

Technological Ecologies & Sustainability

CHAPTER	9
TITLE	Using the LEED Evaluation Tool to Assess the Sustainability of Computers and Writing Programs in 2-Year Institutions
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OVERVIEW	<p>In a Burkean context where nomenclature shapes reality, the language and categories with which we assess say a great deal about the “reality” we construct. Leadership in Energy and Environmental Design (LEED) and the U.S. Green Building Council provide an advanced and detailed language for evaluating design elements holistically and interdependently, and their methodology introduces a useful metaphor for digital writing programs desiring sustainability, efficiency, quality, awareness, design, and innovation.</p> <p>In this chapter, I adapt LEED’s terminology—site development (physical layout of computer classrooms), resource savings (efficient use of digital and printed resources), energy efficiency (effective management of human resources), materials selection (selection of computer hardware and software), and environmental quality (department climate that includes placement and writing lab support), as well as LEED’s rating system consisting of certified, bronze, silver, and gold. Using these elements—to illustrate how leaders at institutions can think critically about multiple and interrelated program elements with a goal toward building a digital writing ecology that can be sustained over time and that will co-exist with competing interests.</p>
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Using the LEED Evaluation Tool to Assess the Sustainability of Computers and Writing Programs in 2-Year Institutions

Kip Strasma

I have taught in a first-year writing program at a 2-year college for almost two decades, and have held the positions of faculty, administrator, and dean; recently, I've relocated to South Florida and have taught in 4-year writing programs as well. Across these roles and within these different institutions, my desire for a sustainable computers and writing program has been constant. In 1996, a colleague and I from Illinois Central College (ICC) wrote an assessment of technology within ICC's writing program for NCTE's *Teaching English in the Two-Year College*. In the article, Paul Resnick and I described the urgency of 2-year colleges and first-year writing programs to accelerate technology utilization with, at the time, the growing use of email and the World Wide Web. We documented the absence of writing teachers' voices from the conversation about how to establish, administer, and sustain emerging computers and writing programs. Then, ICC's primary concern was the legitimization of teaching writing with computers, and we advocated involvement by teachers of writing in this process:

In the face of the gap between where our college and others like it are now and where we are supposedly going, English and writing faculty must move forward forcefully or risk losing access to many of the advantages that computer-supported pedagogies make possible, and, as we have argued in this essay, in order to realize these advantages, faculty should oppose solely print-based notions of literacy acted out in policy decisions at the institution. (Resnick & Strasma, p. 210)

We were also interested in local control over the identity and definitions of ICC's writing program. We argued that direct intervention by faculty members informed by digital writing pedagogy is the only appropriate course of action. Writing instructors must play an active role in the purchase, layout, distribution, and use of new computer technology. We noted that those of us who appear to be losing local struggles should actively make use of the work of colleagues in other places as possibly the best place of compelling evidence and persuasive data for creating viable electronic writing spaces. Indeed, our call was both to action within and beyond the department; we needed to address complexities that spanned from negotiating shared classrooms to addressing complexities of teaching writing with new technologies.

Just over a decade later, in 2008, I can answer affirmatively that, yes, many programs have expanded computer access, and many have also moved away from experimentation to legitimization. Like many colleges, ICC has, for example, experienced the economic and electronic tides of local-area networks, wide-area networking, and enterprise-class software delivery. The number of computers on our campus has grown from 400 to 4,200; students have access to server storage space and a range of Internet-based services. More than 40% of ICC's classrooms are now wired, offering Internet access and data projectors. The department has dedicated computer classroom space that makes it possible for 85% of all writing classes (developmental, transfer, and advanced) to be assisted with digital technology. Although so much has changed, and although ICC continues to identify itself as a legitimate player in enhancing student digital literacies, questions related to how the program is doing



and what its future will be remain—even loom. Faculty and administrators continue to ask questions like:

- Are we far enough along in our abilities to sustain a healthy ecology for a first-year, digital writing program?
- Do we have sustainable systems to train and support faculty to use technologies effectively for the teaching of writing?
- Do we have a sustainable set of support services for students writing in computer classrooms?
- Do we have an administrative plan for sustaining and growing the gains we've achieved?
- How can we assess our current status so that we can learn from the past and design effectively for the future?

THE NEED FOR ASSESSMENT

The first-year writing program at ICC has almost 125 adjunct and full-time faculty who teach almost 300 developmental and transfer writing classes to over 5,000 students each year. In my experiences working with 2-year colleges and with the Midwest Regional Association of the Two-Year College Association (TYCA), I believe the program is typical of most across North America, and I think many will find similarities between their own departments and ICC's experiences. ICC's situation may well characterize the ongoing struggle at other first-year writing programs at 2- and even 4-year colleges: that is, identifying their place and stake in the face of often widespread technological change and development on their campuses. In fact, a study by TYCA and sponsored by the Conference on College Composition and Communication (CCCC) posited that many first-year programs still require an awareness of their status in technoecologies, and their roles as stakeholders in campus technology efforts. Dubbed the "TYCA Research Initiative," researchers Jody Millward, Gregory Shafer, and Dianne Fallow (2006) asked survey respondents to assess technology access among teachers and learners at their institutions, as well as to respond to inquiries about program development. Their recently published report, authored individually by Millward (2008), concluded that much is yet to be learned for a sustained ecology:

Two-year colleges have invested heavily in infrastructure, yet faculty and administrators have been slow in posing key equity questions, e.g., which students at what time and with what faculty are using campus technologies and to what benefit. . . . Careful studies will enable colleges providing technological access to secure what they have and advocate for more, provide a basis for faculty to work with administrators in planning effective use of resources, and provide administrators with the foundation they need to seek funding support in their communities and state legislatures. (p. 391)

As data collected through this national-scale project emerges, evidence continues to demonstrate the need for knowledge about how writing programs identify and assess computer-supported instructional needs. The survey reveals that, because first-year writing programs are at different stages of development and have unique priorities, an assessment tool would be particularly useful in establishing goals for future staffing and budgeting. Identifying an assessment tool is the primary purpose of this chapter.

As ICC is at this juncture of assessing the relationship of progress and sustainability, I expect other first-year programs are as well. In my roles at a large community college, it has been



helpful to think *terministically*, as Kenneth Burke (1966) defined it: That is, thinking in a way that points attention to things that we would not normally notice—a way of mentally highlighting. Burke explained that observations are implicit in terminology: “many of the ‘observations’ are but implications of the particular terminology in the terms of which the observations are made” (p.46). In this context, the language with which we assess says a great deal about the reality constructed by and through that language. True, there are many possible models for assessment that provide terms for this reality, as English departments and composition specialists are not the only professionals to address methods of assessment and questions regarding sustainability. The Higher Learning Commission (HLC), for example, has authorized the use of scheduled, periodic assessments of quality through its Academic Quality Improvement Program (AQIP).

It is true that many institutions have endorsed other quality process initiatives such as the Six Sigma approach.¹ Research that emerges from Composition Studies provides specific approaches, and recent efforts by Richard Selfe (2005) identified the need for ongoing, formative assessment that takes into consideration an expanded notion of composing. In particular, Selfe offered a continual, team-based, stakeholder-oriented, five-step process for “creating and re-creating technology-rich environments for teaching and learning English and language arts” (p. 122). It is hard to fault this teleology, and Selfe provides strong advice for identifying the interests involved in his model, where he maps out the interactions among key agents involved in sustaining computers and writing environments. A complementary and connected facet is to not only identify interests, but also to identify the values these agents possess: balance, sustainability, efficiency, quality, awareness, design, and innovation.

In this chapter, I build upon Selfe’s (2005) efforts by presenting a model for holistic assessment and sustainability adapted from the United States Green Building Council. Chartered in the 1970s, this organization offers a rich resource for anchoring assessment; the organization is interested in holistic construction, framed by the question: “How well does a construction event steward its environment?” Its Leadership in Energy and Environmental Design (LEED) assessment tool has emerged from many years of research and offers well-illustrated details on how to assess a sustainability effort. Specifically applied to computers and writing programs, LEED inquires into the extent that composition integrates well into its computer ecology—or addresses the question: “How well does a composition program balance the many constraints of its computer environment both for the short-term (e.g., semesters or years) and the longer term (e.g., many decades?)”

This is an important question—one often answered not with detailed, robust responses, but with quick-fix answers (often due to the lack of an assessment tool

to guide responding to the question). A LEED-inspired model complicates such any such simple answers by inviting assessors to account for the intricacy of interests and agents invested in any computers and writing program. In what follows, I’ll provide an overview of the LEED model, and then describe the ways in which the model can be a useful tool for assessing computers and writing programs. I conclude with an assessment tool for first-year programs that measures how to situate and how to sustain computers and writing programs.

Academic Quality Improvement Program (AQIP)

<http://www.aqip.org/>

United States Green Building Council

<http://www.usgbc.org/>

Leadership in Energy and Environmental Design (LEED)

<http://www.usgbc.org/DisplayPage.aspx?CMSPageID=222>

¹ A popular approach in industry, Six Sigma is a business management strategy originally developed by Motorola. Originally designed to identify problems in manufacturing processes, the model has expanded and can be applied to management and work-flow processes. The strategy a process of defining, measuring, analyzing, designing, and verifying to measure outcomes.



THE LEED MODEL

To illustrate what an ecological assessment of program sustainability might look like, I've adapted four elements from the LEED evaluation tool: Site, Resources, Awareness, and Design. These elements of the LEED model are the most important for sustaining computers and writing programs (but they do not represent the entire LEED system).² LEED provides a holistic, data-based, detailed rating system from which to complete an assessment of a computers and writing program. Site, resources, awareness, and design are the first considerations of any leader seeking to (re)build a composition program that finds balance with computers and vice versa. The table below lists criteria according to LEED terminology, followed by adaptations to computers and writing interests.

Table: LEED-Inspired assessment tool for computers and writing programs.

	ENVIRONMENTAL DEVELOPMENT	COMPUTERS AND WRITING
Site > good stewardship	The nature of a construction's integration into the overall environment—for example, Southern orientation for passive solar efficiency, sizing the building "footprint," sensitivity to habitat, etc.	The extent to which the classroom space supports multiple and diverse modes of teaching and learning in a writing program—for example, facilitating peer-response, supporting discussion, coaching, presenting, etc.
Resources > balance of needs	A sensitivity to using available resources to reduce waste—for instance, the use of local resources, resistance to products with high levels of "embedded" energy, sensitivity to overall energy conservation, etc.	The efficacious use of computers resources available to a program—how reflexively and critically resources are negotiated by competing interests, including administration, community, students, faculty, etc.
Awareness > education and development	The ability to optimize ongoing performance of agents and equipment involved—for example, utilizing local professionals, challenging conventional views, finding unnoticed efficiencies, etc.	Initial (e.g., orientation) and ongoing development for effective instruction with computers, technology, and new media—for example, how well a department provides learning that supports the critical use of technology in the classroom.
Design > innovation	Going beyond what is possible now to improve the entire ecology of site, resources, and agency—for instance, designing a roof system that collects both water and sunlight, while protecting inhabitants from the elements and providing natural cooling.	The "emergence" of insights and synergies made possible through effective leadership—for instance, the value of administrative and faculty experimentation and innovation with emerging, cutting-edge pedagogies for effective writing.

² The full system of LEED includes, in addition to site, resources, awareness, and leadership/design; quality: "LEED promotes a whole-building approach to sustainability by recognizing performance in five key areas of human and environmental health: sustainable site development, water savings, energy efficiency, materials selection, and indoor environmental quality." Additional information is available at <http://www.usgbc.org/DisplayPage.aspx?CategoryID=19>.

These four criteria frame the key areas where competing interests must be negotiated among the agents that constrain computers and writing programs; they are, in my experience, both the areas of greatest contention and of the most pressing importance.

Site: Articulation and Diversification

In the LEED model, site relates closely to good stewardship, or the balance of construction with nature. The value of stewardship is central to the LEED system as a whole, and site attention in particular. A typical site assessment for LEED considers solar orientation, size of structure (called a “footprint”), site disturbance, mobility/transportation to and from, and more. To build or remodel a structure, for example, a LEED assessment might address the size, placement, layout, and diversity of the site. These are important considerations for sustaining computers and writing program sites as well. Generally, for computers and writing, “site” refers to the extent to which classroom space supports and encourages multiple modes of teaching and learning and helps maintain a balance of program standardization and instructional innovation. The LEED model highlights the value of an instructional space where many different pedagogies are simultaneously sustained. For instance, the model invites assessment of both specific, often individualized practices (e.g., the use of computers to conduct in-class, team-based writing) and more collectively, broad-spanning activities (e.g., the implementation of outcomes for digital writing across the first-year program). Computer classroom spaces with malleable characteristics can help faculty, as a group, identify, assess, and balance pedagogy and technology. This is the most important value to sustain, and is the beginning point for any LEED-inspired analysis of a computers and writing program.

By way of illustration, at ICC, there are several kinds of computer classrooms available for scheduling; these fall into four broad configurations: lecture, workshop, conference, and multi-function/purpose. The figures (1–4) below and videos embedded here reveal each type of space configuration.

Figure 1. Illinois Central College lecture classroom with rows.

For a video of the room, see <http://faculty.icc.edu/instructionaldesign/LEEDKS/TC214.html>



Figure 2. Illinois Central College classroom with workshop clusters.

For a video of the room, see <http://faculty.icc.edu/instructionaldesign/LEEDKS/214B.html>



Figure 3. Illinois Central College classroom with conference rows (wireless).

For a video of the room, see <http://faculty.icc.edu/instructionaldesign/LEEDKS/306A.html>



Figure 4. Illinois Central College Classroom with perimeter workstations and center conference cables.

For a video of the room, see <http://faculty.icc.edu/instructionaldesign/LEEDKS/CC207.html>



As part of the larger college, the computers and writing program at ICC has inherited varying spaces in which faculty teach and students learn. Which should be sustained? A non-reflective response would be, perhaps, the one classroom that appears to provide for multiple activities at the same time: coaching, writing, discussing, presenting, demonstrating, and lecturing. Student attention can be directed toward the teacher, screen, a peer's screen, a textbook, or other print materials. Teachers can move back and forth among different methods supporting writing pedagogies currently sanctioned by the National Council of Teachers of English (NCTE, 2005) for multi-modal teaching and learning spaces involving computers.

But such an answer would provide an attractive pedagogical product rather than a sustainable process for continually (re)aligning and (re)assessing a computers and writing program with technological tools and spaces. Although I believe that the last classroom shown above (Figure 4; CC 207) does embody the most robust site for digital writing classes at ICC, it is only so for now, at this particular time, at one institution. In other words, the goal with a LEED-inspired assessment tool is not to arrive at an ideal computers and writing footprint, but to provide a heuristic process for use within a specific institution. A parallel clearly exists between environmentalism and computers and writing: Technologies remain in flux while constructions are materially fixed for durations of time. What we want to sustain is not a particular classroom, but the way in which it embodies current thinking about teaching and learning.

Considering the discussion above, it should be evident that a LEED-inspired tool probes the degree to which construction elements are balanced along a continuum favoring conservation, long-term planning, diversity, and sustainability. Among computers and writing professionals, this inquiry becomes: "To what extent does the classroom site contribute to multiple and diverse teaching and learning?" and "How well does the computer classroom provide flexible, student-centered learning?" Recently, I took these questions to the University of Miami in south Florida. I was assigned to teach two classes in a classroom in a dormitory building, with a white board and desk-styled chairs; I quickly set out to find more suitable space. What I found was a 170-seat wireless lecture hall that had fixed seats at tables with student computer monitors and a teacher's station, with an LCD projector (see Figures 5 and 6). My teaching in this space was temporary (for that single term), but it represents a microcosm of a larger sustainability effort that the university is pursuing (and should continue to explore beyond single-function/single-purpose space). Although momentarily, the room provided a multiple and complex writing space that allowed me to resist the single-function-pedagogy design of the space.

Figure 5. University of Miami lecture hall: Teacher's station.



Figure 6. University of Miami lecture hall: Student view.



At ICC—while there is still a great deal of work to do so that students' writing experiences are both standardized across the program and enriched by current research regarding effective computer-mediated instructional spaces—the college is moving to reorient classrooms by inverting the rooms from a teacher-at-the-helm (teacher-centered) design to a teacher-at-the-rudder (student-centered) layout. The space plan currently under consideration for implementation in four classrooms primary used for writing courses will change the space so that the teacher station is at the back of the room; all the student tables and computers face the projection screen; and the student tables are staggered in placement, for ease of sight and for ease of movement (e.g., so students can more easily work in pairs or small groups). This low-cost solution alters the dominant methodology of teacher-centeredness and opens spaces for other kinds of collaborating and coaching. I'm not advocating that this change will alter behavior; such a claim would be reductive and simplistic. But, as the LEED model points out, space and orientation do matter in that they establish the limits or boundaries for the activities that take place within a particular space. Site ecology (i.e., space and the way the space is structured) clearly both introduces and reinforces action.

Resources for Supporting Programs

In the LEED model, resource anchors the balance of investments and articulate a sensitivity to using both local and global means to reduce waste and enhance ownership. This part of the LEED system is highly detailed, and describes variables such as transportation of resources, resistance to products with high levels of embedded energy, and sensitivity to overall energy conservation. This portion of the LEED model asks about how construction elements are "owned" locally—rather than "resourced," "outsourced," and/or "over-sourced." In my application of the LEED model to the ways in which we assess and sustain a computers and writing program, I am particularly drawn to the notion of transportation, because it functions as a crossroads (far/near, us/them, and individual/global). Architects understand that not all materials can be local and they thus must rely upon large-scale movement of materials to a specific building site. The ideal situation is to rely locally upon those resources with the most embedded energy (highly produced or refined materials); realistically, other materials may come from a distance (natural resources, for example, like wood, aggregate, or sheetrock). Due to the many constraints relative to a specific site, a balance must be created.



For teachers of first-year writing, resource support considerations are ongoing. And questions about balancing the resource needs of a local department with the needs of others at the college level seem omnipresent: "To what extent are critical elements of a computers and writing program 'outsourced' to other departments?—or, "Does outsourcing of critical computers and writing elements jeopardize the technoecology?" In ICC's writing program, for example, the need to compete for scarce resources is felt by each faculty member who calls the instructional technology help desk and is put in a queue, and by each student who sits down to a monitor that flickers or a mouse that doesn't work. How do we get what we need quickly in the face of diverse demands, scarce resources, and competing departments? This question might best be addressed by approaching (as LEED does) each interaction as a partnership. The interactions I'm thinking about obviously include computers, wires, projectors, desks, servers, and course-management systems—these are the obvious resources to map in terms of interactions. Some less apparent elements include student testing and placement, as well as access to online writing labs and writing tutors. These need to be planned, negotiated, and implemented through partnerships with writing-invested local departments and with global, college-wide technology resource providers. Working as a member of a technology team helps break down barriers that are often in place, and that have solidified over years of institutional replication.

One such barrier is the outsourcing of assessment approaches, reported on in a recent collection on machine scoring of writing edited by Patricia Freitag Ericsson and Richard Haswell (2006); they dedicate three chapters to ACT's E-Write program for placement purposes, two of which are chapters reporting on 2-year colleges. All three chapters conclude that the E-Write automated grading engine poorly scored student writing with sometimes unrecognizable discrimination (i.e., most papers received a similar, conservative score). William Ziegler (2006) concluded:

However, writing faculty see placement through a lens that finds usefulness in the work of creating and maintaining a placement instrument. In addition to the honoring of placement values... conducting writing placement [as with E-Write] forces faculty to revisit vital questions: what are the basic skills of writing? What traits do we agree to recognize as demonstrating competence in these skills? For faculty, the work of placement may be a pearl-producing irritant; the answer to computerized testing may forever be "not yet." (p. 146)

At Ziegler's community college, it was the process of using a machine to test writing rather than the machine's role per se that became the issue, raising the question of why writing programs might outsource such an important activity to separate testing offices. Shouldn't we be looking for ways to maximize placement information through computer use from within the department, perhaps with home-grown tools, or tools customized to represent and evaluate what we consider key to writing?

ICC tested the same E-Write program during the pilot phase in 2003 for the same reasons as Ziegler's institution did: The college wanted to collect a whole text or essay from students with a computer and then have it scored quickly and efficiently. During the process, something insightful happened with ICC's link to this resource and ICC's testing office in general: Faculty could access the written work of students after the grading machine finished its magic. Before or at the beginning of class, for instance, I could pull up student essays and verify placement scores, or apply an individual assessment rubric to determine the range of preparation and ability in the class. Colleagues were excited; rather than reduce a student essay to a digit, faculty could access an entire document to confirm a placement recommendation or to initially assess the quality of student writing. It was as if placement, which ICC's department outsourced two decades ago, was returning front-and-central to the department, as faculty were again involved in addressing the questions Ziegler posed.

This is the sort of complex, multi-faceted partnership that a LEED-based analysis can reveal, I believe, because it addresses the people involved in needing and providing services, rather than the technology itself. I'd recommend that computers and writing advocates involve themselves as members of both department- and college-wide technology committees, grant-writing initiatives, and/or general education teams. Millward (2008) reinforced this point by identifying four patterns that work against effective and equitable resource allocation; these included:

- technology access disparities between campuses at multiple-sites institutions;
- faculty demand exceeding smart classrooms and computer classroom availability;
- computer classrooms or technical support dedicated for specific course levels only; and
- departmental policies that determine who is scheduled in technology-supported classrooms and which classes receive computer access, inevitably excluding certain groups (e.g., adjunct faculty, new faculty). (p. 382)

A recent teaching assignment at Florida International University illustrates these patterns, as my adjunct status made it almost impossible to guarantee computer support for my class. Although I sought out several options, it was only due to a last-minute cancellation that a computer classroom became available (Figure 7).



Figure 7. Florida International University computer classroom: Student view.

Millward's (2008) point about resources in first-year programs at 2-year colleges (and at 4-year colleges and universities, I'd argue) suggests that we need to get actively involved and to use whatever leverage is available to partner with power structures and administrators within our institutions. At ICC, for example, I served as chair to ICC's Technology Planning Committee, populated by a college-wide group of department representatives. In this position, I helped to shape current policy and future planning of hardware and software, and the distribution of those tools. I found these interactions rewarding, not because of any one success ICC's writing program has enjoyed, but because of the relationships I've built participating in ongoing, recursive technology planning.



AWARENESS THROUGH TRAINING

In the LEED model, awareness is the ability to optimize ongoing performance of agents and equipment—for example, using local professionals, challenging conventional views, and finding unnoticed efficiencies. As with any institutional effort, the process of awareness through training is ongoing and never finished. LEED relies upon workshops, government publications, and its Web site to help planners learn cutting-edge eco-conscious design. Specifically, their rating tool—Platinum, Gold, Silver, and Bronze—promotes the success of individual architects and/or organizations. To acquire certification, designers and builders must learn LEED’s model and look for opportunities to implement it when building and when redeveloping. This last point is the contribution from LEED upon which I’d like to elaborate in this section. LEED is constantly evolving and “re-versioning” itself because of technological developments (like stronger structural insulated panels) and feedback from professionals in the field. The perspective LEED advocates in its green proposals continually looks for ways to triangulate products, which takes time, but is invaluable for professionals who use the system.

This process of keeping pace with developments while gathering stakeholder feedback as essential for a successful computers and writing program. And I think this we can borrow what Jay Bolter and Dave Grusin (1999) meant in terms of *immediacy*, *hypermediacy*, and *remediation*; certainly, these terms resonate more with computers and writing scholars than terms like “structural insulated panels.” Bolter and Grusin noted:

New digital media oscillate between immediacy and hypermediacy, between transparency and opacity. This oscillation is the key to understanding how a medium refashions its predecessors and other contemporary media. Although each medium promises to reform its predecessors by offering a more immediate and authentic experience, the promise of reform inevitably leads us to become aware of the new medium as a medium. (p. 19)

Bolter and Grusin are describing here a kind of awareness as they work through various media examples in their book; remediation is that *third* space between immediacy and remediation. This vision offers a methodology for seeking problems and solving dilemmas, and it finds a welcome audience among faculty searching out initiatives to enhance knowledge about teaching and learning with computers.

In applying LEED’s notion of awareness to computers and writing, leaders might think first about the kinds of training needed for new and returning instructors, as well as workshop opportunities where training is strategic and critical. (Millward argues in her TYCA report that, although 86% of respondents reported some kind of pedagogical professional development for faculty, there were concerns that the training was “inadequate because of few or sporadic offerings” and “focused on technical aspects rather than pedagogy,” p. 384.) A case in point: Institutions like ICC and UM rely heavily on two platforms for supporting instruction and learning: Turnitin.com and Blackboard. These systems function broadly in smart classrooms and online, thus forming the backdrop of most course-related digital writing exchanges. It is not my goal to critique either system fully, but I would like to point out how training in these platforms can be addressed by a LEED-inspired assessment, and reveal a transformative agenda for training faculty.

The first step for training at ICC is instruction on how to use Turnitin.com and Blackboard. But this sort of training is less useful than purposeful, rhetorical, critical thinking about how the tools might be used best. Both Turnitin.com and Blackboard have in their marketing promise the transformation of writing instruction, the former in terms of authenticity (or “originality”) and the latter in terms of offering a closed (i.e., password-protected, nonpublic) course-management site. Most faculty think of Turnitin.com as anti-plagiarism software that addresses college administrators’ need for a quick, politically responsible answer to the rising trend in student cheating and paper-download Web sites. The system works by a student or



faculty member uploading a digital document, which is matched against the most recent version of the Web-docuverse available to Turnitin.com (although their search is not complete by any means, especially given that the system is not connected to peer-to-peer file-sharing sites running under the Web). Turnitin.com produces an “Originality Report” for the student writing—comparing how similar or dissimilar it is when compared to other sources indexed on the Web.

These kinds of network products may seem generally benign to many college professionals, especially in light of 4/4 or 5/5 teaching loads. But the point that can be made in the context of remediation is that professionals must oscillate between convenience and authenticity in the search for ways to critically resist the global, totalizing use of tools by paying attention to them as media; they need training about a third way. I’ve generally resisted the use of Turnitin.com in my classes not by ignoring it, but by transforming it into a learning tool for students. Rather than review originality reports, I ask students to post, collect, and analyze their own as part of the process for a particular project. In this way, the students become critical users of the programs and participate in the process of tool-based writing assessment. In every training opportunity for faculty to learn how to use Turnitin.com, I always point out that Turnitin.com can be used in this way, that is, against the intentionality promised by the system.

A second example of this LEED-inspired assessment is Blackboard. Perhaps because Blackboard represents a ubiquitous presence at most campuses—it is the only course-management software at the three institutions in which I’ve taught—careful critique and assessment is required. My own use of the software for peer-response pedagogy has continually brought about a desire to work against the platform while assessing global improvements. I have brought this evaluation-oriented attitude to many faculty training sessions. In brief, Blackboard only marginally invokes what I consider effective peer-response activities, ones that allow students to post works-in-progress, comment on these works, and receive feedback from peers about the usefulness of peer comments. In early versions of Blackboard, this process could be approximated through public sharing of student work in a threaded discussion forum or group list. More recent versions of Blackboard now include a rating feature that can be activated by teachers for this purpose, an option that, unfortunately, requires upgrading (Illinois Central College has yet to invest its resources in this way). The point here is that straightforward training in Blackboard eclipses peer-response goals in favor of simple transactions and layout features. Faculty require training in how to see the gaps among pedagogical possibilities and technical realities using the very platforms in which their classes operate.

As these examples show, faculty need more than general training with software and hardware; they need opportunities to see through the resources and allow their pedagogies to emerge along with or be transformed by their interactions. Scrutiny is required of all proprietary and open-source software; wired and wireless network access; student- and institution-owned computers; print journals and digital document indices—and on and on. LEED brings to computers and writing an assessment focus that investigates the most important resources of educational institutions: human–technology interactions. These interactions must be understood and critiqued to support a sustainable ecology for computers and writing programs in the coming decades.

ENGINEERING FOR LIFE-CYCLE REPLACEMENT

LEED takes a large-scale, all-encompassing view in terms of space and time, encouraging the analysis of a decision in the context of all other decisions, across the entire life of a project. The overall construction of site, resources, awareness, and design requires strong leadership, which I’d argue is the penultimate element required for sustainability. Leaders need to ask long-term questions to cultivate sustainability—questions not often in the forefront of writing



teachers' minds in resource-competitive environments. Yet leaders must be progressive in contemplating how newly imagined spaces will function 10 years in the future, or how computer replacement will take place even as brand-new machines are selected.

This need to think broad-scale makes leadership the most important element of a successful computers and writing program. Sadly, at many 2-year colleges, no dedicated resources are available from year-to-year to support new faculty training or the continued professional development of existing faculty. In a study analyzing writing practices and writing support in 2-year colleges, Timothy Taylor (2007) found that only 17% of respondents had a writing program administrator. This probably means that alignment of elements—or what I'm calling leadership design—remains the job of a department administrator (i.e., chair, dean, or provost), or a professional who serves across departments. Taylor concluded by noting that “we still need a person, an expert, who can. . . improve working conditions in writing programs” (n.p.). Such a recommendation links 2-year colleges with organizations such as the Council of Writing Program Administrators, a source for position statements and resolutions coordination.³

Although four-year colleges and universities perhaps consider a WPA position a given, 2-year college programs that hire hundreds of adjunct and full-time faculty do not necessarily share in this view. The perception, rather, is that administration of writing belongs to the central administrative authority in a department, or is shared by faculty through release time. This makes it nearly impossible to address the enormous challenges facing the sustainability of a computer-supported program.

As an associate dean, I specifically asked for a new position to administer ICC's writing program and assist with technology training and supplements. I imagine that this coordinator, director, or WPA could offer:

- training for adjunct faculty members in site and resource utilization;
- reviewing of writing-program technology in classrooms;
- coordination of English Learning Lab (ELL) curriculum and software review;
- reviewing of software for developmental learning programs;
- coordination with the college's online writing/learning lab;
- training for student tutors in the online writing/learning lab;
- deploying a content-management system for all faculty and courses, and providing training for that system; and
- participating in department, college, and institutional committees to foster growth in all of the areas listed above.

³ The Council of Writing Program Administrators is a national association of college and university faculty with professional responsibilities for (or interests in) directing writing programs. Members include directors of freshman composition, undergraduate writing, WAC/WID/CAC, and writing centers, as well as department chairs, division heads, deans, and so on. WPA publishes a journal and newsletter, holds an annual workshop and conference, makes grants and awards, develops position statements, offers consulting and program evaluation, and fosters extensive discussions about college writing and writing programs.



Indeed, every great LEED initiative requires a visionary—someone dedicated to the project and derives personal and professional satisfaction from moving it forward. For computers and writing programs in English or composition departments, this may be the coordinator or director of writing responsible for designing or redesigning writing sites and spaces, for exploring and evaluating computer resources, and for training and re-training faculty. This role, the person who fills it, and the strategic ways in which models like LEED are deployed are factors that cultivate and sustain continuity—a sustainable, healthy technoecology—across campuses, across semesters, across years, and across changes in technology.

LEEDING FOR THE FUTURE

ICC's program—and, indeed, all writing programs—require rigorous, balanced assessment. Too much computers and writing administration falls to generalists. A decade ago, my colleague and I bemoaned, with the help of Cynthia Selfe and Richard Selfe's scholarship, that we still depend upon access to generic infrastructure in regard to classroom design, faculty support, and resource allocation. We rely on universal, general, and often one-size-fits-all approaches to instructional technology rather than shaping a sustainable identity from within our department. In LEED terminology, 2-year colleges like ICC need a model for balancing the interests involved in sustaining quality over time.

The model I have articulated here (summarized in the list of questions included in the Appendix) connect the LEED principles to the work we can do to support and sustain healthy computers and writing ecologies at 2-year institutions. Clearly, the questions do not fit so tightly together as to impose a rigid point-numbering system for assessing site, resources, awareness, and leadership design. Rather, what I hope to have demonstrated through this tool is a specific heuristic. We need to re-think classrooms and practices at every turn, looking for opportunities to re-integrate, re-introduce, and reinforce an overall, sustainable approach to the technoecologies in which our computers and writing programs exist.



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Appendix. LEED-based assessment survey (also available at <http://faculty.icc.edu/instructionaldesign/LEEDKS/survey.html>).

School or Department Name: _____

1. What percent of composition courses are assigned to dedicated computer classrooms? (circle one)

None 50% 75% 90% 100%

2. Using the four video samples (included with Figures 1–4), which computer classroom layout most resembles those at your institution? (circle one)

None 214B 306A TC214 CC207

3. Which of the following are “owned” and not “outsourced” to other college departments? (select all that apply)

None New media software
Course-management system Department server
Composing software

4. How many events does your department sponsor/plan for teaching faculty to use computer software/services critically? (circle one)

None 1/year 1/term 1/month 1/week

5. Who administers the computers and writing program at your institution? (select one)

No one
Dean / Department Chair
Director / Coordinator of Technology
College-Wide Faculty Development Department
Writing Program Administrator



6. Which statement best describes your department’s planning with computers and writing? (select one)

- None
- Planning includes assigning classes
- Planning includes budgeting
- Planning includes organizing faculty development events
- Planning includes long-term strategy

7. Typically, faculty who teach writing include which in their conception: (select all that apply)

- Text
- Links
- Images
- Sounds
- Video

8. At your institution, training with hardware, networks, and software usually includes: (select all that apply)

- None
- College-wide workshops
- Professional conferences (NCTE, CCCC, CW)
- Special events (department workshops)
- Certification programs

9. In your department, what percent of faculty are comfortable and competent at teaching writing with technology? (circle one)

- None
- 50%
- 75%
- 90%
- 100%

10. In your department, the number of students typically assigned in a computers and writing class on the first day is: (circle one)

- 30
- 25
- 20
- 16
- 12