Chapter 4
Building Mobile Social Presence for U-Learning

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ABSTRACT

Mobile learning environments are human networks that afford learners the opportunity to participate in creative endeavors, social networking, organize and reorganize social contents, learner-created cognitive space, and manage social acts anytime and anywhere through mobile technologies. Social interaction with mobile technology is very different from Computer-Mediated Communication (CMC) or Web 2.0 networking technologies. Effective mobile interaction focuses on social-context awareness by integrating location-based technology, which is unique to mobile technology, not easily found in other types of commuting. This chapter proposes a model for mobile social presence consisting of four dimensions: enriching social context-awareness, managing location-based communication, personalizing multi-layered interactivity, and optimizing digital and social identities. Under each dimension there are a few suggested strategies or tips to assist educators in integrating them into their mobile instructions to enhance the mobile-social presence of learners.

INTRODUCTION

Mobile learning environments are human networks that afford learners the opportunity to participate in creative endeavors, social networking, organize and reorganize social contents, learner-created cognitive space (Cornelius & Marston, 2009), and manage social acts at anytime and anywhere through mobile technologies. Social acts that elicit identities, develop awareness (Kekwaletswe, 2007), cement relationships, ensure connections, and promote interactions between and among learners are necessary for interactive learning.

Rather than seeing students' mobile devices as a distracting technology, perhaps teachers can transform mobile devices into learning devices and learning tools. Since we may not have resources to provide each student with a computer. Even if we could, computers are not personalized enough, and are not context specific enough, and are not

easily mobilized to enhance learning in disruptive and innovative ways, when compared too mobile technology.

Social interaction with mobile technology is very different from Computer Mediated Communication (CMC) or Web 2.0 networking technologies. Researchers (Koole et al., 2010) are aware of mobile technology and that through human interaction on mobile technology both the user and the technology are shaping each other. Mobile technology connects learners virtually anytime and anywhere while mobile learners utilize it in fairly non-traditional ways to interact with each other (Kukulska-Hulme & Traxler, 2007), such as location-based technology and Augmented Reality (AR) etc. Research has shown that mobile technology has impacted human social relationships (Jones & Issroff, 2007) and interaction both positively and negatively (Rau et al., 2008). Mobile learning is more than just integrating mobile devices and mobile technologies. Mobile learning from an instruction aspect should be integrated from four dimensions: Technology mobile, Learners mobile, Teachers mobile and Instructions mobile.

Mobile social interaction should not just integrate mobile technologies to replicate digital social interaction on computers. Effective mobile interaction is more than a replication of desktop and laptop computing. Effective mobile interaction focuses on social-context awareness by integrating location-based technology, which is unique to mobile technology, not easily found in other types of commuting. With the features of location-based technology or Global Position System (GPS), mobile learners are able to obtain and to enrich their learning context. For example, with these technologies, learners can access online information specifically related to their current location with mobile devices; learners can access their social network friends who are nearby to collaborate their learning tasks; or learners can record the data, such as photos, audio, video, environmental data etc., with embedded geo-location

data layer as their learning content and resources. Effective mobile learning design is able to fulfill learning in a more ubiquitous manner, with richer social awareness that is more personalized, and with more meaningful contexts.

MOBILE SOCIAL PRESENCE

Online social presence could be a critical factor to the understanding of social interaction in mobile learning environments. Although Shin & Lowes (2007) preliminarily concluded that active network users did not demonstrate higher social presence in online discussion. Boulos, & Wheelert (2007) & Dunlap & Lowenthal (2009) argued that social network technologies would positively relate to online immediacy and presence. Online social presence should not be overlooked when one ponders integrating mobile learning environments to improve socio-cultural learning.

Online social presence is the degree of feeling, perception, and reaction of being connected by computer-mediated communication (CMC) to another intellectual entity through electronic media (Tu & McIsaac, 2002) and is explained from four dimensions, social context, online community, interactivity, and privacy. Network social presence (Tu, Yen, Blocher, & Chan, 2012) is defined as the degree that network participants engage in creating, maintaining, sharing, connecting social content, digital and social identities, network linkages, and collaborative community.

Mobile social presence is different from online social presence and network social presence in the aspects of control, context-awareness, multi-layers, and location-free digital interactions (Tu, McIsaac, Sujo-Montes, & Armfield, 2012). Mobile social presence is defined as the degree of enriching social context-awareness, managing location-based communication, personalizing multi-layered interactivity, and optimizing digital and social identities to other intellectual beings through mobile technologies (See Figure 1). Mo-

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