FACTORS CONTRIBUTING TO STUDENT SUCCESS IN ONLINE AND MEDIASITE COURSES: A PRELIMINARY STUDY

Abstract

While online learning has been with us now as an educational, pedagogical device for a few years, there is scant research on the factors that contribute to success in this endeavor. This very brief exploratory investigation explores the thinking and perspectives and attributes of faculty, students (undergraduate and graduate) and instructional technologists via a brief Qualtrics survey. Preliminary results are discussed and implications offered.

Key Words: Instructional Technology, Media Site, online learning, student success

Introduction

Online learning has now been firmly established as a pedagogical delivery system. Initially, there was reliance on Power point and textbooks to deliver instruction but of late, there have been more improvements with the use of LMS (Learning Management Systems) such as Web CT and Blackboard and an increasing emphasis on the use of Discussion Boards and synchronous and asynchronous discussion.

However, even with advancements in connectivity, there are still students who fail to complete online classes, and while completion rates are better in MOOC's, which do not involves tests and grades there remains concerns about the specific factors that contribute to success in online and media site courses. Some view these two as very similar modalities while others view them as quite disparate entities.

This very brief exploratory study will examine some of the factors that contribute to success in online learning from the perspectives of faculty, students- both graduate and undergraduate and from a small number of instructional technologists. As the sample sizes are quite small, generalizations will be limited.

Each of these groups may have totally different perspectives as to what contributes to student success. The faculty member may have a different point of view than the undergraduate student who will have a different perspective than a graduate student. Further- the instructional technologist may view the teaching learning process from quite different point of view- perhaps a technological one- which should also be respected.

Brief Concerns Regarding Media-site and Online Instruction

When instructors were first introduced to Media-site, some were misled into believing this technology would replace the use of Instructional Television as a means for distance students to be engaged in a live class. It was supposedly better than Instructional Television because the students would not have to go to a central site or location to take the class but could be involved using their home computers. One of the authors quickly realized, on their first night of a Media-site class, that this was not going to work in a live class. Media-site typically runs from 30 seconds to two minutes behind real time, making two-way communication impossible. Often instructors would ask a question, wait for an answer, hear none from distance students, continue with the lecture, and a minute later begin hearing answers to one's earlier question from other distant learning students. (Worse yet, one night a distance student was watching the wrong class and her voice would periodically interrupt a certain class with answers for questions the instructor had previously asked a week prior.)

These frustrating experiences led instructors to explore, examine and attempt to discern how else faculty could run a live class for distance students. Instructors today are almost in an ongoing attempt to provide quality education to their students using an often bulky, problematic, cumbersome system that is not always "user friendly". Often instructors gravitate toward Collaborate, which is an interactive, real-time communication technology that can be used in conjunction with Media-site.

For many years, instructors ran classes with Media-site for showing films or projecting images using the classroom ELMO and Collaborate for interactive communication. The problem, however, was that in order to show a map, for example, on the ELMO, what the instructor was verbally saying and what the distance education students were seeing, did not always align or combine. They could hear

explanations, but would not see where the instructor was pointing on the map for up to two minutes. This lack of coordination was confusing at best. The alternative was to stop the Collaborate class, move to Media-site, do my presentation, and after two minutes of silence in the live classroom, transition back from Media-site to Collaborate for live discussion. This was inconvenient and a major loss of valuable instructional time.

Now, after several years of experience and familiarity with the existent technology, many have learned not to rely on ELMO. Many faculty have made Power Points, Prezi out of nearly everything, and some instructors primarily use Collaborate for all distance teaching. Some faculty do keep Media-site in order that any student who misses class can view the recording of the class and not miss important information.

One of the authors had three students live in the classroom, three students live over Collaborate, and three students who would view the Media-site recording of the class later due to work schedules or living in a vastly different time zone. This combination has worked well. The students who only use Media-site, however, are deprived of participating in live discussion and interaction and immediate feedback.

Certainly, faculty have been in a major transition and have been attempting to cope with unreliable technology, glitches and various other technical snafus that do not contribute to superior learning and academic integrity. These stories and anecdotes are simply to demonstrate faculty concerns about academic integrity and the exasperation and frustration that instructors (and students) often feel and experience when attempting to take online or media site classes.

Literature review

A brief review of the extant literature will be reviewed and then the construction of the survey will be discussed.

Some early work was conducted by Yukselturk & Bulut (2007) as they examined various predictors for student success in online Courses. Stevens (2013) examined the process and procedures that contribute to a successful online class. Cheawjindakarn, Suwannatthachote, Anuchai, & Theeraroungchaisri,

(2012) reviewed the extant literature in their part of the world in terms of factors contributing to success

in online classes. There has been precious little empirical research conducted in this area.

Volery and Lord (2000) examined what they perceived as the most critical success

factors in online education. Their work, published in the International Journal of Educational

Management was one of the initial examination in this realm.

This section will examine the ten online learning success factors are:

1. Online learners are required to be open-minded about life, work, and educational experiences as a part of the training program. This means that they need to improvise when resources and facilities similar to a physical learning environment are not provided. Adaptability is an amazing human trait. When applied to the online learning environment, it yields amazing benefits.

2. Learners should be able to communicate effectively through writing. They need to try to "show" with writing, instead of "telling". Urge them to use descriptive words and where possible, insert images to support their descriptions.

3. Online learners should also be self-motivated and self-disciplined. Essentially, they need to be self-starters. They cannot afford to fall behind and expect the kind of help they received in school from their educators.

4. Learners should be willing to speak up when problems arise or when conflicts are sensed in a discussion. Holding back a decision point or an argument will only lead to dissatisfaction with the course.

5. Online learners need to be ready to commit anywhere between four and fifteen hours per week for a course. The biggest challenge in an online learning environment is keeping up with the assigned readings. Time needs to be allocated and reading materials must be downloaded beforehand. Then, they can be read while in long lines, or during a commute, to take optimal advantage of "wasted" time.

6. Trainees also need to be able to think critically and take instant decisions as a part of the learning process. Critical thinking triggers the transfer of concepts from short-term memory to long-term memory. Reflective writing is a great critical thinking activity. Keeping a reflection journal allows learners to "think aloud" their newly learned information. Connecting it with previous knowledge makes it practical knowledge.

7. They should be able to meet the minimum requirements of the program. Have everyone check the eLearning program prerequisite skills before signing up for a program. This will help them meet the challenges in the upcoming courses.

8. They, of course, must have access to a computer, the Internet, and have at least a minimum ability to use them. Again, they can look into "how-to" videos and instructions to improve their computer literacy.

9. Online learners should be able to come up with ideas before responding. Being impulsive and "firing away" without thinking adds confusion to the group learning process. Composing ideas in writing and editing them before sending to the group is a quality to seek and instill in learners.

10. Above all, online learners should strongly feel that high-quality learning is possible without going to a face-to-face learning environment.

Methods and Materials

In order to preliminarily explore some of the relevant factors contributing to success a survey was constructed and reviewed by the Human Subjects committee and approved and sent to faculty via electronic mail. The questions were based on the scant literature available and based on pre-research discussions from the contributing authors. The questions were obviously different for students, faculty, (some of which were graduate level and others undergraduate and different for instructional technologists.

There were no specific research hypotheses in this brief exploratory study. The purpose of the study was to attempt to glean some preliminary understanding of attributional factors involved in this process.

Results of Qualtrics Survey

Permission was procured from the office of Institutional research to conduct the study and all participants participated willingly.

Subjects:

Twenty three faculty (n=23) responded to the survey and four instructional technologists employed by the university responded. There were 15 graduate students, and 31 undergraduate students. The breakdown follows: Sophomores, N=5 Juniors N=13, Seniors, N= 13 The undergraduates (N=31) graduate students (N=15) will be examined conjointly. Not all students responded to all questions.

The questions differed for students (since they had to learn the material, were paying tuition, and were being graded) faculty (since they were responsible for the dissemination of knowledge, skills and abilities via this methodology) and instructional technologists (since they were partly responsible for trouble shooting glitches and other technological problems (students using browsers that were not compatible with Blackboard for example)

Questions asked of Instructional Technologists

1) As an Instructional Technologist (IT) what would you say is the MAIN factor contributing to student success in an online/media site class?

2) As an IT, how important is it that students immediately read the syllabus at the beginning of the course?

3) As an IT, how important is it to have a short succinct syllabus?

4) As an IT, how important is it to have a very comprehensive thorough syllabus?

5) As an IT How important is active participation to student success?

6) As an IT how important is student daily involvement?

Results of Survey:

It is important to bear in mind that there were only 4 instructional technologists, hence a small response size.

In terms of question number 1- (above) the results were:

Student Retention- 1; Student Engagement in Discussion Board- 0; Time Management- 0

Clear Concise Syllabus- 1; Engaging Videos and Visuals- 1

In terms of question number 2—the results were:

VERY IMPORTANT=1; IMPORTANT=1, NEUTRAL=1, LEAST IMPORTANT=1

In terms of question number 3- the results were:

Very Important= 1: IMPORTANT =1; NEUTRAL = 1; LEAST IMPORTANT=1

In terms of question number 4:

The responses were: VERY IMPORTANT=0; IMPORTANT= 1; NEUTRAL = 3

In terms of question number 5:

VERY IMPORTANT =2; IMPORTANT= 0 NEUTRAL =1; LEAST IMPORTANT= 1; NOT IMPORTANT

In terms of question number 6: VERY IMPORTANT =1 IMPORTANT =0; NEUTRAL 2 Least IMPORTANT 1

Granted this is a small sample size, but somewhat disconcerting that there is little agreement between these four individuals. They may have been trained at different institutions, but this was not examined.

Questions asked of Faculty

1) As an instructor what do you see as the biggest obstacles to your instructional success?

2) As an instructor what do you see as the biggest communication challenges?

3) As an instructor what do you see as the most important factor in student success?

4) As an instructor, how important is a structured or organized class to student success?

5) As an instructor, how important is it to have multiple engagement strategies (e.g. Projects, games, groups)

6) As an instructor, how important is it to have mastery of APA format and writing skills?

7) As an instructor, how important is immediate synchronous involvement (e.g. Phone, in person, SKYPE, Zoom)?

8) As an instructor- how important is synchronous involvement with you as the Instructor (e.g. Discussion Board, email, announcements)

RESULTS FROM FACULTY:

Results from question # 1:

1) Competing demands- too many committees-----31.58% n=6; 2) Too many administrative duties---6.32% n= 5; 3) Too many research projects------21.05% n= 4; 4) Too many advisees----21.5% n=4

Results from question #2:

1) Student not responding to Discussion 36.36 % n= 8; 2) Students not replying to emails 18.18% n= 4

3) Students not responding to Announcements 4.5% 1; 4) Response time to students 4.55% n=1; 5) No

response at all 36.36% n=8

Results from question # 3

Computer Skills---9.9 % n=2; 2) Consistency ----50.00% n=11; 3) Tech Support----4.5% n=1; 4) Clear

Concise Syllabus 27.27% n=6; 5) Clear concise Homepage 9.09% n=2

Results from question #4

1) VERY IMPORTANT---86.36% n=19; 2) IMPORTANT-----9.09% n= 2; 3) NEUTRAL = 0; 4) LEAST IMPORTANT=0; 5) Not IMP---4.5 % n=1

Results from Question Number 5;

1) VERY IMPORTANT 40.91% n=9; 2) IMPORTANT 40.91%= n=9; 3) NEUTRAL 9.09% n=2; 4) LEAST IMPORTANT 9.09% n=2; 5) NOT IMPORTANT---0.00%

Results from Question Number 6:

1) VERY IMPORTANT 33.33% n=8; 2) IMPORTANT--- 47.62% n= 10; 3) NEUTRAL 14.29% n=3; 4) LEAST IMPORTANT 4.76% n=1; 5) Not Important 0

Results from Question Number 7 –

1) VERY IMPORTANT---18.18% n=4; 2) IMPORTANT----18.18% n=4; 3) NEUTRAL 40.91% n= 9; 4) LEAST IMPORTANT 9.09% n=2; 5) NOT IMPORTANT 13.64% n= 3

Results from Question # 8

1) VERY IMPORTANT ---45.45% n=10; 2) IMPORTANT --- 36.36% n=8; 3) NEUTRAL-- 9.09% n= 2; 4) Least IMPORTANT 9.09% n=2; 5) NOT IMPORTANT 0.0%

Questions Asked of Students- Graduates and Undergraduates

1) In your opinion, what is the single most important factor in your success as a STUDENT?

2) In your opinion, what are the most important tech skills for online media site as a student?
3) In your opinion, how important is Reading Comprehension in your success as a student in an online or media site course?
4) As a student, what do you see as the biggest factor contributing to your success?
5) As a student, what do you see as the single biggest obstacle to online or media site success?
6) In your mind, what is the most important personality factor contributing to your success as a student?
7) As a student, what do you see as the biggest financial obstacle to online success?

Results for Students: (both Graduate and Undergraduate)

Question # 1 Results

1) Having a strong interest in the subject- 54.1% n=26; 2) having organizational skills 20.8% n=10; 3) Having the courage to ask questions 2.0 % n=1; 3) Convenience to work at my own pace 18.7% n=9; 4) Relief of social anxiety 4.17% n= 2

Question # 2 Results

1) Word Processing 8.7 %; 2) Internet access 39.1% n=18; 3) Familiarity with LMS 47.8%. n=22; 4) Email utilization 0.00 % n=0; 5) Other communication skills (e.g. Prezi) 4.33% n= 2)

Question # 3---Results

1) VERY IMPORTANT 71.7 % n=33 IMPORTANT 17.3 % n=8; LEAST IMPORTANT 8.7.% n=4; NOT IMPORTANT 2.1% n= 1

Question # 4 1) Technological problems---43.43% n=20; 2) Time constraints ---50.00% n=23; 3) Access to books=0% n =0; Family Constraints 6.52% n=3

Question # 5 Results

1) Class participation 6.5 % n=30; 2) Support from peers/spouse 10.8% n=5; 3) Clarification on concepts/ideas from peers 23.9% n=11; 4) Immediate response from Instructor 19.5% n=9; 5) Instructor comments/feedback 39.1% n=18

Question # 6 Results

1) Persistence 41.3% n=19 2) Consistency 26.0% n=12; 3) Sociability 2.1% 4) Communication Skills 0.00% n=0; 4) Communication Skills 26.0% n=12; 5) Technology 4.3% n=2

Question # 7 Results

1) Cost of e-book 0% n=0; 2) Cost of Textbook 23.9% n=11; 3) Gas- 0% n=0; 4) Tuition 63% n=29 Other-6% n=13

The data for the graduate and undergraduate students was collapsed since the response rate for undergraduates (seniors, juniors and sophomores) was small.

Summary and Conclusions

From this preliminary exploratory study some relevant concerns and some outstanding issues emanate.

From our small sample size, technological issues remain problematic and time constraints are a secondary

issue. Undergraduate responses differed slightly from graduate although the sample size of

undergraduate students was small and not representative of the student body population.

It may be important for faculty to clearly communicate time expectations, information about course

demands (writing, library research, discussion board postings, possible difficulties with the learning

management system) before the course begins so that students are aware of the demands of the course

and can perhaps allocate adequate amounts of time to reading, responding, and preparing for tests and

assignments. The results of this preliminary survey should be viewed with caution, as sample sizes were

small and the university in which the research was conducted was a southwestern rural university. Thus,

results at larger metropolitan universities may be quite different.

References

Cheawjindakarn, B. Suwannatthachote, P. and Theeraroungchaisri, A. (2012)

Critical Success Factors for Online Distance Learning in Higher Education: A Review of the

Literature.

Creative Education 3, 61-66. Published Online December 2012 in SciRes

(http://www.SciRP.org/journal/ce) DOI:10.4236/ce.2012.38b014

What Makes a Successful Online Learner? | CAREERwise

Educationhttps://careerwise.minnstate.edu/education/successonline.html

Stevens, K.B. (2013) Contributing Factors to a Successful Online Course Development Process.

The Journal of Continuing Higher Education, 61:1, 2-11, DOI: 10.1080/07377363.2013.758554

Volery,T. and Lord, D. (2000) Critical success factors in online education

International Journal of Educational Management 14:216-223. DOI:

10.1108/09513540010344731

Yukselturk, E. & Bulut, S. (2007). Predictors for Student Success in an Online Course. Educational

Technology & Society, 10 (2), 71-83.