Portland State University

PDXScholar

Public Administration Faculty Publications and Presentations

Public Administration

2009

Community-Engaged Scholarship in Higher Education: An Expanding Experience

Judith A. Ramaley
Portland State University

Follow this and additional works at: https://pdxscholar.library.pdx.edu/pubadmin_fac

Part of the Civic and Community Engagement Commons, Community-Based Learning Commons, Higher Education Commons, Higher Education Administration Commons, and the Other Educational Administration and Supervision Commons

Let us know how access to this document benefits you.

Citation Details

Ramaley, J.A. (2009) Community-Engaged Scholarship in Higher Education: An Expanding Experience. Metropolitan Universities Journal 20(2) 139-153.

This Article is brought to you for free and open access. It has been accepted for inclusion in Public Administration Faculty Publications and Presentations by an authorized administrator of PDXScholar. Please contact us if we can make this document more accessible: pdxscholar@pdx.edu.

Community-Engaged Scholarship in Higher Education: An Expanding Experience

Judith A. Ramaley

Abstract

Higher education in this country has always been expected to serve the public good. Sometimes, the emphasis is on preparing educated citizens or practitioners in especially critical fields and how public service can deepen and enrich learning and prepare students to lead purposeful, responsible, and creative lives. Sometimes the focus is upon institutions themselves as major intellectual and cultural resources for a community. In this paper, based on the keynote presentation at the Community-Engaged Scholarship for Health Collaborative's invitational symposium, the author explores four levels of engagement: the individual, the academic community and its concepts of scholarship, the institution and its relationships with its immediate community, and the role of higher education within a large network of interactions that define a region of innovation.

To follow the progression of the engagement agenda, one need only examine the list of conferences on community service and engagement that have been held at Wingspread over the past twenty years. The first conference, held in 1988, studied Community Service and America's University Students. By 1991, the topic had shifted to Improving Student Learning and Teacher Preparation through Community Service. Shortly thereafter, in 1993, Wingspread began to address the critical question of how to measure and evaluate work conducted in a community-based mode. In 2004, people gathered at Wingspread to bring the whole thing together into the Higher Education Network for Community Engagement. In 2006, community partners involved in community-higher education partnerships convened to explore how their experiences and perspectives could be mobilized to ensure that the wisdom and resources of communities could be appropriately incorporated into engagement work (Community-Campus Partnerships for Health 2007).

In this paper I will explore engagement at four orders of magnitude—the individual, the academic community and its concepts of scholarship, the institution and its relationships with its immediate community, and the role of higher education within a large network of interactions that define a region of innovation.

Scale of Engagement

Individual experiences. Twenty years ago, some critics of higher education thought that college students were pampered, selfish people who cared more about their trips to the beach during spring break than they did about learning. Out of such concerns, Campus Compact was born. Its initial focus was to ensure that students were offered many opportunities to engage in community and volunteer service and to learn the habits of active citizenship and social responsibility. It did not take very long for many of us to realize that these experiences could become powerful occasions for learning, if examined thoughtfully. This led to the next phase of engagement, the drawing of real-life experiences into the curriculum and their use in accomplishing clear educational goals.

Engaged Learning. In 2002, the Greater Expectations panel issued a report calling for a fresh approach to liberal education that would produce graduates prepared for life and work in the twenty-first century who are "intentional about the process of acquiring learning, empowered by the mastery of intellectual and practical skills, informed by knowledge from various disciplines, and responsible for their actions and those of society" (Huber and Hutchings 2005). Integrated learning requires an environment in which students can bring together their formal studies and their life experiences; explore and understand the worldviews of different fields; learn how to examine a complex issue from multiple perspectives; and bridge the often daunting gaps between theory and practice, contemplation and action.

The Association of American Colleges and Universities and the Carnegie Foundation for the Advancement of Teaching expressed it, thusly, in their joint statement on Integrative Learning (Huber and Hutchings 2005):

Integrative learning comes in many varieties: connecting skills and knowledge from multiple sources and experiences; applying theory to practice in various settings utilizing diverse and even contradictory points of view; and, understanding issues and positions contextually.

This approach changes the working relationships of the disciplines within an institution. There also must be a significant change in how campuses interact with the communities around them and with other knowledge-based organizations like K-12, social service agencies, business alliances, and other collections of knowledgeable people who depend upon accurate and timely information to do their work. A college or university that can create an environment where this form of integration can occur can be called truly engaged. In such a setting, the gaps that limit new working relationships between the professions and the liberal arts, general education and the indepth study of the major, formal study and daily life, academic affairs and student affairs, research and teaching can be closed. Engagement is a natural and powerful vehicle for doing this.

I plan to argue that all of our students must integrate the insights and perspectives of the disciplines in order to foster their growing understanding of the world, and then they must apply that growing understanding to a series of issues of increasing complexity and importance, some of which, at least, are posed by the challenges of daily life in the communities around them as well as the challenges they experience at the frontiers of the respective disciplines where knowledge is being generated right in front of them. A good place to work out these connections and to design the continuum of experiences that can draw our students toward greater sophistication, purpose, and capability is in the kinds of community-based learning or service-learning that we have been exploring across this nation since the idea first surfaced on the Wingspread Conference agenda in the late 1980s. Engaged learning can make the creation and application of knowledge both visible and compelling, and, at the same time, these experiences can be put to good use as students make the challenging transition from the more intentional and predictable environment of a college campus to the complex and ever-changing world beyond.

Engaged Scholarship. For as long as most of us can remember, for purposes of evaluating the work of faculty, the intellectual work of the academy has been artificially separated into research, teaching, and service. Seen through the research lens, we are examining a form of scholarship, and its practitioners can be called public intellectuals or public scholars. Seen through the teaching lens, we are discussing an approach to the curriculum and to our expectations for our students as well as for ourselves as their mentors. Seen through the service lens, we are changing the dimensions of application of research to community problems from an outreach model of service delivery in which experts apply well-researched answers to clearly characterized problems to a collaborative model in which adaptive responses are being developed in a collaborative mode to often contested and poorly defined problems (the "swampy lowlands" of David Schoen) (Schoen 1997).

It has become increasingly clear that the dissection of the process of observation, action, and reflection into three separate facets of a scholarly life, either for faculty members or for students, is much too restrictive. A milestone conception along the pathway toward an integration of these aspects of scholarship was the work of Ernest Boyer. In 1990, Boyer proposed a grand synthesis in his monograph *Scholarship Reconsidered: Priorities of the Professoriate*. He began by "looking at the way the work of the academy has changed throughout the years—moving from teaching, to service, and then research, reflecting the shifting priorities both within the academy and beyond (Boyer 1990). Examining the changing context within which higher education operates, Boyer concluded that "at no time in our history has the need been greater for connecting the work of the academy to the social and environmental challenges beyond the campus" (Boyer 1990). He then wrote an entire monograph addressing his core theme: "The most important obligation now confronting the nation's colleges and universities is to break out of the old tired teaching versus research debate, and define, in creative ways, what it means to be a scholar" (Boyer 1990).

Since the work of the Kellogg Commission, some observers have begun to think both about the large domain encompassed by a scholarly agenda and the way in which both research (defined broadly as discovery, integration, interpretation, and application) and teaching (also defined broadly as an approach to the collective enterprise called "the curriculum") can be approached in an engaged manner and, thus, can become public scholarship (Ramaley 2005.)

There are many motivations for considering public scholarship as legitimate work for both faculty and students. At one level, it offers a way for scholars as well as students to integrate their scholarly interests and their personal experiences and motivations. As David Cooper expresses it, "Could I bring my 'whole self' to a vocation in higher education? Could I practice a scholarship that nourished an active inner life, while forging strong and meaningful links to the public sphere? What would scholarship, teaching, and service look like if they supported both personal wholeness and the fulfillments of an engaged public life?" (Cooper 2002). For this kind of authenticity to be possible, the entire scholarly and learning environment must expand and open up. This idea leads us to a consideration of engaged institutions.

Engaged institutions. At the beginning, engagement referred primarily to individual experiences—how students learn and how faculty choose the questions they wish to pursue in their research. As engagement spreads from individual experiences to shared experiences within departments and across disciplines, scholarship itself begins to change. The traditional distinctions of teaching, research, and service begin to blur and research ceases to be the exclusive purview of faculty and their most advanced students. As engagement progresses, the distinctions articulated by Boyer (1990)—discovery, integration, application, and the scholarship of teaching—cease to matter as much. Discovery and application can occur together in what Donald Stokes (1997) calls Pasteur's Quadrant, where theoretical advances and practical utility combine. The scholarship of teaching blends with discovery and all forms of scholarship can occur in a complex cycle of innovation that draws upon observation and experience to challenge theory and that applies theory to the understanding of experience (Ramaley, Olds, and Earle 2005). Universities and colleges are in an especially good position to be the locus of work of this kind and can, by doing so, accomplish their public responsibilities as stewards of public resources and contributors to community development.

As the different forms of scholarly activity come together in an engagement model, we must find a new vocabulary to describe what we are doing. There is no need to retain the term service in our lexicon. Now research is often *engaged research* and teaching and learning are becoming *engaged learning*. More commonly, engaged research takes place as an integration of theory and practice with utility being one intended outcome and advancement of our fundamental knowledge being the other outcome. Active or hands-on learning can take place in a campus setting or off campus. In either environment, learning has meaningful consequences that can influence the thinking and the lives of others. Recent research shows clearly that this kind of learning fosters deeper, more lasting insights and promotes greater confidence and competence (Bransford, Brown, and Cocking 1999; Pascarella and Terenzini 2005).

The engaged institution, which today takes many forms ranging from state and land-grant universities to regional comprehensive institutions, urban universities, community colleges and liberal arts colleges, is committed to direct interaction with external constituencies and communities through mutually-beneficial exchange, exploration, and application of knowledge, expertise, resources, and information. These interactions enrich and expand the learning and discovery functions of the academic institution while also enhancing community capacity. The work of the engaged institution is responsive to (and respectful of) community-identified needs, opportunities, and goals in ways that are appropriate to the campus' mission and academic strengths.

Unless the institution as a whole embraces the value and validity of engagement as legitimate scholarly work and provides both moral support and concrete resources to sustain it, engagement will remain individually defined and sporadic. Such limited interventions cannot influence larger systems on a scale necessary to address community issues. Significant change to incorporate a strong community base for research and education requires (1) the possibility of reward or benefit for faculty and staff; (2) individual influence and inspired leadership throughout the institution, not just at the top; (3) an institution that is responsive to the needs of the community it serves; (4) educational planning and purposefulness that recognizes the value of active and responsible community service that has a real community impact; (5) a willingness to adopt a shared agenda and a shared resource base over which the institution has only partial control; and finally, (6) the capacity to change (Ramaley 2006.)

Regardless of local circumstances and institutional traditions and history, there are a few conditions that must be in place for a community-based strategy to work. First, community-based work must be valued as a meaningful educational experience and a legitimate mode of scholarly work.

Second, the evaluation of faculty and student work must include rigorous measures of the quality and impact of community-based scholarship, and professional service must be recognized as a component of staff work as well.

Third, mediating structures must be provided to help faculty and students identify community-based learning and research opportunities, and technical support must be available to help faculty and students use these opportunities and assess the results of such programs, both from their own point of view and from the perspectives of the community and its priorities and experiences. Finally, opportunities must be provided for faculty, staff, and students to develop the skills to participate in research and curricular programs in a collaborative mode with partners from different academic disciplines and with significant community involvement.

Engagement on a Larger Scale: Regions of Innovation. The nature of innovation is changing as business, technology, and society increasingly intersect and influence each other. These changes have important implications for higher education—how we are organized, with whom we collaborate, how we prepare our students for life and work

in the twenty-first century, how we interact with other educators in K-12, how we interact with employers who are investing in further education for their workforce, and how we generate and use our intellectual assets and expertise. These new forms of interactions and new opportunities for collaboration are changing some of the fundamental concepts that have driven our approach to education, knowledge transfer, and the management of human capital, intellectual capital, and social capital.

In 2006, IBM Corporation brought together 248 thought leaders from nearly three dozen countries and regions representing 178 organizations on four continents and asked them to explore the evolving nature of innovation. The first conversation conducted in 2004, concluded that innovation is increasingly global, multidisciplinary, collaborative, and open.

- Global: New ideas are driven by interactions made possible by networked technology and open standards that are removing geographic barriers and moving the economy from a reliance on natural resources to people resources. In this environment, people can work together across both time and space, but location still matters because the quality of life in a particular region affects who will choose to live there. No longer, however, are the options open to a particular geographic area bounded by or limited by the people and ideas and natural resources found there.
- Multidisciplinary: A number of years ago, Michael Gibbons developed the idea of "transdisciplinary" to describe the remarkable changes that are taking place in how and where knowledge is generated and how and where it is put to use. The GIO (Global Innovation Outlook) conception is very closely related to the concept of transdisciplinary; it is based on the observation that the challenges and opportunities we now experience are complex. If we are to respond to them in an innovative way, we need a "diverse mix of talent and expertise" (IBM 2006).
- Collaborative and Open: GIO 2.0 argues that increasingly "innovation results from people working together in new and integrated ways" (IBM 2006). This is occurring both within our more traditionally organized enterprises, both public and for-profit, and in modes that bring shifting networks of people and organizations together shaped by common interests rather than by unique institutional affiliations or identities. In these environments, we need new definitions of such classic concepts as enterprise, intellectual property, risk and benefit, trust and responsibility and brand.

The second set of GIO interactions in 2006 (IBM 2006) took these ideas and applied them to three different contexts: the future of the enterprise, transportation, and the environment. Changes in the very nature of business and how it develops will have significant implications for how we organize and operate our institutions both public and private, how the field of competition changes, what individual and collective behaviors will be rewarded, and how the workings of industry will be judged in the broader context of the social and environmental impacts of their operations.

Given the context in which many of the participants at this conference live and work, you will all quickly see how closely this resembles the profound changes that are

taking place in the organization and delivery of health care and the role of health care organizations in their communities and their regions. Even the concept of community health itself is changing from a network of providers charged with promoting health and access to care, to a community-wide collaboration that is growing into a parallel to the same concepts of engagement that we have been exploring in higher education for over a decade. That topic alone is worth a lengthy address in its own right. My own university, Winona State University, is the host and coordinator of a rapidly evolving network of colleges, industry partners, and health policymakers that is changing the very way we prepare new health care professionals and assist our health care providers in restructuring their workforce, their approach to practice, and their community relationships in order to deliver high quality care to a changing population. From my perspective, I see all the levels of engagement in this emerging model, called the Center of Excellence in Health Science Education and practice (CIHSELP).

GIO 2.0 offers some tantalizing glimpses of a new reality that will be earthshaking. While the focus of the most recent economic development strategies, including the current NGA Innovation America Task Force, is on *regional innovation*, it is helpful to think about engagement in the broader context of how regions will interact with each other and what will, in fact, confer competitive advantage. Before examining how regions might fit together, we must look first at what we mean by a region of innovation.

What is a region of innovation and what infrastructure creates and sustains it?: starting assumptions

The assumptions set forth in the next section come from various readings, but primarily the following three works: "Awake at the Wheel: Moving Beyond Change Management to Conscious Change Leadership" (Anderson and Anderson 2001), the prospectus for Innovation America (Napolitano 2006), and Tough Choices or Tough Times: The Report of the New Commission on the Skills of the American Workforce (National Center on Education and the Economy 2007).

In today's economy, competition between nations is less relevant than competition between regions of innovation made possible within "creative centers." A region of innovation (this idea of a region of innovation comes from the Innovation America prospectus) has "groups of high wage, rapidly growing businesses that are closely linked through collaboration, research efforts, common products and services" (Napolitano 2006); that is, a region of innovation is shaped by clusters of related companies that create a local high-skilled labor pool, that attracts new talent to the region, and retains local talent.

To set up conditions that support the emergence of a region of innovation, a community must become a creative center and an attractive place to live. *Creative centers* are characterized as healthy, diverse, and sustainable communities that offer historical context, engaging physical and cultural environments, opportunities for exchange and exploration across diverse perspectives, and deep understanding and appreciation of human diversity (Florida 2002).

To create regions like this, state policy and programs must support conditions that generate creative centers around which a region of innovation can form and grow. State policy also must address the realities of a twenty-first century education—the science, technology, engineering and mathematics (STEM) knowledge that can support this new growth strategy as well as the skill sets that promote creativity, innovation, and the transfer of knowledge into the process of innovation and solution funding. Unlike entrepreneurship which tends to involve individuals with creative ideas or particular working models that link a college or university to a particular company or agency, the concept of regional innovation requires a larger collaborative environment and new kinds of working relationships to facilitate the generation of knowledge and its effective use both in education and in regional advancement.

Our international counterparts are getting more education and are, on average, becoming better educated than the average American (National Center on Education and the Economy 2007). In this country we still have an unacceptably low percentage of our youth who take sufficient mathematics and enough advanced coursework in critical areas in high school, especially science and mathematics, to be well prepared for college-level work. Minnesota young people also demonstrate a low level of interest in science and engineering (according to a recent survey by the Minnesota Department of Education) (Seagren 2007).

Meanwhile, the structure of the world economy continues to evolve. Many previously well-paying middle class jobs contain significant components of work that can be modeled in an expert system and, thus, automated. It is becoming much less expensive and, therefore, more attractive to automate those functions that used to be performed by people, changing what we mean by basic and advanced skills (Murnane and Levy 1996). To compete in this climate, "producing the most important new products and services depends on maintaining the worldwide technological lead, year in and year out, in existing industries and in the new industries that new technologies generate. But that kind of leadership does not depend upon technology alone. It depends on a deep vein of creativity that is constantly renewing itself" (National Center on Education and the Economy 2007).

High levels of education will be the only real personal security there is in this new economy. It can be argued that such an education requires that students apply what they are learning in real world settings and that they explore their learning in ways that have personal meaning to them. According to the recent report by the National Center on Education and the Economy, "the core problem is that our education and training systems were built for another era, an era in which most workers needed only a rudimentary education." A twenty-first century education must prepare all of our students to be creative, innovative solution-finders who can deal with problems they have never seen before while working with people they have never met before, many of whom are very different in values, culture, experience, and expertise, while the problem itself continues to change as they work on it. They also must be able to find and effectively use resources that are available to them in their communities. This cannot be modeled easily in a classroom.

To create regions of innovation, we need to link our educational systems (both K-12 and postsecondary) to resources in the community to address both workforce development and economic and community development. This will open up an avenue to design new approaches to collaboration and partnership that create the capacity to innovate in all of these related systems and thus to create new approaches to education, workforce development, environmental sustainability, and diversification and growth of our economy. These new working relationships can create a vital and innovative infrastructure for regional development.

It is this convergence of a new global, multidisciplinary, collaborative, and open business environment with the concepts of regional innovation that will create the conditions for the tipping point to take place in our approach to engagement. The pivotal change required to make a regional innovation strategy work is to have well-placed, distinctive colleges and universities that work well together and that are equipped and able to engage in meaningful, sustainable, and effective collaborations across all sectors.

As we enter a new century, we can discern the outlines of a new approach to regional development elicited by the increasingly multidimensional and interrelated challenges facing communities and regions. Collaborations and long-term partnerships are especially appropriate as a means for addressing the reform of large-scale systems such as education, health care, public safety, economic development and job creation, corrections, and social services or workforce development that face communities today. At the same time, the experiences of partnership nurture core democratic skills. There are a number of lessons to be drawn from the partnerships that have been formed in recent years. At its best, any partnership, regardless of the reasons for its existence, is at heart a learning collaborative or learning community that behaves in the ways that any learning organization behaves. Like any such entity, a good partnership

- promotes a discipline of reflection (using real information rather than perceptions),
- encourages new patterns of conversation that bring university and community participants together in new ways,
- permits a community to accept a manageable amount of risk and a commitment to experimentation,
- creates new information and new patterns of information flow.

Each partnership has unique elements shaped by the history, capacity, cultures, missions, expectations, and challenges faced by each participating group or organization. What must remain as a constant, however, is that any partnership must be based on the academic strengths, educational philosophy, and institutional goals of the university. The other constant feature must be the fact that the needs and capacities of the community must define the approach that the university should take in forming a partnership.

There is no such thing as a universal "community." It takes time to understand what elements make up a particular community and how people experience membership in the community. It is not easy to define who can speak for the community just as the

university itself is not monolithic. Often partnerships are fragmented by competing interests in the community itself.

A good collaboration will continue to evolve as a result of mutual learning. To be successful, a collaboration should be built on new patterns of information gathering, communication, and reflection that allow all parties to participate in decision-making and learning. This requires time and face-to-face interactions. The early rush of enthusiasm can be replaced by fatigue and burn out unless the collaboration begins early on to identify and recruit additional talent to the project or the collaboration and makes room for the encouragement and refreshment that comes from continuous learning that is purposeful and useful to everyone involved. This is true both within the university community where a few dedicated faculty cannot be expected to carry the entire engagement and civic responsibility agenda and within the broader community where a small number of community leaders and volunteers cannot be expected to handle a sustained effort over time. Both the university and its partners need to find ways to involve a truly representative cross-section of the talent in the community. Like any other important effort, community partnerships must be accompanied by a strong commitment to a "culture of evidence." It is important to keep a running assessment of how well the partnership is working from the point of view of all participants.

An Engaged Network. The concept of engagement has spread into an international community. Explorations of the role of engagement in nation-building flourish from Europe to the Pacific Rim and Australia. The universities of the world are gathering themselves to help stabilize the world order, preserve the peace and act as stewards of an endangered environment while continuing to offer a pathway to opportunity and accomplishment for increasing numbers of the world's people.

To see these movements in perspective, we need only read the Presidents Declaration on the Civic Responsibility of Higher Education, prepared in 1999, or the Talloires Declaration on the Civic Roles and Social Responsibilities of Higher Education, prepared in 2005 by an international group of chancellors, presidents, and rectors. The Campus Compact declaration articulates the commitment of all sectors of postsecondary education in this country to the re-examination of our public purposes and our commitment to the democratic ideal. In the Talloires Declaration (2005), an international community embraced the idea that higher education institutions exist to serve and strengthen the society of which we are a part. In a global community, that statement increasingly calls us to work together since we now share the world in new and powerful ways and the actions of one of us can alter the choices of the rest.

The Future. In my opinion, the experience of engagement will become the pathway to a fresh interpretation of the role of higher education in the twenty-first century. This conception rests on a rethinking of the core of the academy—namely, the nature of scholarship itself and our expectations for the undergraduate experience. The goal of engaged scholarship is not to define and serve the public good directly on behalf of society, but to create conditions for the public good to be interpreted and pursued in a collaborative mode with the community. In contemporary society, the exercise of

citizenship requires constant learning and the thoughtful and ethical application of knowledge. By including our students in engaged scholarship, we introduce them to basic concepts and, at the same time, offer them a chance to explore the application and consequences of ideas in the company of mature scholars and practitioners. By drawing inspiration from our community connections, we enrich our own lives as scholars and teachers and together ensure that society will have the knowledge and insights that it will need to remain healthy and competitive in a changing world order. By joining with other engaged colleges and universities around the world, we enrich our own lives and help to shape the emerging world order.

The challenge of engagement is really to bring life and work together—in the lives of our students and faculty, in the collective work of our institutions, and in our working relationships with the broader community. All of our discussions about the conditions required for engagement have at their heart the challenge of achieving coherence and integrity—to allow personal meaning and intellectual work to come together for us, for our disciplines, for our departments, and for our institutions.

True engagement offers the opportunity to experience learning in the company of others in a situation where learning has consequences and where individuals are respected and given voice. It is in this process of mutual inquiry where contributions can be made to the public good while, at the same time, advancing the personal and private interests of the participants. It is this blending of the personal and the public that will help us resolve the tensions that now exist between the expectations of society and its elected representatives on the one hand and on the other hand the appropriate roles and responsibilities of higher education in contemporary society.

In an engaged institution, an ideal education lies between the two poles of experience and purpose, thought and action, self-realization and social responsibility. An education is meaningful when it liberates the spirit and feeds the soul and, at the same time, prepares us to make good decisions, contribute to public life, and live as responsible citizens of our democracy. To foster a society in which learning has consequences, our colleges and universities must direct themselves to bringing public purposes and private benefits together. Public good and private benefit cannot and must not remain as competing alternatives. Individual aspirations and personal goals can be most productively advanced when research and education are inspired by *both* a thirst for knowledge and a desire for practical outcomes. In my opinion, we are indeed approaching a tipping point where the expectations of policymakers, business leaders, and community members will create conditions that advance the value and practicality of pursuing engaged scholarship and education.

Acknowledgments

This paper is based on a keynote presentation at the invitational symposium, "Community-Engaged Scholarship in Higher Education: Have We Reached a Tipping Point?" held on February 22, 2007 in Washington DC. The symposium was sponsored by the Community-Engaged Scholarship for Health Collaborative of Community-

Campus Partnerships for Health, with funding from the Fund for the Improvement in Postsecondary Education in the U.S. Department of Education. Additional information about the Collaborative and the symposium can be found on the Community-Campus Partnerships for Health Web site at www.ccph.info.

References

Anderson, L. A., and D. Anderson. 2001. Awake at the wheel: Moving beyond change management to conscious change leadership. *OD Practitioner* 33 (2): 40-48.

Boyer, E. L. 1990. Scholarship reconsidered: Priorities of the professoriate. Princeton, NJ: The Carnegie Foundation for the Advancement of Teaching.

Bransford, J. D., A. L. Brown, and R. R. Cocking, eds. 1999. How people learn: Brain, mind, experience, and school. Washington, DC: National Academy Press.

Community-Campus Partnerships for Health. 2007. Achieving the promise of authentic community-higher education partnerships: Community partners speak out! Seattle, WA: Community-Campus Partnerships for Health. www.ccph.info (accessed March 9, 2009).

Cooper, D. D. 2002. Bus rides and forks in the road: The making of a public scholar. In *Higher education exchange*, eds. D. W. Brown and D. Witte, 24-48. Dayton, OH: Kettering Foundation.

Florida, R. 2002. The rise of the creative class...and how it's transforming work, leisure, community, and everyday life. New York: Basic Books.

Glassick, C. E., M. T. Huber, and G. I. Maeroff. 1997. Scholarship assessed: Evaluation of the professoriate. Carnegie Foundation for the Advancement of Teaching. San Francisco, CA: Jossey-Bass Publishers.

Greater Expectations National Panel. 2002. Greater expectations: A new vision for learning as a nation goes to college. Washington, DC: Association of American Colleges and Universities.

Huber, M. T., and P. Hutchings. 2005. *Integrative learning: Mapping the terrain*. Washington, DC: Association of American Colleges and Universities.

IBM. See International Business Machines Corporation.

International Business Machines Corporation. 2006. Global innovation outlook (GIO) 2.0. Armonk, NY: International Business Machines Corporation.

Kellogg Commission on the Future of State and Land-Grant Universities. 1999. Returning to our roots: The engaged institution. Third report. Washington, DC: National Association of State Universities and Land-Grant Colleges.

Murnane, R. J., and F. Levy. 1996. Teaching the new basic skill: Principles for educating children to thrive in a changing economy. New York: Free Press.

Napolitano, J. 2006. Innovation America. Presentation given at the 98th National Governor's Association Annual Meeting, Charleston, South Carolina.

National Center on Education and the Economy. 2007. Tough choices or tough times: The report of the New Commission on the Skills of the American Workforce. San Francisco: Jossey-Bass.

Pascarella, E. T., and P. T. Terenzini. 2005. How college affects students: A third decade of research. Volume 2. San Francisco: Jossey Bass.

Presidents' declaration on the civic responsibility of higher education. 2000. Providence, RI: Campus Compact. http://www.compact.org/resources/downloads/Declaration_2005.pdf (accessed March 9, 2009).

Ramaley, J. A. 2005. Scholarship for the public good: Living in Pasteur's quadrant. In *Higher education for the public good: Emerging voices from a national movement*, A. J. Kezar, T. C. Chambers, J. C. Burkhardt and Associates, 166-182. San Francisco, CA: Jossey-Bass.

Ramaley, J. A. 2006. Public scholarship: Making sense of an emerging synthesis. A Laboratory for Public Scholarship and Democracy: New Directions for Teaching and Learning. 105: 85-97.

Ramaley, J. A., B. Olds, and J. Earle. 2005. Becoming a learning organization: New directions in science education research at the National Science Foundation. *The Journal of Science Education and Technology*. http://dx.doi.org/10.1007/s10956-005-4420-8 (accessed March 9, 2009).

Schoen, D. A. 1997. *Educating the reflective practitioner*. San Francisco, CA: Jossey-Bass Publishers.

Seagren, A. 2007. Opinion piece, Winona Daily News, February 3, 2007.

Stokes, D. E. 1997. Pasteur's quadrant: Basic science and technological innovation. Washington, DC: Brookings Institution Press.

Talloires declaration on the civic roles and social responsibilities of higher education. 2005. Conference report of the 2005 Talloires Conference, Tufts University European Center, Talloires, France. http://www.tufts.edu/talloiresnetwork/downloads/ TalloiresDeclaration2005.pdf (accessed March 9, 2009).

Author Information

Judith A. Ramaley is President of Winona State University. Prior to coming to Minnesota, she served as Assistant Director for Education and Human Resources at the National Science Foundation from 2001-2004 and as a Visiting Senior Scientist at the National Academy of Sciences and as president of Portland State University (1990-1997) and the University of Vermont (1997-2001).

Judith A. Ramaley Winona State University Office of the President P.O. Box 5838 Winona, Minnesota 55987 E-mail: jramaley@winona.edu Telephone: 507-457-5003

Fax: 507-457-2415