



EXPLORING THE CHARACTERISTICS, ATTRIBUTES, AND PERCEPTIONS OF ONLINE GRADUATE STUDENTS IN CANADIAN HIGHER EDUCATION, AND THE LEADERSHIP IMPLICATIONS

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Summary

Higher education in North America is experiencing change impacted by globalization, evolving economies, emerging technologies, growing populations, and shifting student demographics (Beaudoin, 2007; Duderstadt, 2005; OECD, 2008). This is calling for education that not only addresses market demands, but also is accessible and incorporates technology (Canadian Council on Learning, 2009). To address these changes, mainstream higher education institutions and their leaders must find innovative ways to deliver education, such as with online learning (Conole, 2008). Therefore, the intent of this study is to explore leadership practices for managing online learning programs in mainstream universities. More specifically, this doctoral study examined the characteristics, motivations and perceptions of graduate student who were enrolled in an online academic program in the Graduate Division of Educational Research at the Faculty of Education and University of Calgary in Alberta, Canada. Nearly 140 participants provided feedback about online programs, resources, instruction and instructional design. As well, they provided input on how they learned best online including the supports they needed.

Introduction

Emerging Pressures in Higher Education

The field of higher education in North America is experiencing many changes and educational leaders must look for innovative ways to sustain their organizations while improving access and student experience (Duderstadt, 2005; Freeman & Thomas, 2005). For instance, due to the emergence of a technology- and knowledge-based era more education is needed by a wider array of people (Association of Universities and Colleges in Canada, 2007; Canadian Council on Learning, 2009). As well, governments faced with a globalized world want a skilled workforce to compete with international markets, and to enrich industries with innovation (McIntosh & Varoglu, 2005). Furthermore, those currently

employed need upgraded skills such as information and technology literacy skills, and communication and networking abilities (American Library Association, 2000; Aro & Olkinuora, 2007). As a result of these changes, people are returning to school looking for more education and credentials to secure employment (Bates, 2005; Hanna, 2000).

However, this influx of returning students presents educational leaders with another dilemma - a body of students with a wide range of needs and dissimilar socio-economic backgrounds, ethnicities and previous education (Henshaw, 2008; OECD, 2008). To fulfill these needs, online learning is emerging as a favoured method by allowing for diverse, flexible and accessible education through advanced information, communication, and learning technologies (Anderson, 2008; Hanna, 2000; Howell, Williams & Lindsay, 2003; Marginson & Van Der Wende, 2006; Parchoma, 2006). With online learning students from various backgrounds can access the education they want. Therefore, the intent of this doctoral study is to explore leadership practices for managing online learning programs in mainstream universities.

Literature Review

A number of studies examined the characteristics and motivations of graduate students to determine reasons for their satisfaction and success with online learning.

Student Characteristics and Motivations

It was determined most online graduate student were mainly White, female, married, averaging 40 years old, had high grades, took previous online courses, had strong computer skills, and studied part-time while working fulltime (Bocchi, Eastman & Swift, 2004; Butler, 2004; Colorado, 2006). Motives for students enrolling in online classes were to obtain accreditation or experience personal enrichment; another important reason was online learning was considered more accessible and convenient for learners who had work and family responsibilities (Loeffler, 2005; Mansouri, 2003; Payne & Johnson, 2005; Stewart, 2006). Bird and Morgan (2003) found concerns affecting a decision to enroll online were fear, identity change, home support, academic preparedness, program suitability, and Internet costs.

Perceptions of Online Learning

A number of studies found most participants were satisfied with their online learning experience stating they would take another online course (Beard, Harper & Riley, 2004; Braun, 2008; Butler, 2004; Chang, 2000; Webb, 2002). Most online graduate students enjoyed the flexibility, access and independence of online learning as well as the various communication modes, immediate feedback, and increased technological skills (Arbaugh, 2004; Bowman, 2006; Eom, Ashill & Wen, 2006; Harkins, 2005; Maxfield, 2008). As well, Stewart (2006) and Eom, Ashill and Wen (2006) found participants ranked consistent faculty responses as important factors in their learning. Payne and Johnson (2005) revealed the importance of communication and a supportive network between instructors, fellow classmates, family, friends and co-workers. Ali, Hodson-Carlton and Ryan (2004) found online students wanted to be actively engaged such as with peer collaborations, real life

applications, explorative activities, and resource sharing. Stewart (2006) found participants ranked practical applications of their education important for their learning.

Additionally, studies found graduate students complained about technology problems and the lack of technical support, adding to their frustration when learning online (Beard, Harper & Riley, 2004; Chang, 2000; Muilenburg & Berge, 2005). Some studies found feelings of isolation, using new technologies, and restricted socializing online were barriers for online graduate learners (Coleman, 2005; Mansouri, 2003; Song, Singleton, Hill & Koh, 2004). Webb (2002), Lee (2009) and Turner (2005) found students were dissatisfied with the amount of time spent on online studies, and Maxfield (2008) determined many learners were frustrated with the instructors' poor online skills, lack of course expectations, information overload, impersonal communication, and tardy feedback.

Leadership Issues

Educational leaders felt the pressure of less government support and reduced institutional budgets propelling them to seek new and profitable markets, such as with part-time students, just-in-time professional updating and content markets (Carr-Chellman, 2005; Lai, Pratt & Grant, 2003; Webber, 2008). However, learning online is seen with skepticism in higher education (Blair & Monske, 2003; Hanna, 2000; Parker, 2008). For instance, not all faculty members at universities embrace online learning creating tension and uneven participation (Hanna, 2000; Henshaw, 2008; Webber, 2008). As well, faculty felt isolated, unsupported and demoralized when trying to integrate technology and their personal pedagogy; they experienced barriers to being innovative due to poor technical infrastructures, high workloads, insufficient rewards systems, unsupportive leadership, deficient policies and belittled teaching values (de la Harpe & Radloff, 2008; Georgina & Olson, 2008; Romiszowski, 2005).

Furthermore, the bureaucratic system, heavily governed, is slow to respond to innovation and difficult to navigate with its many layers of governance (Murray, 2008). Additionally, delivering learning online is costly with its changes to programs concerning leaders about the return on investment (Bates, 2005). As well, the credibility of online programs was an issue, and Adams (2008) found that employers and university administrators preferred hiring people with traditional degrees than those with degrees from online programs. They tended to see face-to-face instruction and mentoring as part of quality education, which they perceived online learning did not provide.

Leadership Strategies

Key considerations for educational leaders implementing online learning are:

- Assessing the needs and characteristics of students, and the reasons they enroll in online programs (Altarac, 2007).
- Developing infrastructures, such as course management systems, administrative systems, and online learning resources (Camp & DeBlois, 2007).
- Ensuring online student services are available such as access to program information and admissions as well as orientations, training and supports for technology (Turner, 2005; Young & Norgard, 2006).

- Creating stable and scalable programs that are integrated with other systems such as student information and registration (Otte & Benke, 2006).
- Designing online programs with a focus on critical pedagogical issues (Levy, 2003).
- Managing and retaining qualified instructional staff, technical and administrative staff, and instructional designers (Georgina & Olson, 2008).
- Arranging faculty training, mentoring and support, with a focus on instructional strategies and effective technology use (Grant, 2004; Lewis, 2007).
- Evaluating online programs to see if student needs are being met (McKenzie, Özkan & Layton, 2005).

Also, some institutions are shifting to a business model and opening themselves to investors and partnerships from other organizations who can share the costs, resources and tasks for implementing education online (Camp & DeBlois, 2007; King, 2008; OECD, 2008; Winkler, 2008). However, this model is said to threaten the core values of traditional institutions by focusing on the wrong places when making decisions and policies (Rhoades, 2003; Slaughter & Leslie, 1997).

Methodology

This doctoral research was designed as a case study to examine the uniqueness and complexity of a single case (Stake, 1995). The case in this study was a collection of graduate students within a particular context for the purpose of examining their characteristics and motives together with their perceptions of online learning. The results informed leaders who manage online learning programs in mainstream universities.

Participants were selected from a group of graduate students enrolled in online certificate, diploma and degree programs within the Graduate Division of Educational Research in the Faculty of Education at the University of Calgary. In this division there were five graduate degree programs and 11 program specializations. Each degree was taught on campus or online, with students choosing the format to pursue. Furthermore, the University of Calgary had an extensive online library resource, with over 20,000 e-journal subscriptions and over 26,000 digitized books as well as online services such as access to the University bookstore, information technology services, and the Faculty of Graduate Studies.

Data Collection

The first stage of the study entailed gathering characteristic data and perceptions through a web-based survey from 138 graduate student participants. The second stage of the study interviewed 20 of these participants through focus groups to gather and examine perspectives on the benefits and challenges of online learning as well as implications for leaders (Vaughn, Schumm & Sinagub, 1996). Third, from the same survey sample, 15 participants were interviewed individually to gain a deeper understanding of their characteristics as well as their motivations and goals for pursuing online learning.

Data Analysis

After each collection stage, qualitative data was inductively analyzed for emerging themes (Glesne, 1999). As well, the quantitative data from the survey responses were analyzed

statistically to reveal the frequency of responses (Gorard, 2001). With a tri-phased study the analysis of each stage of data revealed emerging themes and patterns, which were used in the inquiry of the next stage leading to deeper analysis (Creswell, 2003). A final analysis of data from all three stages was performed deductively drawing on a developed analytical framework representing emerging themes (Miles & Huberman, 1994). Triangulating the sets of data revealed different aspects of the same reality. As well, triangulation tested for consistency among data, and at the same time illuminated inconsistencies which provided an opportunity for deeper insight (Patton, 2002).

Findings

Personal Characteristics

Participants were mostly middle aged, female, and married. They might have been a parent. Their ethnicity was probably North American, and they lived in an urban or rural setting. They most likely worked full-time for over 30 hours a week, and in the field of education. They could be a part-time or full-time student, and probably were pursuing a Masters of Education degree. They would have been in the degree program for 2 or less years, and have a high grade point average. They might have aspirations to pursue a doctorate. It probably had been over seven years since they were in a formal degree program, and they would have taken more than four fully online courses. Their technical and information literacy skills were adequate enough to manage online learning. Overall, they could find, decipher and store information, and could manage computer-based and web-based technologies, though more skills and support were needed.

Online Characteristics

Participants were very busy adults in high-end careers, with some managing online learning in their workplace. They had full lives with many life and work responsibilities that demanded their time. They were self-disciplined. Considering their demands they still managed an average of 20 hours of course work each week, split between online and offline tasks. They worked online at home after dinner most nights, and on the weekend. Yet, participants still hesitated to enroll in online learning. Logistically, they were concerned with the program's cost and credibility. Personally, they were uncertain how to learn online or feared they lacked the necessary technical skills. Those with low levels of technology literacy skills intentionally formed support systems at work and home. Also, as adult learners, they needed some accommodations. For instance, they needed more choice in learning activities. As well, participants expected the instructor to know their learning style and needs.

Perceptions of Online Learning

Patterns in the data revealed participants were concerned with how their education was delivered online. They wanted instructors, course designers and administrators to use strategies applicable to an online environment. As well, participants were interested in essential supports for distance learners, such as people who could help online students including instructors, resource staff, administration, and fellow classmates. Many participants stated the need for instructors to be present and engaged to enhance their learning online. As well, engagement became a critical point as participants repeatedly spoke about the

importance of having an online community and effective communication. In short, participants wanted to be enticed to engage in the online environment.

Informing the design and pedagogy of online learning environments were student differences, or diversities, as revealed through the data on student characteristics. In this study, participants wanted the uniqueness of their characteristics and the online environment to inform online teaching, learning and design. Basically, participants wanted to succeed in their studies online and needed to be given the best learning environment, resources, support and leadership to do so. They also wanted the creative space to produce their work.

Discussion and Implications

The findings imply there is a need for flexible online learning programs, and the demand can be expected to grow (Bates, 2008; Hanna, 2000; King, 2008; OECD, 2008; Statistics Canada, 2007). This group of learners understood quality and had high expectations about their learning experience (Ruth, Sammons & Poulin, 2007). Specifically, they wanted a structured learning environment with just-in-time support and resources in order to learn what and when they needed implying the importance of strategic instructional and curriculum design. Also, considering the range of technology and literacy skill levels of participants there is a need for more support and training that is tailored to online students to ensure their success (Ivankova, 2004; Pival, Lock & Hunter, 2008).

There were concerns about the credibility with online programs and students ability to work in a technical environment (Adams, 2008). Perhaps the best way to deal with these concerns is to have students assessed for readiness, and provided information and orientation sessions before they enroll in an online program (Turner, 2005; Young & Norgard, 2006). As well, most participants wanted the instructor to be more involved, consider online pedagogy in instruction and curriculum design, and lead learners online. This is a tall order for instructors. Thus, significant support and training is needed for online instructors who design and deliver online courses. As well, it might take a team to educate an online learner rather than unnecessarily burdening instructors.

Additionally, these findings implied that online learners are seeking different communities (Martin & Woods, 2008), and using technologies such as social software could be a solution to connect the various parties and networks (Anderson, 2008). These networks could be learner driven. Also, online programs need to consider more advanced communication technologies, such as video conferencing and other Web-based communication software, to satisfy the constant request for live interaction.

It is becoming apparent the design of a quality online learning environment is paramount for distance learners. However, many institutions do not have policies, guidelines or significant support for online learning as with effective instructional design guidelines or teams of experts in design and technology (Tallent-Runnels, Thomas, Lan & Cooper, 2006). More important, the diverse characteristics and needs of learners need to be considered in program and curriculum design. Assessing students and conducting program evaluations would provide the best information for this.

More so, with its growing popularity, online learning needs to be addressed on an institutional-wide basis calling for new visions, metapolicies and effective support and infrastructures (De Castro, 1999; Hanna, 2000; Otte and Benke, 2006).

References

- Adams, J. (2008). Understanding the factors limiting the acceptability of online courses and degrees. *International Journal on E-Learning*, 7(4), 573-587.
- Ali, N. S., Hodson-Carlton, K., & Ryan, M. (2004). Students' perceptions of online learning: Implications for teaching. *Nurse Educator*, 29(3), 111-115.
- Altarac, A. (2007). Online degree program choice: School characteristics that influence students' online degree program choice (Doctoral dissertation, Touro University International, 2007). *Dissertation Abstracts International*, DAI-A 68/11.
- Anderson, T. (2008). Introduction. In T. Anderson (Ed.), *The theory and practice of online learning* (2nd ed., pp. 1-11). Edmonton, Alberta: AU Press.
- Arbaugh, J. B. (2004). Learning to learn online: A study of perceptual changes between multiple online course experiences. *Internet and Higher Education*, 7, 169-182.
- Aro, M., & Olkinuora, E. (2007). Riding the information highway: Towards a new kind of learning. *International Journal of Lifelong Education*, 26(4), 385-398.
- Association of College And Research Libraries. (2000). *Information literacy competency standards for higher education*. Retrieved April 10, 2008, from American Library Association Web site: <http://www.ala.org/ala/mgrps/divs/acrl/standards/informationliteracycompetency.cfm>
- Association of Universities and Colleges of Canada (2007). *Trends in higher education: Volume 1. Enrolment*. Ottawa, Ontario: The Association of Universities and Colleges of Canada.
- Bates, A. W. (2005). *Technology, e-learning and distance education* (2nd ed.). New York: Routledge.
- Beard, L. A., Harper, C., & Riley, G. (2004). Online versus on-campus instruction: Student attitudes & perceptions. *TechTrends*, 48(6), 29-31.
- Beaudoin, M. F. (2007). Institutional leadership. In M. G. Moore (Ed.), *Handbook of distance education* (2nd ed., pp. 391-402). Mahwah, New Jersey: Lawrence Erlbaum.
- Bird, J., & Morgan, C. (2003). Adults contemplating university study at a distance: Issues, themes and concerns. *International Review of Research in Open and Distance Learning*, 4(1). Retrieved from <http://www.irrodl.org/index.php/irrodl/article/view/130>
- Bocchi, J., Eastman, J., & Swift, C. O. (2004). Retaining the online learner: Profile of students in an online MBA program and implications for teaching them. *Journal of Education for Business*, 79(4), 245-253.
- Bowman, C. W. (2006). The perceived effectiveness of online web-based distance education: A case study (Doctoral dissertation, New Mexico State University, 2006). *Dissertation Abstracts International*, DAI-A 67/05.
- Braun, T. (2008). Making a choice: the perceptions and attitudes of online graduate students. *Journal of Technology and Teacher Education*, 16(1), 63-92.
- Butler, T. J. (2004). Students' learning styles and their preferences for online instructional methods (Doctoral dissertation, Seton Hall University, 2004). *Dissertation Abstracts International*, 65/04, 1758.
- Camp, J. S., & DeBlois, P. B. (2007). Current issues survey report 2007. *Educause quarterly*, 30(2), 12-31.

- Canadian Council on Learning (2009). *Post-secondary education in Canada: Meeting our needs?* (). Washington, DC: U.S. Government Printing Office. Retrieved March 1, 2009, from http://www.ccl-cca.ca/pdfs/PSE/2009/PSE2008_English.pdf
- Carr-Chellman, A. A. (2005). Introduction. In A. A. Carr-Chellman (Ed.), *Global perspectives on e-learning: Rhetoric and reality* (pp. 1-16). Thousand Oaks: Sage.
- Chang, C. (2000). The effects of attitude and self-efficacy on college student performance in online instruction (Doctoral dissertation, University of Kansas, 2000). *Dissertation Abstracts International, DAI-A 61/11*, 4347.
- Coleman, E. (2005). Barriers and challenges experienced by learners in a web-based Masters of Education program (Doctoral dissertation, Memorial University of Newfoundland, 2005). *Dissertation Abstracts International, 43/05*, 1500.
- Colorado, J. T. (2006). The relationship of self-regulated learning and academic performance in an online course environment (Doctoral dissertation, University of Kansas, 2006). *Dissertation Abstracts International, 67/02*.
- Creswell, J. W. (2003). *Research design: Qualitative, quantitative, and mixed methods approaches* (2nd ed.). Thousand Oaks: Sage.
- De La Harpe, B., & Radloff, A. (2008). Institutional support for quality learning and teaching. In S. Scott & K. Dixon (Eds.), *The globalised university - Trends and challenges in teaching and learning*. Perth: Black Swan.
- DeCastro, C. M. (1999). An analysis of the perceptions of community college leaders regarding good practices of distance education at New Jersey community colleges (Doctoral dissertation, University of Sarasota, 1999). *Dissertation Abstracts International, 60/02*, 317.
- Duderstadt, J. J. (2005, March 8). *The future of the university: A perspective from the Oort cloud*. Retrieved April 10, 2005, from University of Michigan Web Site: http://milproj.ummu.umich.edu/ouublications/futurist_forum/index.html.
- Eom, S. B., Ashill, N., & Wen, H. J. (2006). The determinants of students' perceived learning outcomes and satisfaction in university online education: An empirical investigation. *Decision Sciences Journal of Innovative Education, 4(2)*, 215-235.
- Freeman, I., & Thomas, M. (2005). Consumerism in education: A comparison between Canada and the United Kingdom. *The International Journal of Educational Management, 19(2)*, 153-177.
- Georgina, D. A., & Olson, M. R. (2008). Integration of technology in higher education: A review of faculty self-perceptions. *The Internet and Higher Education, 11(1)*, 1-8.
- Glesne, C. (1999). *Becoming qualitative researchers: An introduction* (2nd ed.). New York: Addison Wesley.
- Gorard, S. (2001). *Quantitative methods in educational research*. New York: Continuum.
- Grant, M. M. (2004). Learning to teach with the web: Factors influencing teacher education faculty. *Internet and Higher Education, 7*, 329-341.
- Hanna, D. E. (2000). *Higher education in an era of digital competition: Choices and challenges*. Madison, WI: Atwood.
- Harkins, C. G. (2005). Online education in the College of Education and human service professions: Assessment of quality benchmarks (Doctoral dissertation, University of Minnesota, 2005). *Dissertation Abstracts International, DAI-A 66/04*.
- Henshaw, B. (2008). A singular vision for a disparate future: Technology adoption patterns in higher learning through 2035. *Journal of online Education, 4(5)*.

- Howell, S. L., Williams, P. B., & Lindsay, N. K. (2003). *Thirty-two trends affecting distance education: An informed foundation for strategic planning*. Retrieved March 25, 2007, from State University of West Georgia Web Site: <http://www.westga.edu/~distance/ojdla/fall2003/howell63.html>
- Ivankova, N. V. (2004). Students' persistence in the University of Nebraska-Lincoln Distributed Doctoral Program in Educational Leadership in Higher Education: A mixed methods study (Doctoral dissertation, University of Nebraska, 2004). *Dissertation Abstracts International, DAI-A 65/04*, 1196.
- K, S. Lee (2009). Listening to students: Investigating the effectiveness of an online graduate teaching strategies course. *Journal of online Learning and Teaching, 5*(1), 72-87.
- King, C. (2008). *Part-time study in higher education* (Secretary of State for Innovation, Universities and Skills, UK). Washington, DC: U.S. Government Printing Office.
- Lai, K., Pratt, K., & Grant, A. (2003). State of the art and trends in distance, flexible, and open learning. *University of Otago*.
- Lewis, T. O. (2007). The preparation of faculty to teach online: A qualitative approach (Doctoral dissertation, Virginia Polytechnic Institute, 2007). *Dissertation Abstracts International, DAI-A 68/03*.
- Loeffler, C. A. (2005). The relationship of adult learning styles and perceived factors involved in online graduate education leadership programs (Doctoral dissertation, Sam Houston State University, 2005). *Dissertation Abstracts International, 66/04*, 1244.
- Mansouri, M. (2003). Perceptions of first-time participants in a state-agency-sponsored online graduate program and their implications for online education planning, development and support (Doctoral dissertation, Virginia Commonwealth University, 2003). *Dissertation Abstracts International, 61/01*, 59.
- Marginson, S., & Van Der Wende, M. (2006, May). *Globalisation & higher education*. Paper presented at the meeting of the OECD/CERI Expert meeting on "Globalisation, Market Forces and the Future of Higher Education". Lisbon, Portugal.
- Martin, D. L., & Woods, A. (2008). *A tale of two communities: How online programs can support the diverse needs of commencing and competing PhD candidates*. Paper presented at the meeting of the Faculty of Education: Emerging Technologies Conference 2008. University of Wollongong.
- Maxfield, R. J. (2008). Online education for nontraditional adult students: Perceptions and attitudes of emergency services workers in asynchronous learning environments. *Graduate Theses and Dissertations: Utah State University*.
- McIntosh, C., & Varoglu, Z. (2005). *Perspectives on distance education: Lifelong learning and distance*. Washington, DC: U.S. Government Printing Office.
- McKenzie, B., Okkan, B., & Layton, K. (2005). Distance leadership practices: What works in higher education. *Proceedings of World Conference on E-Learning in Corporate, Government, Healthcare, and Higher Education, 2005*, 926-931.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis* (2nd ed.). Thousand Oaks, CA: Sage.
- Muilenburg, L. Y., & Berge, Z. L. (2005). Student barriers to online learning: A factor analytic study. *Distance Education, 26*(1), 29-48.
- Murray, G. (2008). On the cutting edge (of Torpor): Innovation and the pace of change in American higher education. *AACE Journal, 16*(1), 47-61.
- OECD. (2008). *Tertiary education for the knowledge society - Volume 1*.
- Otte, G., & Benke, M. (2006). Online learning: New models for leadership and organization in higher. *Journal of Asynchronous Learning Networks, 10*(2), 23-31.

- Parchoma, G. (2006). A proposed e-learning policy field for the academy. *International Journal of Teaching and Learning in Higher Education*, 18(3), 230-240.
- Parker, N. K. (2008). The quality dilemma in online education revisited. In T. Anderson (Ed.), *The theory and practice of online learning* (2nd ed., pp. 305-340). Edmonton, Alberta: AU Press.
- Patton, M. Q. (2002). *Qualitative research & evaluation methods* (3rd ed.). Thousand Oaks: Sage.
- Payne, D. A., & Johnson, J. M. (2005). Succeeding in graduate school online: Tips from successful students. *College Student Journal*, 39(1), 117-128.
- Pival, P. R., Lock, J. V., & Hunter, M. (2008). Assessing research readiness of graduate students in distance programs. *Public Services Quarterly*, 3(3&4), 1-18.
- Rhoades, G. (2003). Democracy and capitalism, academic style: Governance in contemporary higher education. *Center for Higher Education Policy*. Retrieved September 18, 2007, from ERIC database (ED482063).
- Romiszwowski, A. J. (2005). Online learning: Are we on the right track(s)? In G. Kearsley (Ed.), *Online learning: Personal reflections on the transformation of education* (pp. 321-349). Englewood Cliffs, NJ: Educational Technology Publications.
- Ruth, S. R., Sammons, M., & Poulin, L. (2007). E-learning at the crossroads: What price quality? *Educause quarterly*, 30(2), 32-39.
- Slaughter, S., & Leslie, L. L. (1997). *Academic capitalism: Politics, policies, and the entrepreneurial university*. Baltimore: John Hopkins University Press.
- Song, L., Singleton, E. S., Hill, J. R., & Koh, M. H. (2004). Improving online learning: Student perceptions of useful and challenging characteristics. *Internet & Higher Education*, 7(1), 59-71.
- Stake, R. E. (1995). *The art of case study research*. Thousand Oaks: Sage.
- Statistics Canada. (30). *Earning online: Factors associated with use of the Internet for education purposes*. Retrieved January 23, 2009, from Government of Canada Web site: <http://www.statcan.gc.ca/pub/81-004-x/2007004/10375-eng.htm>
- Stewart, C. K. (2006). The influence of learning style on student satisfaction in online versus traditional learning environments (Doctoral dissertation, University of Louisville, 2006). *Dissertation Abstracts International*, 67/03.
- Tallent-Runnels, M. K., Thomas, J. A., Lan, W. Y., Cooper, S., Ahern, T. C., Shaw, S. M., et al. (2006). Teaching courses online: A review of the research. *Review of Educational Research*, 76(1), 93-135.
- Turner, C. W. (2005). Voices of faculty and students: Exploring distance education at a state university (Doctoral dissertation, New Mexico State University, 2005). *Dissertation Abstracts International*, DAI-A 66/07, 2551.
- Vaughn, S., Schumm, J. S., & Sinagub, J. (1996). *Focus group interviews in education and psychology*. Thousand Oaks, CA: Sage.
- Webb, L. (2002). An examination of adult learning style preference and perceived effectiveness of web-based courses (Doctoral dissertation, University of Idaho, 2002). *Dissertation Abstracts International*, 62/10, 3269.
- Webber, C. F. (2008). Leadership that supports positive educational change. In S. Scott & K. Dixon (Eds.), *The globalised university - Trends and challenges in teaching and learning*. Perth: Black Swan.
- Winkler, G. (2008). *The governance of European universities post 2010 (11): Enhancing institutional mission and profiles*. Paper presented at the meeting of the EUA Spring Conference. Barcelona, Spain.

Young, A., & Norgard, C. (2006). Assessing the quality of online courses from the students' perspective. *Internet and Higher Education*, 9, 107–115.