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ABSTRACT
                Advanced technologies are changing the way teaching and
learning are conducted and experienced in the world of distance education.
Network environments such as the Internet have formed a new virtual education
world for online learners. In distance education, the instructor and learner
are physically separated. Interactivity is an important part of distance
education. Social constructivists believe that knowledge is constructed
through social interaction and collaboration with others. For Dewey (1916),
the moral and the social quality of conduct are identical. The purpose of
this paper is to analyze social and moral issues in the virtual education
environment. Highlights of the discussion include: social context in virtual
learning environments; moral context in the virtual learning environment;
humanity and isolation; sharing and exchanging information; civility; and
computer ethics. (Contains 35 references.) (AEF)

Discovering Social and Moral Context in Virtual Educational World

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Abstract

Advanced technologies are changing the way teaching and learning in the virtual educational world. Computer networks have been widely applied in distance education. As a consequence, it forms a virtual educational world. However, some educators are interested in the validity and quality of this virtual learning. This paper attempts to analyze the social and moral issues in the virtual educational environment.

Keywords: distance education, virtual educational world, Internet, Constructivism

Introduction

For Dewey, a situation represents the experiences of the environment affecting the learners and interaction takes place between the learner and his or her environment (Ornstein & Hunkins, 1998). Recently, computer-based technology has been widely applied in education. Especially, network environments such as the Internet have formed a new virtual education world for online learners. Lundin (1998) defined virtual as "the specific term used to describe the various worlds, locations, and processes on the Internet" (p.61). Moreover, online includes virtual educational enterprises, virtual classrooms, virtual learning programs, and virtual textbooks (Lundin, 1998).

The Internet provides rich information to distance learners who are not readily available in textbooks or instructors lectures. Learners can access information and resources from around the world via the Internet. By using e-mail, listservs and newsgroups, the Internet can be interactive and collaborative learning in nature for the exchange of knowledge, ideas, and perspectives in the virtual educational world (Daugherty& Funke, 1998). Daugherty and Funke (1998) noted that "the information is usually current, presented in meaningful contexts, and affords students the opportunity to explore more widely a topic, interest, or fact."(p.22) However, Lundin (1998) has argued "if the learner attends a virtual educational institution, uses virtual libraries and virtual textbooks, communicates with instructors and students in a virtual class, and obtains a virtual academic award, how real and valid is the learning experience?" (p. 56)

The geographical or physical separation between the instructor and learners is the basic design of distance education. Recently, many educators have applied the Internet as

the instructional media for distance education. Moore and Kearsley (1996) proposed that quality assurance is a main function of administration in distance education. Student achievement, student satisfaction, faculty satisfaction, and course materials can be evaluated for quality in distance education.

Goodwin (1993) found that learners and faculty perceived the Internet as an appropriate delivery method for higher education and perceived online learning as a successful academic program. Students perceived that they had attained a comparable academic achievement via the online program (Goodwin, 1993; Clarke, 1999; Russell, 1999; Schulman & Sims, 1999). Nnazor (1998) found that faculty had a positive attitude towards the use of the technology in teaching. In addition, students reported higher learning achievements in those distance education situations, which strongly emphasized online discussion (Jlang, 1998). Moreover, "computers differ from all previous electronic innovations in one important respect: they can be highly interactive" (Maddux, Johnson, & Willis, p.9). Even though there are no significant differences in most research on academic achievements, educators still concerned about the social and moral issues in the virtual educational world.

Social context in virtual learning environments

Since individual learning at a distance is a basic design of distance education, the physical separation between the instructor and learners (or learners and learners) always exists. Faculty concerned with the quality of the teaching and learning process, especially, the degree of interactivity inherent in distance education (Daugherty & Funke, 1998). For faculty, teaching distance education courses must spend a lot of time on planning the

course structure (Gosmire, 1995; Wilson,Litle, Coleman, Gallagher,1997-98). Since distance education can not offer face-to-face instruction as the traditional classroom does, interactivity is a significant dimension of distance education, (Comeaux, 1995; Gosmire, 1995; McHenry & Bozik, 1995; McDonald & Gibson, 1998).

Many distance educators attempt to use such advanced technologies as the Internet to improve the interaction in distance learning, since postal correspondence and televised programs can not provide two way communications. However, Kearsley(1998) noted that distance education was really about creating a different kind of structure for learning and teaching, not only the use of advanced technology. For Spitzer(1998), some distance educators don't recognize that technology and social context are equally important for distance learning. Moore (1991) proposed that

> The extent and nature of this interaction is determined by the educational
> philosophy of the individual or group responsible for the design of the course, by the
> personalities of teacher and learner, by the subject matter of the course, and by
> environmental factors. (p. 3)

Moore and Kearsley (1996) noted that the most important environmental factor for interaction is the medium of communication. Successful interaction in distance education is highly dependent on how comfortable the learner feels in working with the delivery medium (Hillman,Willis & Gunawardena,1994). Foreign students usually feel more comfortable and engage in more interactions with a text-based, asynchronous electronic conversation medium such as e-mail. The existence and size of a learning group was one of the important environmental factors to affect interaction. Another environmental factor influencing interaction was language because learners working in a foreign language

seem to interact less with an instructor than those who share the same language with the instructor (Moore & Kearsley, 1996).

Constructivists such as Vygotsky and Dewey believed that learners do not learn in isolation from others and cognitive psychology has gradually established that people naturally learn and work collaboratively in their lives (Pegraglia, 1998). For Dewey, development of experience comes through interaction. Vygotsky emphasized the importance of the sociocultural context in which learning takes place and how the context has an impact on what is learned (Vygotsky, 1978). Vygotsky viewed education as a profoundly social process, emphasizing dialogue and the varied roles that it plays in instruction and in mediated cognitive growth (Vygotsky, 1978).

For Vygotsky, the culture gives the learner the cognitive tools needed for development. Dewey and Piaget believed that the educator's role involves the shaping of learners' real experience from the environment and knowing what surroundings tend to promote experiences that lead to growth (Ornstein &Hunkins, 1998).

For Bruner (1996),

Passing on knowledge and skill, like any human exchange, involves a subcommunity in interaction. At the minimum, it involves a 'teacher' and a 'learner' or if not a teacher in flesh and blood, then a vicarious one, like a book, or film or display, or a 'responsive' computer (p. 20).

Social constructivists believe that knowledge is constructed through social interaction and collaboration with others. Chen and Willits (1999) defined interaction as "two way communication between learners and the instructor and among learners that can take the form of synchronous and/or asynchronous verbal and electronic conversation." (p. 47)

Naturally, collaborative learning meets the need for social interaction within online settings, since social constructivists believed that learning should involve interaction with other people or environments. Collaborative learning environments provide a way to let learners work in groups or teams to achieve certain educational goals (Ellis & Fouts, 1997). Collaboration can help individual learners to make progress through their zone of proximal development by the group activities in which they engage (Vygotsky, 1978). In other words, experienced individuals can help inexperienced learners to improve their achievements by collaborative learning. On the other hand, collaborative learning has consistently produced positive effects on self-esteem, interpersonal skills, attitudes toward school, and ability to work with others (Ellis & Fouts, 1997, p. 172).

Moral Context in the virtual learning environment

For Dewey (1916), the moral and the social quality of conduct are identical with each other. Morals are as broad as acts that concern the relationship between others. Moral is what other people think about virtues and duties. Certain traits of character connection with the social relationship are in an emphatic sense "truthfulness, honest, chastity, amiability, etc.". Dewey (1916) noted,

> To call them virtues in their isolation is like taking the skeleton for the living body. The bones are certainly important, but their importance lies in the fact that they support other organs of the body in such a way as to make them capable of integrated effective activity. (p. 357)

Carter (1997) criticized that such advanced technology as the Internet can leave us less civil because it separated the process of getting information from the process of

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getting to know other people. In addition, learners interact with others whom they know only in their online persons, which may be quite different from whom they are in their offline hours. Therefore, the 'residents' of virtual communities become self-created (Carter, 1997). The information technology era has destroyed the concept of unitary truth because simulation over the real and we can manufacture everything. (Carter, 1997) For instance, someone pretends to be a member of the opposite sex or a famous celebrity to get the attention of the Internet users in the online chat rooms or someone forges mail and fills users' e-mail accounts. As a result, the information that learner collect from other is not only contingent but also possibly worthless (Carter, 1997). Sometimes, fake software or e-mail including computer virus float around the Internet. Any user who tries to run or open it will be at risk. It might erase the entire contents of the user's hard drive or expand useless data to the content of a document or program. The virus producer might be playing a joke for self-interest, but he or she does not realize how the victim suffers.

Educators and parents also worry how to supervise the problem of accessing the pornography, suicide manuals and other inappropriate web sites. In addition, while in a virtual environment, the communication is different from face-to- face contact. It is easy to be rude online because the people with whom we argue are faceless inhabitants of virtual environments (Carter, 1997). Thus, "emotions are poorly transferred and may easily be disregarded or misinterpreted "(Westera, 1999, p.18). So, speaking skills and assertiveness become less important than word expressions in text-based communication. However, it might be comfortable or safe to express ideas owing to anonymity.

Discussion

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For Dewey (1916), education (school) is the first place to be a community life. Learners have a miniature social group in which study and growth together by sharing the common experience. Learners involve intercourse, communication and cooperation of extending the perception of connections in playgrounds, workrooms, or laboratories. In contrast, when all the social activities and learning will be processed in the virtual educational world, the following are some salient issues in the virtual learning environment.

Humanity and isolation

Trentin (1999) classified network services as interpersonal communication services. Interpersonal communication services provide in a context independent of time and space to reproduce some of the dynamics of communication between individuals. In Murray's (1995) study, instructors can overcome their professional isolation by communicating with their colleagues or specialists. And, learners can transcend geographic and social isolation through electronic correspondence. In fact, Riedling (1996) found that the learners did not perceive themselves as alone in online programs. However, virtual reality can simulate a self-created environment. "People who feel that their self-image is based on exerting perfect control over their surroundings may seek refuge in simplistic virtual environments that provide and escape from the complexities and uncertainties of the real world." (Dede, 1995, p.48)

The Internet creates virtual areas for encouraging interaction between instructors and learners for allowing information or knowledge to be exchanged (Trentin, 1999). In

general, computer networks support educational activities based on specific distance teaching/learning strategies. Consideration of learning strategies should be grounded on appropriate pedagogy. For instance, social constructivists believe learning is a social activity not an isolated one. Thus, Internet tools such as e-mail (voice mail), Listservs, chat rooms, BBS (Bulletin Board System) and newsgroups provide virtual social environments for learning together. Two-way communication such as e-mail, interactive databases, and the Internet forms a new type of interaction that can increase the flexibility of the learning environment (Chen & Willits, 1999). However, the Internet constrains us by allowing only communication with the computer, not a real person, because of the transmission of words in asynchronous communication through computer. It more or less loses some humanity or it forms social isolation. As a way to prevent computer addiction and social withdrawal in young people, Carter (1997) suggests the integration of the computer into family life. And, reducing time spent off alone in his or her bedroom, the young learner will increase time spent on social skills more than time spent online.

Sharing and exchanging information

Telecommunications cut across geographic boundaries for learners and educators who are pursuing a common goal and are willing to share their expertise. With the online library, many services such as library catalogs are available to individuals who can find bibliographic information on the Internet. Thus, Trentin (1999) has classified the network services as services for accessing and sharing information. Learners using networks to access such information sources as databases, online catalogues, software and sharing information. No doubt, the Internet provides us an effective and efficient method to

exchange and share information. However, over rich information is available on the Internet. As a result, it might be hard to search or difficult to sort through the information to find what is wanted or valuable information.

The Internet would be an effective instructional approach for teaching students of various racial, ethnic and linguistic backgrounds. "The Internet is about the rise of not merely a new technology, but a new culture, a global culture where time, space, borders, and even personal identity are radically redefined" (Murray, 1995, p. 820). In this situation, teachers can easily to create and provide the critical and creative thinking environment. Murray (1995) noted that learner who share the events of their daily lives with peers from other cultures can discover a commonality that transcends politics and traditional values to create a truly global village. In fact, the Internet provides a wonderful environment for learning foreign languages, cultures, world geography, and history through the sharing or exchange of knowledge.

Westera (1999) noted that the widely applied computer networks in education has affected the teacher's role in teaching. The Internet provides only information, thus learners need learn how to manage, analyze, critique, cross-reference, and transform information into valuable knowledge (Lundin, 1998). As a matter of fact, some learning processes take place beyond the instructors' supervision, such as in discussions and collaboration among peer learners. However, a lot of responses from fellow learners or information on the Internet may be ineffective, incomplete or even erroneous (Westera, 1999). Thus, the instructor may change his or her role to be a consultant, guide, and resource provider for the distance learner (Markel, 1999).

Instructors still have a responsibility to monitor and warrant the quality of learning

and peer discussions (Westera, 1999). In addition, learners still need the instructors' direction and support to assist their online social process such as text communication, learning characteristics, and the use of emotion (Scott-Fredericks, 1997). Learners need to develop their own authentic skills to determine the quality, validity, authority and reliability of information (Lundin, 1998).

Civility

A virtual learning world, which relies on an open interaction with the outside world, forms social activities. In other words, any social intercourse is liable to legislation and customary manners (Westera, 1999). Carter (1997) claimed, "Acting in a civil manner demonstrates our respect for our fellow human beings." (p.184) Learners should know that the learning environment is no longer a fenced-off and protected area. Any interaction through communication tools is to be taken seriously and must be undertaken with a sense of responsibility (Westera, 1999).

Carter (1997) noted "civility enables us to cushion the impact of the many slights and indignities of everyday life"(p.184). A moral rule that prohibits the use of words in a way directly harms others. For real people, it might be hurt feelings. In the virtual educational world, "harm" could be explained as the damage of software or hardware of computer networks by hackers (crackers) or computer virus. In addition, most distance learning relies on learners' moral behaviors. For example, a learner's learning process is always proceeding at home. Until now, learning activities such as doing homework, studying and assessing have been a moral issue. For instance, it is hard to identify whether all assignments, or even online tests are really done by the distance learner himself or herself

for most distance programs.

Developing a virtual learning environment, educators can create a "safe" learning environment by the instructional materials (Porter, 1997). For example, these materials could include protocols for using the technology providing equal access to resources, good manner rules for e-mail, guidelines for etiquette, and procedures for talking in turn during a teleconference. Through these instructional materials, educators can encourage learners involving, establishing and maintaining their profession (e.g. questions or comments) in this comfortable communication environment.

Computer ethics

As technology empowers human beings, new behaviors become possible, and ethical questions regarding these behaviors are gradually arising. There has been concerned about a variety of computing behaviors such as violation of copyright law and invasion of privacy (Maddux, Johnson & Willis, 1997).

For violation of copyright law, "it is illegal to make unauthorized copies of a copyrighted computer program" (Maddux, Johnson & Willis, 1997,p.98). In other words, this law protects all copyrighted programs to be unpermitted copies, but it is legal to make a single backup copy for storage purposes. "The backup copy is handy in case the original diskette is damaged" (Maddux, Johnson & Willis, 1997.p.99). However, since word processing makes copying, pasting and cutting information after editing so easy, for example, it is hard to identify who is the original author. As a result, the Internet user might find it difficult to know how to correctly create, distribute and use copyrighted works.

Invasion of privacy mainly refers to unauthorized access to a variety of materials through computer networks. It might include reading message, which belong to someone else. More than that, someone, such as a hacker or a cracker, breaks into computer networks system to invade or damage the computer systems including hardware and software. For Maddux, Johnson and Willis (1997), "a cracker is a person who maliciously attempts to break into other peoples' computer systems through Internet"(p.146). A hacker is a person who has expertise in computing and networking areas and enjoys digging into how an operating system interoperates with a network and invents methods of expanding the capabilities of a system. While individual crosses his or her ethical value to implement an illegal or unprofessional manner, a hacker can become a cracker (Maddux, Johnson & Willis, 1997).

Secure communication is not much discussed in virtual educational world. Basically, now most distance programs or courses are protected by password authentication to avoid invasion of privacy. In other worlds, if you are an authorized user, you have the right to access the distance courses or to communicate with other learners. Otherwise, you don't have right to access the distance courses. In addition, when the Internet has been widely applied in the educational environment. It still more attention needs to be paid to the information security in virtual educational environment. In general, password authentication is the most common use in controlling the authority of access information on the Internet. However, to protect the information in the database, encryption data such as grading systems can prevent illegal users from forging or changing the learners' scores in a database. Except for this concern, secure distance program including courses, administration and online library resources system can

provide learners a stable and secure learning environment.

Conclusion

For Dewey (1916), "the absence of a social environment in connection with which learning is a need and a reward is the chief reason for the isolation of the school; and this isolation renders school knowledge inapplicable to life and so infertile in character." (p.359) The aim and values of education is moral. And morality relies on the social environment. When the education (school) occurs in a virtual educational world, it is especially important to notice the social and moral context in distance education, which is essential to growth for most distance learners. To avoid the isolation issue, appropriate educational philosophy and strategy should be used such as social constructivism. While sharing and exchanging information, authentic skills can validate the data and avoid copyright infringement. Concerning ethics and etiquette, good online manners are necessary in the virtual educational world. Only civilized Internet users can learn and live well in a healthy and secure information world.

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