkinson's sixth and final essential skill was the ability to **"Gift small goods: Unleash generosity to increase productivity."** Wilkinson found that creators work at strengthening relationships with others through acts of support and kindness. Indeed, change is disruptive. Complex change impacts the entire organization, and particularly its people. Yet, institutional leaders often neglect to plan for the human side of change, and then wonder why their best-laid plans have gone awry.

The conventional focus in introducing change is on the tactical aspects for achieving on-time and on-budget outcomes. Wilkinson's research (among others) revealed that knowledge management and people are the key determinants of success in change efforts when strategies are tied to attracting, retaining, motivating, and developing the "right" people, in the "right" roles, with the "right" skills. Therefore, it stands to reason that institutions must invest in their most valuable resource and source of competitive advantage---its people.

Unfortunately, in tough budget times, funds to fill position vacancies and support professional development of existing personnel are often reduced/eliminated. Creative strategies that do not require extraordinary budgetary resources abound. For example:

- If there is an unfilled position vacancy, partner with another area that has the staff expertise sought to combine resources in achieving mutual goals. To illustrate, a highly effective strategy I employed in this situation involved negotiating a half-time role for the director of marketing in another division to work with student recruitment officers in my division to infuse a marketing-orientation into recruitment efforts.

- If professional development funds are limited, consider strategies such as inviting guest speakers/experts from other institutions/organizations, hosting lunch and learn cross-unit meetings, and creating cross-unit training opportunities.
- To reward performance efforts, write personalized notes and enclose a gift card to the local coffee/tea company.
- To build leadership capacity, invest time and effort in identifying and mentoring those who demonstrate the drive and capability to be leaders of the future.

In relation to the latter, mentoring is one of the most crucial roles of today's leaders. When done right, mentoring can improve loyalty and retention of talented personnel, as well as aid in shaping a high performance culture.

Final Thoughts

To survive and thrive in the current day's chronically volatile, uncertain, complex and ambiguous (VUCA) higher education environment, many management experts believe that colleges and universities must become increasingly adaptive and agile. This article presented the concepts of a VUCA world in the context of higher education, explored potential leadership paradigms as a counter-response, and examined six (6) fundamental skills for entrepreneurial success based on Wilkinson's research (2015).

Drawing from a decade of higher education consulting experience, key restraining forces to Wilkinson's model for entrepreneurial success were presented from a higher education context. From this analysis, six (6) axioms and associated leadership strategies were posited as essential enablers to innovation and change including: 1. build capacity in strategic intelligence, 2. leverage the power of process in visioning and integrated planning, 3. promote a high performance culture focused on continuous improvement, 4. foster a learning environment that encourages innovation and risk-taking, 5. develop a unified leadership team, and 6. invest in the development of others.

In doing so, higher education leaders must become creators of the future and architects of change. They must seek opportunities to innovate with a view to sustaining competitive advantage, empower and value the contributions of others as co-creators in the process, accept missteps as lessons learned—not evidence of failure, and invest in the development of others as well as in themselves.

References

Armstrong, L. (2013). Barriers to innovation and change in higher education. *TIAA-CREF Institute.* Retrieved from https://www.tiaainstitute.org/public/pdf/barriers-to-innovation-and-change-in-higher-education.pdf

Bichsel, Jacqueline. *Analytics in Higher Education: Benefits, Barriers, Progress, and Recommendations* (Research Report). Louisville, CO: EDUCAUSE Center for Applied Research, August 2012. Retrieved from http://www.educause.edu/ecar.

Cameron, K.S. & Quinn, R. E. (2006). *Diagnosing and changing organizational culture: Based on the competing values framework.* San Francisco, CA: Jossey-Bass.

Strategy& (2013). *Culture's role in enabling organizational change.* Retrieved from http://www.strategyand.pwc.com/reports/cultures-role-organizational-change

Gleeson, B. and Rozo, M. (2013, October 2). The silo mentality: How to break down the barriers. *Forbes.* Retrieved from http://www.forbes.com/sites/brentgleeson/2013/10/02/the-silo-mentality-how-to-break-down-the-barriers/#30f01c085f3e

Gray, G. (2016, September 6). Approaching leadership as entrepreneurship: lessons from LCI (Leading Change Institute) 2016. [Web log post]. Retrieved from http://er.educause.edu/blogs/2016/9/approaching-leadership-as-entrepreneurship-lessons-from-lci-2016

The Boston Consulting Group (BCG). (2011, September). *High performing organizations: The secrets of their success*. Retrieved from https://www.bcg.com/documents/file84953.pdf

The Boston Consulting Group (BCG). (2011, April). *Role charters: Faster decisions; stronger accountability*. Retrieved from https://www.bcg.com/documents/file74690.pdf

Johansen, R. (2012). *Leaders make the future: Ten new leadership skills for an uncertain world.* San Francisco: Berrett-Koehler Publishers.

Navigating the "New Normal"(2010). Paper presented at the Lumina Foundation for Education National Productivity Conference. Retrieved from https://www.luminafoundation.org/files/publications/Navigating_the_new_normal.pdf

Petrie, N. (2011, December). Future trends in leadership development. Greensboro, NC: Center for Creative Leadership. [White Paper]. Retrieved from http://insights.ccl.org/wp-content/uploads/2015/04/futureTrends.pdf

Reid, J. & Hubbell, V. (2005, March/April). Creating a performance culture. *Ivey Business Journal.* Retrieved from http://iveybusinessjournal.com/publication/creating-a-performance-culture/

The World Café [Web site, 2016]. http://www.theworldcafe.com/key-concepts-resources/conversational-leadership/#

Wilkinson, A. (2015). *The creator's code: The six essential skills of extraordinary entrepreneurs*. Simon and Shuster. New York, NY.

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