FROM THE EDITOR'S DESK

The impact of technology on education is a major concern for almost every postsecondary institution in the nation – what strategy to use, which vendors to trust, how far to go, and most of all, how to pay for it and keep it anywhere near up-to-date. For decades, we have been subjected to scary messages from Peter Drucker and others who proclaimed that the traditional campus would soon be a deserted place as vast crowds of students flock to learn at home, sitting at a computer in their pajamas and fuzzy slippers. At the same time, public and private efforts to start up large virtual universities, such as Western Governors' University, began their operations with great fanfare and publicity, and then found that enrollments quickly leveled off with a surprisingly modest level of student participation.

Again and again, states or institutions that make large investments to move a significant portion of instruction onto a technological platform find that, by an overwhelming number, the majority of users are their current students, not new students in remote locations. Thus, the theme of this issue of *Metropolitan Universities* is **distributed learning**, a different concept than distance learning.

The distinction highlights that perhaps the greatest immediate potential for enhancing learning at metropolitan universities is the greater efficiency, richness, and convenience media-based or media-enhanced education offers our students. This is an exciting vision for technology's impact on education of students that have some combination of the following characteristics: commuting, working, coping with family demands, enrolling part-time or stopping in and out across semesters. It does not require sophisticated surveys and studies to make it clear that our current students find that technology offers them the opportunity to use their time more efficiently, increase their interactions with faculty and other students, and enroll for more credits. Distributed learning tries to make learning more convenient, accessible, relevant, and powerful by making the "place" where learning occurs less central in the learning process. My own suspicion is that for the immediate future, the greatest benefit technology offers metropolitan universities is the potential to help our current, campus-based students learn more, and more effectively, and perhaps even finish more quickly. However, we are often unprepared to capitalize on these benefits. We face a number of planning and implementation challenges, some of which our authors address.

Like many people who are, shall we say, "middle-aged," I must honestly say that I am far from knowledgeable about the features and issues of technology. Recently, I went shopping to replace my 11-year-old home computer (you can tell from the time frame how hard I work to make sure I have the latest technology), and found myself making choices more on the ability of the sales person to answer my questions and guide me through the process than on the subtle nuances of hardware features. In the final analysis, all the choices seemed quite similar. Many faculty and administrative leaders face similar challenges of limited personal knowledge when trying to make decisions about investments in technology and technology-related curriculum reform.

In many ways, we are still struggling with the fact that the hardware/software/delivery systems available are so powerful and flexible that our imaginations have not yet

caught up with the possibilities they offer for new approaches to educational delivery. At the same time, these technologies are also still so complex and require such specialized expertise, that few academics and administrators can develop more than a moderate level of expertise that would allow them to explore innovative strategies and truly think afresh about the role of media in instruction. The possibilities are more expansive than our own expertise. The campuses that seem to be making progress usually have the good fortune to have attracted a few key knowledgable individuals with deep expertise who can guide the organization in making efficient choices. We are often unable to compete effectively for the best technology management talent, given the overall shortage of labor in the high tech marketplace and our lower salary structures.

The diverse levels of student skills also presents a set of complex questions and problems. Many of our students enroll at our campuses having spent time in school systems that have better technology capacity than we do. As in all other challenges in higher education, the characteristics of the typical metropolitan university student body present us with special concerns that require different strategies than traditional campuses. Fact is, not every student arrives prepared; some metropolitan institutions surveyed entering students, and were amazed and saddened to learn than fewer than half owned or had regular access to a computer. The demographics of our students mean some are going to arrive with little technology literacy or access that allows them to instantly take advantage of any technology-based instructional programs. Others will arrive with great sophistication. Our actions must address both populations.

One of the ways this has impacted our campuses differentially is the greater need to balance the creation of innovative instructional programs with ensuring sufficient levels of services and resources to ensure equal access. The creation of adequate numbers of computer labs, including 24/7 operations, is an expensive strategy that consumes enormous amounts of space and dollars for maintenance and upgrading. Most campuses offer deep discounts to students on the purchase of computers, but even this leaves some students without access. An interesting model may be the greater integration of media services into every classroom, with different classrooms having different levels of sophisticated equipment to match instructional use. What good does it do for us to dwell on creating exciting and effective media-enhanced programs, if we cannot ensure students will have access? These very fundamental, practical matters continue to be daunting obstacles to moving forward and taking advantage of the efficiencies of technology in instruction.

Then there is the issue of developing sufficient faculty confidence, competence, and motivation in the world of technology. Attention to the role of technology in instruction has largely coincided with the national renewal of commitment to quality undergraduate education and a shift from "teaching" to "learning." This simultaneous agenda has probably been fortunate because it enhanced the opportunity to advance the integration of technology in instruction, and, in particular, increased the importance of budgeting for faculty development in the area of instructional skills. Many of our institutions now feature some form of a "center for teaching and learning" or other units focused on faculty development, and most of these have strong elements of programming aimed at increasing faculty skills in the uses of technology. These investments are essential. For too long our organizations have neglected professional

development for faculty beyond the self-directed opportunities for sabbaticals or summer study. New investments in skill enhancement for faculty ensure that, like our students, faculty have the opportunity for equal access to the exploration of technology and enhancement of their instructional approaches. Whatever path we choose regarding the balance between media-based, media-enhanced, or high tech classroom-based instruction, our success will be almost entirely dependent on ensuring that every faculty member has the necessary skills to be effective in these learning environments. For the moment, given the needs and traits of our students and the size of our campus budgets, a strategy framed by a vision for distributed learning may be of greater impact and value than the notion of distance learning.

The articles presented in this issue offer helpful case stories of institutional efforts to grapple with the multiple demands and dilemmas associated with distributed learning programs. The authors have done a good job of not only telling of their successful projects, but also revealing their struggles and frustrations. Such candor increases the value of these articles to our readers, and I hope you find them helpful and informative for your own campus' exploration of the role of technology. Our attention to this topic in the journal is long overdue, and its importance means it will likely reappear again soon. As ever, we welcome your comments, suggestions, and proposals for future articles and topics.

Barbara A. Holland, Executive Editor
IUPUI
University College Building, UC 3169
Indianapolis, IN 46202
Telephone: 202-708-3061
E-mail: Barbara_A._Holland@hud.gov