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ASSETT Survey Series Lecture Capture Full Report January, 2010

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Mission statement http://assett.colorado.edu

Lecture Capture Survey Executive Summary

The "Lecture Capture" survey was designed to find out how students perceived and used the lecture capture system, installed in Duane G1B30. ASSETT issued this survey in December of 2009, in partnership with Academic Technologies, to students enrolled in courses held in Duane G1B30 during the Fall 2009 semester. Students answered questions regarding how they typically watched the videos, perceived ease of accessing and viewing the videos, and perceived impact of these videos on their learning.

The primary finding of this survey is that students who viewed the videos generally found them to be useful tools to review for exams and to supplement concepts that they missed or did not understand in class. Most students said that more courses at CU should use lecture capture.

Respondent Data

122 CU students enrolled in 4 courses out of a population of 989 responded to the survey. The majority of students were enrolled in Physics courses.

Survey Results

1) Viewing Habits

65 students watched only *one* or *none* of the videos. 49 of those students said they did not think it was necessary to view the videos since they did not miss class. Most students who watched at least half of the videos reported typically watching a video by fast forwarding to only certain parts of it, or watching it in full and then going back to certain parts of the video (n=34; 59%). Very few students typically watched the videos more than once (n=2; 3.5%). Students primarily viewed the videos as a tool to help them study for the exam. Most students (n=32; 57%) reported spending less than one hour a week watching the videos.

2) Viewing Experience

Only students who watched more than one video were asked to report their viewing experiences (n=57). Of those students, most (n=50; 93%) found the streaming video was easy to access. Most students (n=38; 70%) also reported that they typically enjoyed viewing the videos and were either confident or somewhat confident that watching the videos improved their learning in the class (n=49; 91%). Most students (n=44; 82%) agreed that more CU courses should use streaming video.

Survey Description

In August of 2009, ITS installed lecture capture technology in Duane G1B30 lecture hall. The "Lecture Capture" survey was designed to find out how students used and perceived lecture capture videos in their class. The installation of new lecture capture recording equipment in large lecture halls on campus promoted the need for this survey. This is a new technology on campus, and feedback from students about their experience with the technology informs our understandings of how technology impacts learning. ASSETT issued this survey to students enrolled in classes with the lecture capture equipment installed in December of 2009. The survey was delivered online. Survey participants were offered a chance to win a \$100 gift certificate from the CU Bookstore.

We asked students to report the name and the instructor of the course and if watching the videos was optional. Next we asked how many videos they viewed. If they viewed less than half of the videos, we asked them why they did not watch more lecture capture streaming videos in their class. Those who watched more than one of the videos were asked an additional set of questions. The first set gathered more information about how and why students typically watched these videos. For example, we asked students if they watched the videos instead of going to class, before or after attending the class, etc. Then a second set of questions asked students about their viewing experience. For example, one question asked students about the ease of accessing the videos. An additional question asked about students' enjoyment watching the videos. We then asked students to relate the viewing of these videos to their overall experience and learning in the class. Finally, students were asked if they thought more CU courses should use lecture capture streaming video.

Respondent Data

122 CU students responded to the survey. Class distribution is as follows:

Physics	106
Astronomy	10
Other	6

Table 1

Survey Results

94% of students (n=114) reported that they were *not required* to watch the streaming videos. Rather, viewing the videos was optional. This was likely because instructors did not know the tool would be present until near the beginning of the semester.

Viewing Habits

A set of questions was asked to better understand how students viewed the streaming video.

Very few students watched all of the videos. The majority of students watched less than half of the videos. Some students did not watch any of the videos.

Item	N	Percentage
All of them	9	7.4%
More than half	15	12.3%
Less than half	33	27.0%
One	25	20.5%
None	40	32.8%

Table 2

Students who watched only one or none of the videos were asked why they did not watch more videos in this class:

Item	N	Percentage
I had technical difficulties getting the videos to play.	3	4.7%
They were not part of required assignments, so I did not think it was necessary to watch them.	21	32.8%
Since I rarely missed class, I did not think it was necessary.	49	76.6%
I watched one video and decided it would not help me learn anything in this class.	6	9.4%
Other reasons?	8	12.5%

Table 3

It may be that the students do not consider lecture capture video important if they regularly attend class. Some students who provided other reasons for not watching the videos indicated that they did not know about the service.

Most students who watched at least half or more of the videos reported typically watching the video by fast forwarding to only certain parts of it, or watching it in full and then going back to certain parts of the video (n=34; 59%). Very few students typically watched the videos more than once (n=2; 3.5%). Open-ended responses to these

questions indicate that students liked being able to go back and view certain parts of the lectures, mostly to revisit material that they still did not understand or was unclear to them.

We asked students how and when they viewed the videos. Students were able to check all of the following that applied to their typical viewing of a video:

Item	N	Percentage
I took notes while watching the video.	21	38.9%
I watched the videos together with other students in the class.	11	20.4%
I watched the video before attending the class.	1	1.9%
I watched the video immediately after attending the class.	6	11.1%
I watched the video instead of going to class.	17	31.5%
I watched the videos when studying for exams.	31	57.4%
I watched the videos during the class.	12	22.2%

Table 4

Responses to this set of items indicate that students use the videos as a study tool for exams. Open-ended responses to this question indicate that many students viewed the videos because they were sick and could not attend class.

Most students (n=32; 57%) reported spending less than one hour a week watching the videos.

Viewing Experience

We asked students if they enjoyed watching the videos and if they found them useful. These are all students who watched more than one video. Most students (n=50; 93%) found the streaming video was easy to access and that they typically enjoyed viewing the videos (n=38; 70%). Open-ended responses indicate that students like having the videos to assist with studying.

Most students (n=49; 91%) either agreed or somewhat agreed that watching the videos improved their overall experience in that class. Additionally, most students (n=41; 76%) either agreed or somewhat agreed that watching the videos helped them with assignments in the class. Most students (n=49; 91%) were either confident or somewhat confident that watching the videos improved their learning in the class and that more CU courses should use streaming video (n=44; 82%).

<u>Interpretation</u>

An important finding of this study is that many students who responded to our survey did *not* watch any of the videos. Students who did not watch any of the videos did not see it as necessary since they were present in class. Open-ended comments revealed that some students were also unaware of the option to view the videos. This indicates that if instructors want to encourage students to view the videos, they may need to make a concerted effort to make students aware of their accessibility. Because this is a new service on campus, it is not unusual that students may be unaware of it.

However, those students responding to our survey that did watch some of the videos typically describe the videos as useful. Responses to the questions and open-ended comments indicate four main reasons that streaming video of lectures is helpful to students: 1) It helps them to understand concepts they missed or did not understand in class; 2) The videos were useful as a tool for reviewing for exams; 3) The videos eased the "pressure" of missing a class; 4) Students liked that they could use the videos to learn in their "own time."

Another important finding of this study is that very few students responding to our survey reported technical problems with the videos. This suggests that instructors can feel confident in the reliability of lecture capture technology.