# Online Learning at UMass



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## Abstract

With the pandemic, many universities are increasingly looking to online and hybrid modalities as a way to maintain access and improve retention rates. The impact and experience of online learning are still being explored particularly in regards to the pandemic. Previous research quantified best practices in online learning, but not specifically with multimodal. Therefore, this study is exploring how the University of Massachusetts-Amherst might best support students in distance learning in order to facilitate success in this modality. We conducted exploratory research by constructing a 32-question survey exploring the students' multimodal experiences. The students reported that both their best and worst courses were multimodal, but whether they accessed the course in-person vs online was the difference between the two. Always having clear expectations, live discussion with active engagement, and easily available resources were reported for best courses. The overall multimodal experience had a middling rating. This insight gives UMass Amherst a direction to implement these best practices that exist in the students' best courses. UMass Amherst could implement these to improve multimodal courses. Future research could focus on the responses from people who are no longer enrolled because the pivot to online learning.

## Introduction

When the pandemic hit in March of 2020, over the course of that month, many (if not most) institutions of higher learning in the United States pivoted to online and remote access learning. While necessary, especially in the early days of the pandemic, the cost of this pivot — to students as well as colleges and universities — is high. It also appears that the financial impact of the pandemic on these institutions is significant, and as such, many universities are looking for ways to improve their enrollment and retention numbers, and are looking to online and hybrid modalities as one potential solution. Therefore, it is in the best interests of these institutions to learn more about students' experiences with online & multimodal learning.

## Methods

#### **Participants**

23 participants ranging in age 17 - 48. UMass Amherst undergraduate and graduate students, primarily from College of Behavioral and Social Sciences, were recruited by email through their professors.

#### Design

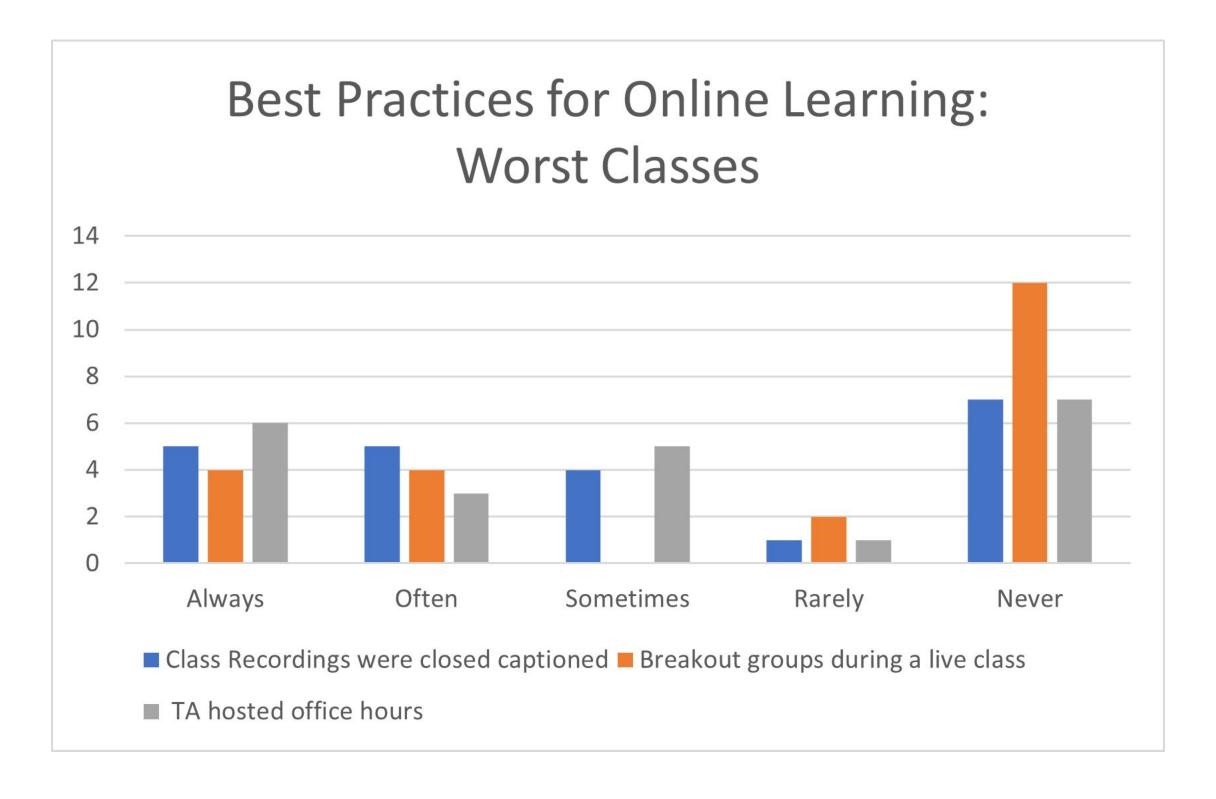
Exploratory 32 - question Qualtrics survey based off previous best practices of online learning.

## Results

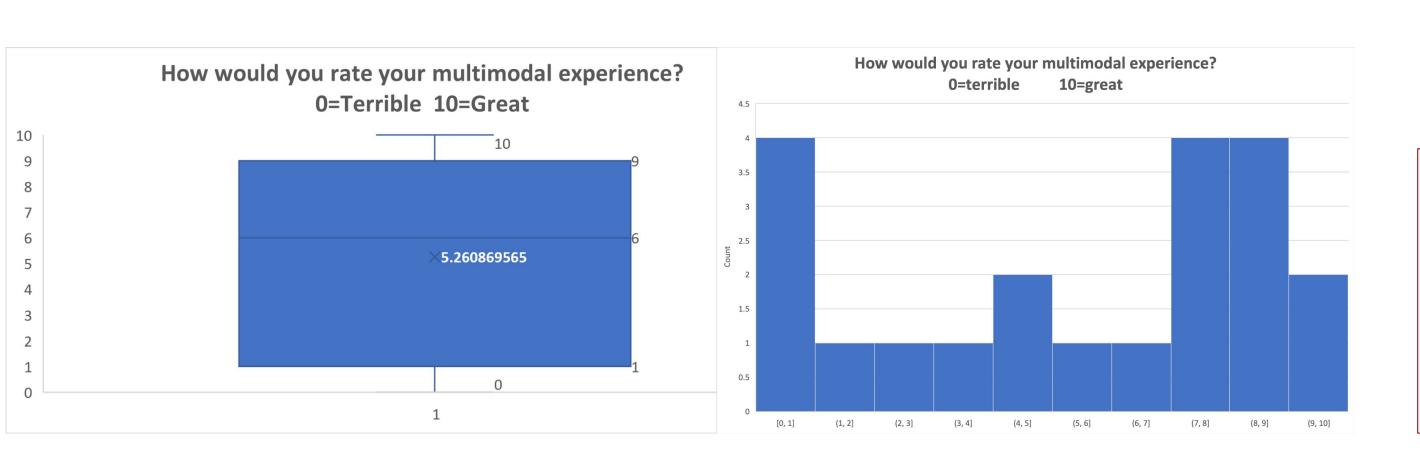
Of all instructional practices that were deemed "recommended" by Digital Promise (Lederman 2020), "Live sessions for asking questions/participating in discussions", "Class resources were easily available" and "Expectations and learning goals were clearly stated in syllabus" received the most "Always" and "Oftens" among UMass Respondents' feedback on their *Best Classes*.



The three best practices of online learning that received the most "Nevers" were "Class Recordings were closed captioned," "Breakout groups during a live class" and "TA hosted office hours."



Multimodal experiences at UMass Amherst ranged from Terrible to Great, with the average being right in the middle (5.26)



#### Discussion

There was a contrast between the most consistently implemented best practices in the best classes and the least consistently implemented best practices in the worst classes. Even though the overall assessment of multimodal was middling, the distribution was bimodal, which shows the polarized opinions of the multimodal experience.

We embedded an experimental design within the survey, but low response rate prevented meaningful analysis. The best and worst class blocks were randomized. Our hypothesis was that order of presentation would influence overall rating of the multimodal experience.

Directions for further research would include wider distribution of the survey, including those who did not enroll post-pandemic. Because of the low response rate, the sample is not representative and therefore the conclusions we can draw are limited. In addition, given that 50% of our respondents did not complete the survey. Focus groups could be conducted on the construction of the survey to see if there are ways to improve response rates

### Conclusions

Students preferred in-person modality regardless of course format. Overall the multimodal structure was a mixed experience, however, participants still desired access to it. Offering TA office hours, closed captioned lectures, and breakout sessions may improve the multimodal experience.

#### References

Blankstein, Melissa and Frederik, Jennifer K. and Wolff-Eisenberg, Christine. "Student Experiences During the Pandemic Pivot" June 25, 20201 <a href="https://sr.ithaka.org/publications/student-experiences-during-the-pandemic-pivot/">https://sr.ithaka.org/publications/student-experiences-during-the-pandemic-pivot/</a>

Brooks, Eric and Morse, Robert. "Methodology: Best Online Bachelor's Program Ranking."" January 25, 2021 <a href="https://www.usnews.com/education/online-education/articles/bachelors-methodology">https://www.usnews.com/education/online-education/articles/bachelors-methodology</a>

Kelly, Andrew P. & Columbus, Rooney. College in the Time of Coronavirus CHALLENGES FACING AMERICAN HIGHER EDUCATION. American Enterprise Institute (2020) <a href="https://bit.ly/3ID7UzT">https://bit.ly/3ID7UzT</a>

Lederman, Doug. "What Worked This Spring? Well-Designed and -Delivered Courses" July 8, 2020

https://www.insidehighered.com/digital-learning/article/2020/07/08/what-kept-students-studying-remotely-satisfied-spring-well

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