Foreword

The EDUCAUSE Center for Applied Research (ECAR) was launched on January 1, 2002, to create a body of research and analysis on important issues at the intersection of higher education and information technology. ECAR is fulfilling its mission through a program of symposia and through the publication of

- biweekly research bulletins oriented to senior campus functional executives;
- detailed studies designed to identify trends, directions, and practices in an analytically robust fashion;
- case studies designed to showcase campus activities and highlight effective practices, lessons learned, and other insights from campus leaders’ practical experience; and
- roadmaps designed to help senior executives quickly grasp the core of important technology issues.

Since ECAR’s inception, five symposia have been held and more than 100 research publications have been issued.

ECAR’s Stretch Goal

In 2001, when ECAR was being planned, I had the pleasure of working with Senior Fellows Robert Albrecht, Diana Oblinger, and Mary Beth Baker. Early plans for ECAR ranged from the practical and mundane—we envisioned a steady stream of high-quality products—to the ambitious and even unprecedented. Our favorite audacious idea was to collect, analyze, and report on data about how real college and university students use and relate to information technologies in their roles as students, learners, community members, and so forth. We knew that the study of education outcomes and IT’s contributions to them was both an analytically and an ideologically slippery slope, but we also knew that we must at least begin to chip away at questions about the complex relationship between IT and learning.

A Complex, Politically Charged Arena of Inquiry

Few subjects are as important, politically charged, and poorly understood as that of students’ IT uses, perceptions, expectations, and experiences. We understand even less about how these influence academic progress, persistence, retention, grade performance, and more. This ECAR study doesn’t presume to cover this intellectual waterfront, but we see it as an important and perhaps even a significant step toward that end.

EDUCAUSE and ECAR benefit from an engaged and committed membership. In this case, 13 of our most committed institutional members and subscribers agreed to run the gauntlet of their institution’s institutional research board approval process so that we could gain access to a representative sample of their freshman and senior students. As a result, nearly 4,500 students participated in this study. Importantly, those universities participating reflect U.S. higher education’s great diversity. Some represent public land-grant institutions, some are elite private institutions, and others were selected because they focus dominantly on undergraduate instruction and have incorporated technology into instruction.
in noteworthy ways. We hope over time to expand participation in this study so that the effects of institutions and institutional types may be examined.

Findings

The results of this first ECAR student study are gratifying, satisfying, and occasionally surprising. We relearn that students are not a monolithic population across any dimension of behavior, including IT usage. We are reminded that among the many so-called digital natives—university students born in the Internet era—we also find many reluctant and even skeptical IT users. More importantly, students in this study reveal themselves to be discriminating users of IT. While many can wear out more than a pair of thumbs in hours of video gaming, most state a clear preference for moderate doses of IT in the classroom.

This study confirms findings suggested in ECAR’s earlier study of faculty use of course management systems that new course-oriented software is making the business of learning more convenient but isn’t yet yielding visible breakthroughs in learning itself. This finding too is not surprising and is hardly conclusive, given the limitations of self-reported data. We must note, though, that convenience is important. Many studies of students, such as Levine and Cureton’s When Hope and Fear Collide: A Portrait of Today’s College Student, describe student lifestyles that author Jeanette Cureton later describes as “wired and tired.” Today’s students are enormously busy. They carry unprecedented academic course loads, unprecedented financial responsibilities and debts, unusual family obligations, and often demanding occupational obligations. If IT’s impacts were limited to convenience, those of us in the business of crafting such technologies could justifiably wave a victory flag. Of course, we all continue to struggle and work for the bigger prize of a learning revolution.

Important Contributions

ECAR research studies result from a team effort. Robert B. Kvavik, ECAR senior fellow and associate vice president at the University of Minnesota, Twin Cities; Glenda Morgan, director of academic technology initiatives at the California State University Chancellor’s Office; and Judith B. Caruso, ECAR fellow and director of policy, security, and planning at the University of Wisconsin–Madison, authored this report. Their intellectual leadership manifests in the work itself. Bob Albrecht, Bob Bender, and Robert Kvavik coauthored the case study of Emory University’s Collaborative Learning Center to supplement the core study. Bob Albrecht, Bob Bender, and I had the pleasure of providing commentary on drafts and research design throughout the life of this project. Dr. Darwin Hendel, Ronald Huesman Jr., John Kellogg, and Cynthia Murdoch of the University of Minnesota, Twin Cities, provided outstanding advice on technical survey design issues and on the sampling strategy that would yield confident statistical representations. We are enormously grateful to them.

Of course, the real team in any ECAR study is the EDUCAUSE community. Our ability to develop a good understanding of practices, policies, and directions in higher education depends on the goodwill of our associates in the community. In this case we have made exceptional demands of our good friends. Jan Biros and John Bialec of Drexel University opened the right doors for us at their institution. Gabriele Wienhausen and Steve Relyea of UC San Diego shepherded the approvals and technical issues there. Carol Carrier, Craig Swan, Billie Wahlstrom, and Linda Clemens at the University of Minnesota, Twin Cities, and Donald Sargeant at the University of Minnesota, Crookston, enthusiastically gave us the necessary approvals to include their campuses in the study. Judy Doherty of Colgate University was instrumental in obtaining approvals and access to students for interviews at Colgate.
At the University of Wisconsin System institutions, John Berens at UW–Oshkosh, Richard Cleek of UW–Colleges, Jane Henderson and Margy Ingram at UW–Stout, Bob Kaleta at UW–Milwaukee, Jim Lowe at UW–Eau Claire, John Tillman at UW–LaCrosse, and Lorna Wong of UW–Whitewater led the efforts at their respective institutions, ensuring approvals and student and administrator participation. We also wish to thank Donald E. Harris, vice provost and CIO of Emory University, for his support in making Emory’s fine Collaborative Learning Center available to us for study. Thanks to all of you for your assistance. We could not have done this study without you.

The EDUCAUSE staff is also an essential part of our community, and our ability to conduct this research depends on their provision of myriad services big and small. The EDUCAUSE team is always there when you need them, and their commitment to excellence is evident in all that they do. Thank you.

Finally, ECAR, while now enjoying the support of nearly 300 college and university subscribers, continues to depend on the generous support of a small and dedicated cadre of corporate sponsors. Datatel, HP, Microsoft, Oracle, PeopleSoft, SunGard Collegis, and SunGard SCT not only provide direct financial support of ECAR but are also generous with their advice and skilled resources.

We are aware that many and possibly most universities and colleges survey their own student bodies to understand their preferences, inclinations, and levels of satisfaction. We hope the data and analysis from this study shed new light on their own data and studies. We also hope most sincerely that this work will inspire excitement and redouble commitment, for the results are indeed exciting and encouraging, and that many institutions will choose to continue and elevate this work by participating in future studies of this essential topic.

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Endnotes