

Creating and using podcasting for student engagement: A Vignette

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Abstract: The purpose of this three-year Taylor Teaching and Learning Grant funded pilot study was to learn whether, and to what extent, the introduction of podcasts and podcasting into teacher education classes improved the educational experience for online students. A survey and individual interviews were analyzed through the lens of Garrison et al.'s (2000) model of community inquiry, which involves three elements essential to educational experiences in online environments: cognitive presence, social presence, and teaching presence. Among the key findings was that aligning instructional purpose with student podcasting had the greatest influence on student engagement.

Keywords: podcast, podcasting, Alberta, student engagement, community of inquiry model, online and distance learning

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With the decreasing cost of audio equipment and broadcasting software, podcasting has become a popular and accessible way to mobilize knowledge to a wider audience than traditional modes of text-based communication. Its use as a teaching and learning tool, however, is still in an emergent phase of development. The purpose of this three-year University of Calgary Teaching and Learning grant-funded research study was to understand whether, and to what extent, podcasting could be used both as a method for students to engage with course insights and ideas, as well as a way for students to demonstrate their learning over the course of the term.

What limited research that has been conducted in this area suggests that the introduction of podcasts into online courses can positively improve student experience and learning by reducing formality and promoting a sense of community among distance learners (Drew, 2017; Kay, 2012; Lee & Chan, 2007; Schutt, 2010). Research has also shown that affording opportunities for students to engage with podcasts in creative ways can promote stronger meaning making around key course concepts (Forbes & Khoo, 2015; McKinney et al., 2009).

Situated within this context, the three main research questions that guided this study were:

1. To what extent did the inclusion of podcasts assist students with understanding key course content and concepts?
2. To what extent did offering students the ability to create their own podcasts improve the learning experience of students in online courses?
3. In what ways did offering students the ability to create their own podcasts improve their confidence with effective oral communication that positioned them to contribute to knowledge creation in the field of education?

To address these questions, a pilot study was designed to provide students with the opportunity to access course insights and ideas through listening to podcasts and then to create a podcast as a class assignment in two different courses. Class A was an early literacy course initially designed as an online course for community-based students in the Bachelor of Education program. Class B was a social studies

methods course initially designed to be held in-person but was switched to the online modality because of the COVID-19 pandemic.

Students in Class A were largely in rural, remote, or Indigenous communities, while students in Class B were largely located in a large urban centre. In the original pilot study design, since Class A was to be held on-line and Class B held on campus, the research intent was to explore and study both classes to understand if podcasting was perceived or used differently in online learning spaces versus face-to-face classroom environments. However, because both courses pivoted to on-line after March 2020 due to the COVID-19 pandemic, the pilot study was re-imagined using both Class A and Class B as a collective case study.

The lens of Garrison et al.'s (2000) notion of social, cognitive, and teaching presences shaped both the design of these courses as well as the analysis of the data. Social presence has been described as the intentional interactions between students and their peers as well as the instructor. Cognitive presence relates to evidence of rigor and student understanding of course content, and teaching presence is the decisions made by the course designers related to text selection, pacing, knowledge development, and course content.

These three presences were apparent within the podcasts developed for both Class A and B. In Class A, the teaching presence was developed as the researcher included several podcasts that described the course assignments, key course information, and class assessments that students were able to access throughout the course. To build social presence, Class A included an optional podcast assignment whereby students were able to record a podcast instead of doing a live presentation for their final book study. Lastly, to build cognitive presence, the researcher developed a series of podcasts hosted by previous students. These podcasts were used alongside required course readings and provided critical insights into key course themes and ideas. The presences were, however, less apparent in Class B. In Class B, the main use of podcasting was for the final, major assignment that required students to choose a

scholar in the field of social studies education to interview. In both cases, students had to meet with each other, design the script, and complete the recording on their own.

As difficulties with the technology could be a limiting factor for students developing podcasts, the researchers included information and guidance on the technical aspects of podcasting within their course design. A podcasting manual was developed in collaboration with the nationally recognized podcaster Stephen Hurley of voiceEd Radio Canada. A podcast series was designed called Ed Students in Conversation (Kendrick & Scott, 2022), providing a large audience for the podcasts created by the students in both Class A and Class B (see Appendix A).

Data were collected via interviews and an online survey. Participants from each class were recruited one month after the completion of their coursework, and from a pool of 67 undergraduate education students, 20 participants completed the survey, representing 30% of the total. Twelve respondents were from Class A and eight from Class B. Of the total respondents, fourteen indicated that they lived in an urban centre, and six resided in a rural context. Because of the small size of this pilot study, the data were analyzed in aggregate related to the podcasting in general rather than related to each specific course. Interviews were held with four participants who were purposefully selected as they had acted as podcast hosts.

Analysis of the data suggested that students who participated by both listening to podcasts as well as creating one, repositioned themselves from being knowledge consumers to knowledge creators. Findings also suggested that using podcasting as an instructional tool required pedagogical decisions

related to the three presences that focused on podcasting as/for learning; podcasting as/for engagement, and podcasting as/for community-building (see Figure 1).

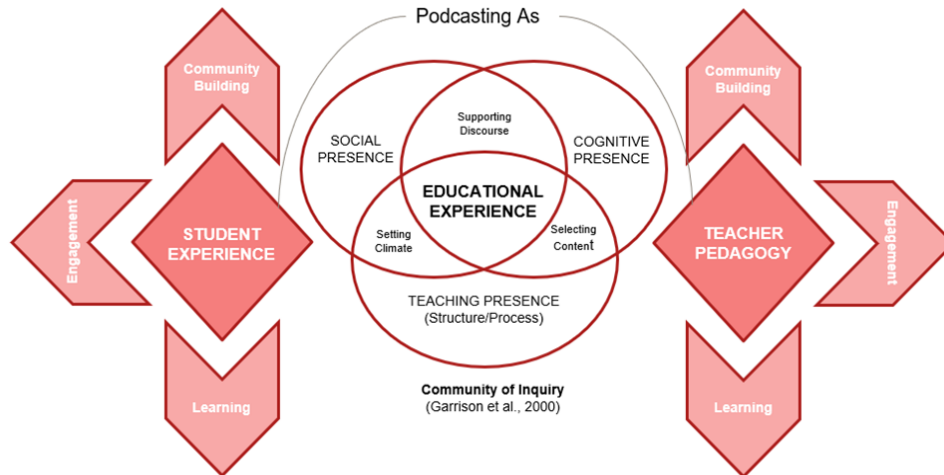


Figure 1. Modelled Analysis of Pilot Study Data. (Kendrick et al., in press)

Data were coded using the Community of Inquiry Model as a theoretical framework and were themed as:

1. Podcasting as/for learning (cognitive presence) reflected the influence of the instructional decisions made by the researchers on the participants' learning.
2. Podcasting as/for engagement (teacher presence) reflected the preparation, research, and knowledge needed by participants to create their podcasts.
3. Podcasting as/for community building (social presence) related to the instructional decisions that promoted peer-peer or peer-instructor connections.

Under podcasting as/for learning, participants highlighted that the podcasts with interesting topics, suitable length, and important content to understand course objectives were of most value to them. Participants stated that they enjoyed taking a break from text-heavy resources, but that they were less interested in podcasts that were too long or had poor sound quality. They also suggested that they were

better able to recall course content that they heard on the podcast, as opposed to only engaging with these concepts in printed course texts.

In terms of podcasting for engagement, the participants reflected on the amount of extra reading they completed to feel knowledgeable and prepared to act as podcast hosts. In Class B, the students were required to host a podcast with a well-known social studies specialist. The pilot study participants felt that doing extra reading and research was necessary before doing this assignment as they wanted to ask good questions and create a podcast worthy of being broadcast to a public audience. Participants mentioned that having access to technical assistance provided by the researchers and Stephen Hurley in the form of how to create and edit a podcast was an important part of feeling competent in completing this assignment.

Lastly, in designing for community-building, the participants in rural, remote, and Indigenous settings were more appreciative of the social presence developed by the incorporation of podcasts. Hearing the voices of the instructors and experts helped to relieve feelings of isolation and provided opportunities for the expansion of the community across the province and country. While the sample size for this pilot project was small, the possibility of podcasts to deepen learning, promote engagement, and build community is worthy of future study.


Podcasting appears to have enormous potential to increase student engagement with online learning. Our study suggests that intentional design decisions by instructors to address the three presences through asking students to both listen to and create podcasts can have a positive influence on students in online and virtual environments.

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Appendix A. Ed Students in Conversation



Ed Students in Conversation
Education Students. Leading Scholars. In Conversation

Looking to learn more about the latest trends, questions, and issues in the field of education? Join pre-service teachers from the University of Calgary's Werklund School of Education as they interview leading figures in the world of education, politics, and literature. Each episode contains powerful insights to help us think about education in qualitatively different ways, translate theory into practice, and foster transformative change in how we do education. Producers Dr. Astrid Kendrick and Dr. David Scott would like to thank the generous support of the University of Calgary Teaching and Learning Grant program for making this project possible. We are also greatly indebted to founder of Voiced Radio, Stephen Hurley, for supporting this podcast series.

[Website](#) [RSS Feed](#)

Original Podcast Series can be found at <https://voiced.ca/project/ed-students-in-conversation/>.