THE FUSION OF LEARNING, KNOWLEDGE, AND SERVICE IN AN ERA OF GLOBALIZATION

President's Inaugural Message

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CALIFORNIA STATE UNIVERSITY, EAST BAY
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DEFINING THE NEW GLOBAL LANDSCAPE

In his 2005 book titled, *The World is Flat*, New York Times columnist Thomas Friedman illustrates how the convergence of various forces such as technology, shifts in manufacturing centers and fundamental changes in supply chains have “flattened” the world. According to Friedman, globalization has unleashed tremendous and unprecedented potential for generating new markets and creating virtually unlimited wealth. Indeed, this is a profound insight that seemingly upstages Christopher Columbus’ discovery over 500 years ago that the world is round, at least in a geologic sense.

To be certain, Columbus encountered a world that is quite unlike the one with which we are familiar today, involving complex economic structures, worldwide communication, and transportation systems. But he also experienced, in meeting different native cultures, something that we still recognize. He found that immense wealth and abject poverty coexist and that people everywhere struggle to acquire basic knowledge and skills that will make them competitive and respected partners in free exchange.

Friedman’s flat world thesis is a reminder that new discoveries are based on rediscoveries, as so poignantly captured by T. S. Elliot, who wrote:

> We shall not cease from exploration  
> And the end of all our exploring  
> Will be to arrive where we started  
> And know the place for the first time

T.S. Elliot, *Little Gidding*

We are living at a time of unparalleled opulence that is unique in human history. However, despite the tremendous mobility of financial capital and modest mobility of human capital, globalization has not created a level playing field of equal opportunity. For instance, according to President Carter’s foreign policy advisor Zbigniew Brzezinski, “The economic and military strength of the Atlantic Community makes it the gravitational center of the world affairs. While only 13 percent of the world’s people are in NATO and/or EU nations, together they account for 63 percent of the world GDP, producing over $27 trillion worth of goods and services in 2005, and over 77 percent of global military spending...”

On the other hand, roughly four billion people in the world are hardly touched by these economic forces, subsisting at a standard of living that is medieval by comparison. Almost half of the world’s population is living on $2 per day, over 700 million in the African sub-Sahara live on less than a dollar a day, and 2.4 billion people have no access to adequate food, water and sanitation.

Given these stark differences in standards of living and the growing stratification of wealth, can we honestly claim that we are better off? In the words of President Andrew Jackson, “we can measure the health of a society not by its apex, but by its base.” Moreover, the current pattern of globalization appears to have been spontaneous and is the “result of human action but not of human design.” Therefore, any apparent flattening may be the result of uncoordinated decisions with unintended consequences. If it is the case that globalization is a spontaneous form of order, then the new order that will emerge out of this apparent chaos is still in the making.
My goal in this inaugural message is to affirm our capacity to seize control over these emerging forces of change and transform how we organize and disseminate knowledge by adopting new forms of teaching and learning. Clearly, information technology is changing how we communicate with one another, and we must reposition ourselves to incorporate these new modes of communication in the educational process.

I also believe that student achievement will need to be redefined, in part, to reflect the competencies that will be needed to successfully handle complexity and uncertainty. Far too many children and young adults in the Bay Area who aspire to attend college ever get the chance to do so. We must do everything we can to rectify this situation by providing the resources parents and teachers need to overcome educational and economic disadvantages that prevent many students from getting a college degree and participating in the workforce.

I am also advocating that faculty, staff, and administrators undertake a critical process of reexamination to chart how traditional core values can be enlisted to redefine our future course. I will conclude this address by articulating a way to fuse the traditional university missions of teaching, knowledge, and public service to form learning communities of incalculable power and collaborative impact.

**ACCOMMODATING NEW Modes OF COMMUNICATION**

Higher education is evolving in unexpected ways in response to cultural change and workforce needs, forming a landscape that will require innovative methods of teaching and learning. This will better prepare our students to deal in an economy based on scientific intelligence and technological ingenuity. The world is far from flat, when we consider the daunting challenges involved in accommodating needed change. For example, consider how quickly young adults today employ technology to transform the way that they express themselves and communicate with one another through Web-based devices, such as blogs, MySpace, Facebook, and YouTube. These interpersonal forms of communication that defy convention and appropriation may lend themselves for adaptation to educational purposes. While young people who have grown up with this technology prefer face-to-face social interactions, students clearly welcome the increased use of the Internet and digital devices in the classroom, as well as a means of interpersonal communication.6

Indeed, in economies that place a premium on innovation, there is a strong correlation between economic prosperity, technological literacy, and the knowledge level of the community. According to the Association of American Colleges and Universities (AAC&U) report on *College Learning for the New Global Century*, “In an economy that is dependent on innovation and global savvy, liberal education outcomes have become the keys to economic vitality and individual opportunity.”7 Therefore, to harness the new opportunities of an interconnected and interdependent world, the role of higher education today is more critical than ever before. More specifically, regional universities like California State University, East Bay, where access to quality public education is their hallmark, must take on the role of becoming the “digital equalizer.”

Derek Bok, former Harvard president, contends that our colleges are “underachieving” because more time is spent focusing on *what* to teach than *how* to teach.8 Today students are no longer satisfied with being passive learners. Purely didactic lecture-based instruction falls woefully short of these expectations. University planners...
Today students are no longer satisfied with being passive learners. . . University planners must develop environments that promote more dialogue and interaction for an active community of learners. Therefore, the need for collaboratoria—spaces where students can interact in teams—could easily outweigh traditional classrooms. Students demand network connectivity and service access on 24/7 basis from anywhere. Even now, I wonder how many students who attend college athletic events simultaneously watch instant replays on their PDA and send instant messages and pictures to their friends. Campus planners should design robust infrastructures that can accommodate such multidimensional forms of communication. Cal State East Bay’s recently dedicated Wayne and Gladys Valley Business and Technology Center fulfills the need for student collaboration by providing plentiful space for laboratory and team-based learning.

Our students demand residence halls that foster the creation of learning communities because the boundaries between classrooms and living areas are becoming blurred. Students want facilities that look “cool” in addition to having basic amenities. They expect entertainment venues, more choices and variety in food, and an aesthetically pleasing environment with a plethora of amenities where they can congregate. The future expansion of our Pioneer Heights student housing not only will ease the cost of housing, but also will be an inducement to students and faculty alike to make Cal State East Bay a destination university.

REDEFINING STUDENT ACHIEVEMENT

A fundamental question remains: How do we define student success? While important, academic examinations are but one of many ways to measure what students have learned. What are the competencies that we should expect each student to attain when they graduate? Several skills have been singled out that are worthy of consideration. The AAC&U report states: “The Principles of Excellence call for a far reaching shift in the focus of schooling from accumulating course credits to building real-world capabilities.” At Cal State East Bay, the General Education Clusters are designed to develop these skills. Freshmen may choose from over a dozen clusters of thematically related courses in the natural sciences, arts and humanities, or social sciences that enable them to fulfill basic requirements. Students get the opportunity to work closely together in learning communities, forming lasting friendships involving shared intellectual growth and mutual respect.

Effective Communication
Success in today’s world of telecommunications and the Internet will depend increasingly on the ability to communicate effectively. The capacity to coherently organize and express ideas is crucial to students entering business, government, and the professions. Students who acquire writing skills will be better able to meet the demands of jobs that require reasoning, analysis, and synthesis. Our faculty prepares students to learn how to become effective communicators early on in their academic careers.

Critical Thinking
A successful graduate also is defined by his or her ability to think critically and solve problems. College graduates are now entering working environments that are information-rich and that put a premium on the ability to rapidly analyze and assess the value of that information. They will have to devise solutions to problems that are only loosely structured and not amenable to a single answer. This is precisely the kind of learning environment that our students experience here at Cal State East Bay. Each college offers instruction in classrooms that have multimedia sound, video, and computer connections. These “smart” classrooms and laboratories enable faculty and
students to interact in real-time problem-solving situations using Blackboard and other Internet communication technologies.

**Character**
Increased public attention has been focused on situations involving personal misconduct in business and government. This is a troubling development that universities must address by providing stronger guidance. Students who acquire a strong sense of personal integrity and a clear understanding of the difference between ethical and unethical behavior are likely to deal intelligently and effectively with potential ethical dilemmas involving unprofessional conduct. Our students receive real-world training in professional ethics in Nursing, Teacher Education, Business, and Engineering, among many other fields of study.

**Citizenship**
American citizens are expected to carry out their civic responsibility by taking part in electoral processes. Unfortunately, turnout historically has been lowest among young people between the ages of 18 and 24. There is some limited evidence that students who take basic political science courses are more likely to vote than students who take engineering or business courses. But there are other ways that students can acquire a sense of civic duty through voluntary community service. Service learning is an integral part of nearly every department on our campus. Through service learning our faculty and students have forged partnerships with local schools and community organizations that contribute to the health, education, and welfare of Bay Area citizens.

**Diversity**
The East Bay area is one of the most ethnically and racially diverse regions in the State of California. Our students need to experience in the classroom and in their extracurricular activities the diverse cultures that make this region so vibrant. We need to instill respect for and understanding of individual differences and remove artificial barriers that inhibit interpersonal interaction. Recognizing the need to increase the number of African Americans attending college, Cal State East Bay hosted a series of outreach meetings in 2006 and 2007 to 18 Bay Area African American congregations to advise sixth- through twelfth-grade students and their parents about how to apply for college admission. This “Super Sunday” was a well received and attended event that included the participation of CSU presidents, trustees and Chancellor Charles Reed. Our university also proudly has co-hosted the African-American and Latino Education Summits to increase awareness of and access to educational opportunities at Cal State East Bay.

**Global Competence**
Finally, a college education should emphasize global competence where students become more aware of and actively engaged with the world around them. Zbigniew Brzezinski reports astonishingly that “A study of the National Geographic Society in 2002 found that 85 percent of young Americans could not locate Iraq or Afghanistan on the map, 61 percent could not find Great Britain, and 29 percent could not even point out the Pacific Ocean.” Dealing successfully in a world of unprecedented global interconnectedness and interdependency demands global competence. Our national and regional economic vitality will depend on key ingredients that include: transaction speed and innovation; technological breakthroughs; a talented and flexible workforce; and an increasing tolerance of and capacity to manage ambiguity. We need to prepare students to take risks and pursue their dreams. For as Goethe wrote in *Faust*:

> Until one is committed, there is always hesitancy, the chance to draw back, always ineffectiveness. The moment one commits oneself, then Providence moves too.
Whatever, you can do or dream, you can do, begin it.
Boldness has genius, power, and magic in it!

Demonstrating our commitment to the proposition that global competence is a core value at California State University, East Bay, we are creating the Professor Ranjit Singh Sabharwal Chair in Sikh and Punjabi Studies. This endowed chair—the university’s first—honors the late Emeritus Professor Sabharwal, Professor of Mathematics, and has been funded through the generosity and vision of the Sabharwal family and members of the Sikh community.

**CLOSING THE SOCIAL MOBILITY, WORKFORCE, AND LEARNING GAPS**

The development of human intelligence is the primary means of building social mobility and making participation possible in the new economy at the regional, national, and global level. This was a primary finding of the U.S. Department of Education, which concluded, “Colleges and universities must continue to be the major route for new generations of Americans to achieve social mobility.” This is also consistent with the democratic vision of the role of public education of Thomas Jefferson, who said, “If the condition of man is to be progressively ameliorated, we fondly hope and believe education is to be the chief instrument in effecting it.”

The U.S. Department of Education observed that students still face many barriers to college entry, including lack of information about college opportunities; inadequate preparation; financial constraints; poor alignment between high school and college academic expectations; and, most importantly, tremendous gaps in access for low income and ethnic groups. Consequently, a whole generation of students may be virtually excluded from college attendance and participation in our science and technology-based workforce.

The California Council on Science and Technology, acknowledging the serious economic and demographic consequences of this education and workforce gap, particularly in science and engineering in California, commissioned two recent studies. One study analyzes the critical paths that affect the number of degrees awarded in science and engineering by public universities. The CCST calculated that in 2001, 14,000 jobs in California requiring science and engineering degrees went unfilled. The CCST estimated that the number of science and engineering degrees would need to be increased by 70 percent to make up for this shortfall. More troubling is the fact that of the 7,700 S&T degrees awarded in 2000, only 1.5 percent of these degrees were awarded to Latino students who constituted 43 percent of high school students in California at that time.

The other study examines the factors that affect teacher preparation in the science and mathematics disciplines. The CCST calculated that 10 percent of middle school science and math teachers were unprepared (i.e. lacked a teaching credential) in these subjects. But nearly 30 percent of first- and second-year teachers in these subjects were considered unprepared. The level of unpreparedness among high school science and mathematics teachers was similar at 12 percent and 9 percent, respectively, with 35 percent to 40 percent of new teachers being unprepared. In low-performing school districts, the percentage of unprepared science and mathematics teachers who have taught for more than three years is much higher at 30-40 percent.
Overcoming these barriers to access and increasing teacher competence will require forging closer alliances with business and industry, governments, K-12, and other key stakeholders. California State University, East Bay has undertaken several initiatives involving early assessment, mentoring, community services, and parental support to increase the participation of students who are underrepresented in college and the workforce. For example, in 1999, Cal State East Bay launched project SOAR (Successful Options for Academic Readiness), an ongoing partnership with selected schools in the Oakland Unified School District, among other educational and community partners. SOAR provides continuous academic support and parental programs designed to enable 3,500 7th graders to graduate from high school and become college freshmen. The Summer Bridge program provides students admitted in the fall quarter with tutoring, academic course work, and extracurricular activities designed to ease the transition to full-time enrollment. One other innovative initiative, the Renaissance Scholars Program, provides financial aid and support services for independent living to young adults who are leaving foster care and desire to attend college. Each of these programs is an outstanding example of the effective targeting of resources to flatten barriers to entry for those who seek a college education.

CSUEB also has launched, in partnership with local school districts and community colleges, innovative programs in teacher preparation in science and math and curriculum reform that will increase the number of teachers with college degrees in science, mathematics, and other related fields. For example, the Math and Science Teacher Initiative and Bachelors Plus programs are designed to provide new pathways to a teaching credential that accelerate entry into the teaching profession. CSUEB faculty also are involved in biotechnology and waste management educational programs in K-12. In addition, the East Bay Science Project, a partnership of CSUEB faculty, in-service teachers, and public school administrators, provides rigorous science content aligned with California science standards.

Finally, CSUEB mathematics faculty have teamed up with the Alameda County Office of Education to offer summer workshops to enhance the applied mathematics skills of local school district teachers. The Alameda County Collaborative for Learning and Instruction in Mathematics will be holding a workshop that will coincide with this year’s mid-summer Major League All Star game in San Francisco and will focus on the use of statistics in baseball. A campaign will also be getting underway, following the celebration of the CSUEB’s golden anniversary this year, to increase corporate and foundation support of university-sponsored K-12 programs and partnerships.

THE FUSION OF TRADITION AND TRANSFORMATION

In the past year, I have had the opportunity to interact with our faculty, students, staff, alumni, and community members. I have heard from them numerous stories about the transformative role of the university in their lives, and a very clear picture has emerged. It has strengthened my belief in the indispensable role that the university has played and continues to play in the region we serve and steward, the East Bay.

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Our 21 town hall meetings generated an open process and exchange of ideas, which allowed us to tap into the vast ingenuity and sagacious insights of the university community. The deep commitment of the faculty, students, and staff to elevate the university to new heights was profoundly obvious. The high level of energy and the enthusiastic optimism of the participants were very heartening. Subsequently, we condensed the more than 1,500 comments we received into the following
seven community mandates, forming the framework for a shared vision of the university’s future:

- An efficient, well-run university with a culture of accountability
- Strong growth and full enrollment with personalized learning and expanded access
- A vibrant university village
- An inclusive campus climate that values faculty, staff and students, and fosters multicultural learning experiences
- A tradition of teaching, learning and academic quality emphasized and reinforced
- A quest for distinction realized
- A university of choice through regional stewardship

In early February of this year, we began a strategic planning process in which our planning, budgeting, and assessment will converge. This process will enable the university community to transcend a short-term focus and to examine long-term and systemic impacts of key choices and direction. Cal State East Bay also is a partner in the California State University’s efforts to forge a ten-year strategic plan, Access to Excellence, which is intended to increase student enrollment, enhance student performance, and increase university accountability to various stakeholders. This will allow us to be guided by our imaginations rather than constrained by uncertainty and fear.

Our process of transformation must begin by examining the way universities operate. Nearly a century ago, German sociologist Max Weber, an astute observer of modern bureaucracy, showed how complex organizations, such as universities, become dependent on hierarchy and develop a short-term focus. This hinders their ability to anticipate long-term and systemic impacts of a chosen direction. Universities that are event-based and reactive are unable to confront a turbulent environment and accommodate the need for rapid and continual change. By contrast, universities that are time-based are better able to seize the initiative and decisively take control over events. Universities need to become ambidextrous, whereby they are capable of combining incremental and strategic perspectives that increase flexibility and agility.

In the words of one of my colleagues, a university president must respect, celebrate, and protect the covenant of institutional tradition, while at the same time provide effective leadership to bring about institutional transformation. My 28 years of service in higher education have been instrumental in impelling me to embrace and deeply believe in the core values of American Education and academic culture, which is based on shared governance, collaboration, and collegiality. I believe a university president should not only learn the codified rules, but also be very cognizant of latent knowledge and be willing to forge strategic alliances with students, faculty, staff, community, and other key constituencies in making decisions to effect institutional transformation.

In order to comprehend this latent knowledge, the top layers of the institutional culture—stories, myths, mission statements, rituals and word marks—should be rendered explicit. The inner layers of academic culture, consisting of underlying assumptions and strongly held beliefs that are deeply ingrained and rarely questioned, also need to be examined. Organizational transformation requires calling some unfounded beliefs into question by providing evidence that problems assumed to be unsolvable can be surmounted and by showing that goals considered unattainable can be achieved. For universities, such an analysis is more critical than for other entities, since universities are run by tradition rather than rules and regulations. Rules can be
easily amended, while tradition is a delicate yet a more potent force that is organically integrated in the organizational fabric in non-obvious ways. Nevertheless, tradition and transformation must go hand in hand as the university charts its future course.

THE FUSION OF LEARNING, KNOWLEDGE, AND SERVICE

David C. Hodge, president of Miami University of Ohio, called for the “fusion of learning.” Let me explain why I think that this is an appropriate metaphor to describe the opportunity we have to transform Cal State East Bay. From the perspective of one of my prior backgrounds as a nuclear engineer, I found this concept to be intriguing. A fusion reaction is the formation of light nuclei into a larger and more complex nucleus, releasing a huge amount of energy. Traditionally, universities have viewed their mission in terms of a tripartite role, namely teaching and dissemination of knowledge, research and scholarship, and public service. In reality, every university struggles to strike a balance between these sometimes competing goals. However, universities that seek to confront the forces of change could reap significant creative energy derived from the fusion of these three elements of the traditional university mission, creating a synergy of untold power and dynamism.

The era when education takes place behind ivy-clad walls involving only episodic contact with the larger community is rapidly coming to an end. Today’s institutions of higher education are embedded in communities at large. “Communiversities” are more interdependent than ever to address social, economic and educational problems that none can solve alone. New knowledge is essential and research must inform teaching but its value depends on whether it is exchangeable and transferable from one domain to another. The flow of knowledge is just as important as the flow of capital.

I believe that the fusion of teaching, knowledge, and public service that I am proposing will enable us to transform today’s learning communities into learning ideagoras. In ancient Greece, agoras were public commercial centers where citizens assembled to debate and barter. The term “ideogora” was first introduced by Don Tapscott and Anthony Williams as a marketplace for new ideas and mass collaboration coming from outside an organization. Modern day agoras, in the cyberspace, enable buyers and sellers to freely negotiate and assign value to goods. Ideagoras consist of open markets for the exchange of ideas where new knowledge is produced in a collaborative, distributed, and open fashion. Universities, businesses, and communities can leverage through ideagoras a large pool of ideas and innovations that exceeds what they could marshal by acting alone. Through these mechanisms of mass collaboration, the outcomes of countless experiences can be accumulated and shared at an accelerated speed. This will enable, for example, educators and local school officials to pinpoint more precisely where and when to intervene in the critical pathways contributing to successful student educational outcomes.

An ideogora at Cal State East Bay is already taking shape for the fall quarter. The General Studies Program has earmarked funds from the Freshman Year Experience to support a project designed by freshman honors students to nurture the CSUEB community. They will use a Web-based forum to create an ideogora that will take the form of an extended problem-solving conversation focusing on health and the environment. They will invite campus-wide participation, formulate questions, identify problems, and propose pilot projects to solve them. I believe that this will be an effective way to engage students in the discussion of issues that ultimately affect the quality of their education and their ability to succeed as students.

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I believe that this blueprint for transformation... can lead to the creation of a flat world involving the free exchange of ideas, knowledge and experience. This new landscape will be sustained by the fusion of intellectual energy, cultural environment, and economy. Its value will be measured by how many children who have little hope for the future can draw on the support of educational institutions, businesses, and communities to... become productive members of the workforce.

CONCLUSION

According to the AAC&U report, “In the twenty-first century, the world itself is setting very high expectations for knowledge and skills. In this context, educators and employers have begun to reach similar conclusions—an emerging consensus—about the kinds of learning Americans need from college.”

I believe that this blueprint for transformation, which I have described only briefly here, can lead to the creation of a flat world involving the free exchange of ideas, knowledge and experience with extraordinary value to the university, the surrounding region, and beyond. This new landscape will be sustained by the fusion of intellectual energy, cultural environment, and economy. Its value will be measured by how many children who have little hope for the future can draw on the support of educational institutions, businesses, and communities to achieve success and become productive members of the workforce.

Helen Keller experienced hopelessness when she lost her ability to see and hear, until she became determined to learn how to communicate. Her determination paid off, and she eventually attended Radcliffe College. Just before graduating in 1904, she was quoted as saying something that, I believe, epitomizes the value that higher education adds to those who seek to learn:

“College has breathed new life into my mind and given me new views of things, a perception of new truths and of new aspects of old ones.”

The three decades that I have lived in the U.S. have strengthened my deeply held belief that this great nation of ours is truly a land of tremendous opportunity. Where else in the world can an immigrant and the son of a carpenter from a war-stricken third world country like Afghanistan realize his dream and become the president of a great university. This strengthens my belief that education truly is the means for flattening the world. The boundless opportunities that are created by education can only be limited by our imagination. That is why I have an incandescent passion for education as a bona fide liberating force for all humankind.

When Assemblyman Carlos Bee persuaded Governor Goodwin Knight to sign the legislation in 1957 authorizing the creation of a new college, the driving vision was to serve the rapidly changing higher education needs of an emerging new region, the East Bay. Sites were proposed in Pleasanton and Union City in 1959 that received strong support. It was only through E. Guy Warren’s tireless efforts to demonstrate that this was the site destined for a great new university, was Hayward able to prevail. Since then, we have worked tirelessly to serve the community, just as we have extended our reach and expanded our horizons to serve students throughout a growing region with new locations in Concord and Oakland as well.

We need to once again tap the pioneer spirit that led our visionary founders to create this great university five decades ago. This happened at a crucial time when the Russian Sputnik challenged the U.S. to mobilize the talents and energy of its universities to regain world leadership in science and technology. Can we rise to the challenge? The answer can be found in the Latin phrase “alis grave nil”—

Nothing is heavy for those who have wings.
FOOTNOTES

1. The speech presented by Mohammad H. Qayoumi at his inauguration as the fourth president of California State University, East Bay, on June 1, 2007 is based on this message.


5. Ibid., p. 69.


9. Ibid.


17. *Critical Path Analysis of California’s Science and Mathematics Teacher Preparation System.* (California Council on Science and Technology and the Center for the Future of Teaching and Learning, Sacramento, California, 2007), p. 3.


Mohammad Humayon Qayoumi assumed the presidency of California State University, East Bay on July 1, 2006. He came to Cal State East Bay from Cal State Northridge, where he served as vice president for Administration and Finance and chief financial officer since 2000. He also was a tenured professor of engineering management at Cal State Northridge.

Prior to that, Dr. Qayoumi was vice chancellor for administrative services and adjunct professor at the University of Missouri-Rolla from 1995 to 2000. He also was associate vice president for administration and an adjunct professor at San Jose State University from 1986 to 1995.

Dr. Qayoumi has a B.S. degree in electrical engineering from American University of Beirut. He also has M.S. degrees in nuclear engineering, electrical and computer engineering, as well as an M.B.A. in finance and a Ph.D. in electrical engineering from the University of Cincinnati.

Dr. Qayoumi is a licensed engineer and a certified management accountant. He has more than 31 years of experience in the service of higher education and industry.

When he came to the United States in 1978, Dr. Qayoumi was first employed as staff engineer (1979-82) at the University of Cincinnati, where he also held positions as director of technical services (1982-83), director of utilities and engineering services and adjunct professor (1983-86). Prior to coming to the U.S., Dr. Qayoumi was employed as a communications engineer in Riyadh, Saudi Arabia from 1975 to 1977 and as a project electrical engineer in Abu Dhabi, United Arab Emirates.

President Qayoumi has published eight books, more than 85 articles, and several chapters in various books. He has made presentations at numerous conferences across the United States and in 10 other countries on various topics ranging from quality and energy to systems theory.

Dr. Qayoumi is a senior member of the Institute of Electrical and Electronic Engineers (IEEE) and has served as a Malcolm Baldrige National Quality Award examiner and senior examiner from 2000 to 2003. He also was senior examiner for the Missouri Quality Program from 1997 to 2000.

Dr. Qayoumi has served his native country in various financial capacities. He was the senior advisor to the minister of finance of Afghanistan from 2002 to 2005 and remains on several boards of directors, including that of the Central Bank of Afghanistan.

Dr. Qayoumi has been married for 28 years to Najia Karim.