

## Chapter 7.3

# Integrating Culture with E-Learning Management System Design

**Ray Archee**

*University of Western Sydney, Australia*

**Myra Gurney**

*University of Western Sydney, Australia*

### EXECUTIVE SUMMARY

*Although it is a legal requirement of all organizations to permit sensorially, cognitively, and physically disabled persons equitable access to public website information, cultural factors are seldom considered as important in the design of online information content. But many tertiary institutions have a highly diverse, multicultural student body whose learning needs require special attention. Usually, instructors transform existing lectures and exercises, then adds links, and discussions to create Web-supported units, but without any real understanding of possible cultural artifacts or inherent limitations of their online interfaces. This study reports on the results of an action research study whereby students were asked to comment on their preferences for three uniquely different purpose-built WebCT pages which comprised near-identical content. The students showed a definite preference for a sparse, menu-driven webpages as opposed to a colorful, congested, all-in-one interface, or the bare-bones WebCT interface.*

### ORGANIZATION BACKGROUND

The University of Western Sydney is a large multi-campus metropolitan university. The campus involved in the study is located on the outskirts of Sydney and comprises students who come

from highly diverse multicultural backgrounds. *Communication Research* is a core unit in the UWS Bachelor of Communication program taught by the School of Communication Arts. The unit introduces the modern process of communication research including critical review of research literature, argument and logic, data

DOI: 10.4018/978-1-4666-0011-9.ch7.3

collection and analysis by Statistical Package for the Social Sciences (SPSS), writing the research report and research ethics. The unit is taught in a blended-learning environment, wholly within the university's computer labs. Students attend a two-hour, weekly workshop where course activities and material are situated within a specially-designed web page accessed from WebCT, and after initial instruction and discussion, work online with assistance from their tutor. Some activities are designed to be done in class with face-to-face instruction and support, while others can be completed in the student's own time.

### **Setting the Stage**

Over the past decade, e-learning has increasingly become a standard way of supporting students within higher education and in some cases, the sole method of instruction (Lee & Nguyen, 2007). While not always as attractive as traditional face-to-face instruction, e-learning does suit those students who prefer to work and study. Significantly, as cash-strapped tertiary institutions seek to broaden their market overseas, e-learning is being used with an ever-increasing proportion of students who originate from non-English speaking cultures.

Concomitant financial pressure from diminishing University funding has also driven the search for more efficient methods of course delivery. Thus course management systems such as WebCT, Blackboard, TopClass and Moodle have been widely embraced to provide easy, user-friendly ways of providing online material for tertiary students. At the University of Western Sydney, the most recent figures on the coverage of WebCT, show that more than 93% of units taught have an e-learning presence, with 1,800 staff who have sites set up for the purposes of supporting teaching and learning and that 35,000 students access these sites for their coursework (Rankine, 2009). Additionally, a 2009 UWS publication notes that the university is unique in the size, range and

diversity of its student population, with cultural diversity being one of the more notable differences between UWS and other Sydney-based tertiary institutions. According to *Teaching@UWS 2009*:

In 2007, the domestic student cohort background represented more than 160 countries. One third of these domestic students were born overseas. International students were drawn from more than 100 countries and represented 11% of the University's total student population. Ten percent (10%) of the international students are studying offshore. (p. 7)

### **Adapting New Technologies for Multicultural Audiences**

An unrecognized problem with using standardized methods of creating online materials is the issue of *accessibility* for a widely divergent student cohort – *cultural* accessibility being one of the most important. The evolution of the Web from a text-based medium to an interactive, multimedia platform has created the need to consider the audience of websites in more sophisticated and nuanced ways. The ability to include an increasing array of platforms such as Flash/Shockwave, video, sound and animation, have brought about both new potentials in web communication as well as new problems. Just as certain website designs may mitigate against users who are sensorially, cognitively or physically disabled (see Dey, 2002 for an accessibility audit of WebCT), websites may also varyingly attract or repulse some cultures more than others. Cultural accessibility is a website's potential to attract, to be understood, or to be used by members of other cultures. According to Wurtz (2005)

Cross-cultural web design nowadays requires dealing with design issues that include culture-specific color connotations, preferences in layout, animation, sounds, and other effects that are characteristic of today's generation of websites. (p. 2)

While intercultural communication has been the subject of hundreds of articles and books for

15 more pages are available in the full version of this document, which may be purchased using the "Add to Cart" button on the publisher's webpage:

[www.igi-global.com/chapter/integrating-culture-learning-management-system/63199](http://www.igi-global.com/chapter/integrating-culture-learning-management-system/63199)

## Related Content

---

### Virtual Learning Environments. The oLTECx: A Study of Participant Attitudes and Experiences

Adriana D'Alba, Anjum Najmi, Jonathan Gratchand Chris Bigenho (2013). *Design, Utilization, and Analysis of Simulations and Game-Based Educational Worlds* (pp. 35-50).

[www.irma-international.org/chapter/virtual-learning-environments-oltec/75723](http://www.irma-international.org/chapter/virtual-learning-environments-oltec/75723)

### The ScavengAR Hunt: An Augmented Reality Teacher Training Case Study Using Mobile Devices

Daniel Watanabe (2020). *Mobile Devices in Education: Breakthroughs in Research and Practice* (pp. 999-1021).

[www.irma-international.org/chapter/the-scamengar-hunt/242658](http://www.irma-international.org/chapter/the-scamengar-hunt/242658)

### Factors Affecting Development of Communities in 3D Immersive Learning Environments

Terry McClannon, Robert Sanders, Amy Cheney, Les Boltand Krista Terry (2013). *International Journal of Virtual and Personal Learning Environments* (pp. 18-34).

[www.irma-international.org/article/factors-affecting-development-of-communities-in-3d-immersive-learning-environments/95161](http://www.irma-international.org/article/factors-affecting-development-of-communities-in-3d-immersive-learning-environments/95161)

### The Creation of a Theoretical Framework for Avatar Creation and Revision

Dennis Beckand Cheryl Murphy (2014). *International Journal of Virtual and Personal Learning Environments* (pp. 1-17).

[www.irma-international.org/article/the-creation-of-a-theoretical-framework-for-avatar-creation-and-revision/132854](http://www.irma-international.org/article/the-creation-of-a-theoretical-framework-for-avatar-creation-and-revision/132854)

### Reflection and Intellectual Amplification in Online Communities of Collaborative Learning

Elsebeth Korsgaard Sorensen (2004). *Online Collaborative Learning: Theory and Practice* (pp. 242-261).

[www.irma-international.org/chapter/reflection-intellectual-amplification-online-communities/27725](http://www.irma-international.org/chapter/reflection-intellectual-amplification-online-communities/27725)