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Running header: ADULT PERCEPTIONS FOR SUCCESS

Are Perceptions of Online Learning Indicative of Success?

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Abstract

Online learning is a process that incorporates a "mind over matter" mentality of rigorous, intrinsic learning. The course design addresses what the mind has to know in order for it to matter. Online learning is not a new concept but its acceptance continues to be a daunting one. Many are plagued with the task of gaining knowledge within limited amounts of time in order to stay on the cutting edge of their industry. Some may argue that they need to have face-to-face (F2F) interaction in order to get a 'true' understanding of the subject matter. Others need instant gratification in order to know if they're on the right track to move forward in their studies. It's all about perceptions but online learning does address these issues and provides benchmarks for success along the way.

Introduction

Online learning has become a viable resource for many adult learners as they attempt to navigate an ever-changing workforce. The need to acclimate to the requirements of new employers calls for skills that are often obtained utilizing a constructivist approach to learning. Technology has brought sweeping changes to the landscape of the country. Just as the transition from an agricultural society to an industrial one brought about unemployment and the Great Depression, the transition from an industrial society to a technologically dependent one, has brought about record-breaking unemployment and a need for the workforce to be re-invented to create new opportunities.

How Does It Begin?

An example of how online learning has become a solution to today's societal needs is depicted by Gloria, a personification of many that have had to make lifestyle changes due to the outsourcing of positions. Gloria has been working as an Administrative Assistant at the same retail clothing store for over twelve years. She was recently informed that the department where she has worked for the last five years will relocate and she must learn another skill in order to obtain another position to remain in her present location. "[Her] ability and willingness to adapt to novel tasks, activating [her] commitment to thinking and the perspective of hope by means of maintaining [her] cognitive and affective self-regulation in and of learning action" (Hautamäki, Arinen, Eronen, Hautamäki, Kupiainen, Lindblom, Niemivirta, Pakaslahti, Rantanen, & Scheinin, 2002, p. 38) are inherent in her success to acclimate to the new positions for which she will have to receive training prior to application. With this change comes the understanding that the inability to move has forced a transition into another field which requires improving present

skill sets to compete with others in the industry. This is one of the necessary steps in adjusting to the changes brought about by societal changes in the requirements for employment and upward mobility. Does this story sound familiar?

"In October [2009], the number of unemployed persons increased by 558,000 to 15.7 million. The unemployment rate rose by 0.4 percentage points to 10.2 percent, the highest rate since April 1983" (Bureau of Labor Statistics website, 2009). Gloria and her co-workers represent part of a growing trend. As companies merge, outsource, or, in many cases, close or discontinue operations due to the obsolescence of the skills of their present working population, many like Gloria find themselves in an unenviable position of trying to obtain skills sought by employers. Technological advancements in education have created a bridge for many displaced employees like Gloria by providing an option for gaining the skills needed to compete in an everchanging employment setting. "The increased accessibility of the internet has created vast opportunities for non-traditional education through this medium" (Karber, 2003).

The last time Gloria took classes, she was in high school and that was over fifteen years ago. During the exit interview process, it is often suggested that displaced employees seek additional training. Classroom study is not always a reasonable option given the need to obtain the proper skills in a small amount of time in order to apply for employment. Online study would allow prospective candidates to apply as soon as the course was completed. In order to re-enter a workforce that required skills that she lacked at present, Gloria decided to test the 'online waters'. "A better understanding of, and a more appropriate attitude towards, the Internet are prerequisites for successful Internet-based instruction" (Liaw, 2002) which are important factors for consideration when deciding to take online instruction. Online classes that address the

necessity to secure training in a short period of time while providing ongoing support throughout the process help learners apply knowledge and address the learning needs with exercises that will provide creative opportunities to utilize the newly acquired knowledge systematically.

The Online Option

"Online education has grown tremendously over the past ten years. One report by Singh and Pan in 2004 showed that over 54,000 online courses were offered by universities in the U.S. with over 1.6 million student enrollment in 2000" (Li, 2008). Online instruction offers rigorous preparation for displaced workers and those requiring additional skills to return to the workforce with abilities that enable them to perform at a higher level of proficiency. Chickering and Gamson (1987) list seven principles that are inherent in the successful creation of online courses that include: "(1) encouraging student-instructor interaction, (2) promoting cooperation amongst students, (3) encouraging active learning, (4) providing timely feedback, (5) emphasizing time on task, (6) communicating high expectations, and (7) valuing diverse talents and ways of learning".

Student-instructor interaction is necessary to engage students since the face-to-face (F2F) environment found in classroom courses needs to be experienced by the learner. "The development of peer- and self-assessment, is a key to enhancing meta-cognition, self-direction, and, through peer discussions, the social dimension of learning" (Black, McCormick, James, & Pedder, 2006, p. 128) that promotes cooperation and is experienced among students while minimizing the disconnection often viewed as part of online learning. The interaction and cooperation actively encourage learning and is complemented by timely instructor feedback that helps to ensure learners stay on task. These are important characteristics for any learner to

consider when assessing an online learning program. The syllabus should spell out the expectations and the course should incorporate methodologies to support the various ways in which learners learn.

Although they were not created for online courses, "a number of educators and researchers have been using the principles [of Chickering & Gamson] as rubrics for improving online course implementation" (Shieh, Gummer, & Niess, 2008, p. 61). Each of the principles is predicated upon the need to ensure that the effect of the F2F characteristics of learning are not lessened or compromised during the online learning process. The learner has to experience the positive, personal effects during online instruction in order to achieve greater motivation and commitment to the information to be covered. It is important to understand that the newness of the experience may engender a sense of anxiety and frustration due to the need for the instruction and the necessity for success. The learner's frustration is lessened when they are finally faced with "[a]n education at [their] own pace and learning style without the constraints of time or place. When effectively managed, online education can empower learners to reach their career goals and to meet degree or certification requirements" (Deal III, 2002). This makes understanding the learner and their need for the training to be an essential part of the planning process in the design of instruction.

"Learners' perceptions of the Internet may shape the learners' attitudes [as well as their] online behaviors" (Tsai, 2004, Tsai and Lin, 2004). A proficiency in navigating the internet is necessary for gaining access to a new educational environment and the appropriate skills to obtain a certain level of online success. Armed with a computer with internet access, a learner can gain knowledge, skills and abilities that will help them perform tasks useful in their

consistently transitional work environments. At what point should the learner seek additional education options to maintain their usefulness with their employers? It is imperative that employees are aware of the changes and technological advancements in their field. The motivation to stay ahead of the change is often linked to survival.

The Instructional Design Process

The ADDIE Model, according to Morrison, Ross & Kemp, is an acronym for the five major stages of the design process. The process focuses on the "analysis, design, development, implementation, and evaluation" (2007, p. 13) of creating useful instruction. The process incorporates the theories of Bloom, Gagné & Glaser, Dick & Carey, Moore & Kearsley and so many others. The result of studies of these theorists is the culmination of years of experience in the design and implementation of courses that address the needs of learners of every age to ensure the seamless transfer of information from instructor to learner.

The manner in which the course is designed is based upon the audience that will utilize the information. "The field of adult education, known as andragogy [the art and science of helping adults learn], has been studied at length and has resulted in recognizing several generalizations about adult learners" (Morrison, et al, 2007; Moore & Kearsley, 2005). This information is used to create and implement instruction that will successfully transfer knowledge to adult learners. It is helpful in determining the possible methodologies and strategies that should be utilized within the course to ensure the transfer is complete while addressing the domain to which it should be linked. Seels & Richey define instructional technology as,

"A discipline devoted to techniques or ways to make learning more efficient based on theory but theory in its broadest sense, not just scientific theory. ... Theory consists of concepts, constructs, principles, and propositions that serve as the body of knowledge. Practice is the application of that knowledge to solve problems. Practice can also contribute to the knowledge base through information gained from experience." (Seels, et al., 1994).

A Theoretical Application

The Cognitive Domain

Cognitive growth in learning takes into consideration the ability to link symbolic, interpersonal and social aspects of understanding. Bloom's taxonomy is a study of cognitive learning outcomes that is still in use today and incorporates six basic features or steps that lead to achieving a learning outcome, namely, "knowledge, comprehension, application, analysis, synthesis and evaluation" (Driscoll, 2007, p. 357). Knowledge draws from previously learned activities that will be used as the foundation for additional learning. Comprehension shows a grasp of the material presented while application is the tool by which the level of knowledge can be gauged through measurable activity. Analysis breaks the activity down to basic steps and synthesis builds the parts or steps into a structured approach toward achievement. Evaluation is the culmination of the previous steps that determines if the learning outcome has been achieved as well as a restructuring to obtain a higher level of retention. Evaluation can occur at several points throughout this process and is necessary for the development of the learner and additional instruction.

For example, adults retain new information through chunking and advance organization because they "bring different mental models to the instructional situation [that] should be used as a resource to relate to the subject being studied" (Glaser, 1984; Gagné & Glaser, 1987; Morrison, et al, 2007). Students discover not only what they need to know but what they already know.

Chunking is a grouping of like information systematically in an order on the road to completion that moves the learning objective toward a higher level of difficulty. Advance organization assumes a logical progression of activities that lead to a desired end. This link to known experiences helps to ground the new information with learned activities to enforce and develop them. Instruction should allow for positive reinforcement when a task is completed correctly but allow a process by which the student can back-track through the steps to determine how it was done.

The Constructivist Application

It has been often said that education is a bridge to success. Constructivist theories lay a greater responsibility or onus of learning on the learner. "In the situated learning tradition, talk of problem solving as 'facing dilemmas' that, when they are resolved, result in learning" (Lave, 1988) and allows for a deeper level of understanding by linking a problem resolution to personal skill development. The instructor is then open to explore other venues in motivating the learner to seek out more information and encouraging the adventure of learning something new in this innovative educational paradigm. The application of constructivist methods can be seen in the utilizing of activities that provide information and the use of exercises to apply those learned activities within a chosen framework based on previous or present experiences. These exercises are systematic in their application and allow learners to enhance their learning experiences by completing the task in assessable phases culminating with the completed project. The classroom is used as a melting pot of ideas and insights for the positive inclusion of additional ideas that will mold the project as it develops. The instruction should be adjusted to incorporate the known skill level of the student but challenging enough to build upon it.

The learning outcomes associated with constructivist learning include the "enhancement of reasoning skills, thinking on a critical level; retaining and using knowledge; the ability to apply knowledge; personal commitment to learning and serious reflection on knowledge obtained on several levels" (Driscoll, 2005, p. 402). By providing a problem that the learner must resolve and offering a process by which to do so, the learner constructs a framework within which the problem can be solved. The link between a known situation and a new method by and through which the situation can be resolved allows reasoning and critical thinking to germinate into measurable gains in the application of knowledge. By allowing the learner to choose the venue or situation to be addressed or manipulated, the commitment to the learning exercise is further enhanced and allows for a higher level of usability in the application of this knowledge in present and future situations.

Conclusion

Gloria, like many displaced workers, has an option for approaching her present situation with a viable solution of training and education that has evolved with technology and utilizes sound educational theory to ensure that learners grasp the content and are able to apply it correctly. "Learner attitude is different from motivation" (Morrison, et al, 2007, p. 58). The designer must devise a method to measure both of them in order to offset any negative attitudes and positively engage learner motivation in the development of assessed needs for the furtherance of their education and the extension of their knowledge base. Evaluation of the learning process should be ongoing and measured by the learner as well in order to ensure that the learner is able to provide feedback and effectively address any challenges faced during the

instruction. This information should be incorporated by the course facilitator to assist in the engagement of future students.

Perceptions of online learners are influenced in part by the necessity to take the course. "Adult learners that volunteer to learn have intrinsic motivation [and] usually take courses to upgrade or develop skills needed for employment" (Moore & Kearsley, 2005, p. 162). When this is the case, the motivation will drive the perception toward a positive experience in their online educational pursuits. The onus of learning is accepted and understood which drives the learner to make an effort to produce. In cases where students possessed formal education, studies have shown that those students experienced a greater amount of success (Coggins, 1989). This seems to have played a role in lessening the anxiety faced by students by understanding what is expected at the onset, providing specific requirements as outlined in the syllabus, as well as statements communicated by the instructor. The ability to assess motivation and perception is an important and viable skill necessary in achieving the smooth transfer of knowledge from facilitators to learners and should be stressed in the development of online courseware.

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