
Online Ready: Designing Culturally Competent and Impactful K-12 Online Learning

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Abstract: *There is a lack of research that examines the link between teacher librarian preparation and online pedagogical training, beliefs, and practices as informed by community demographics and needs analysis. This research examines, assesses, and addresses the teacher librarianship knowledge gap on the design and delivery of targeted and culturally responsive online learning. This research is being conducted in three phases and this report of the YEAR 1 findings focuses on the research question: What is the influence of professional development (PD) on teacher librarians' knowledge related to online culturally relevant pedagogy?*

Keywords: *School library research, culturally responsive pedagogy, online pedagogy*

Introduction

Despite the school library profession's long-standing and prominent role in technology leadership and technology-enabled learning, as well as pre-pandemic growth in K-12 online education, the ability to design and facilitate fully online K-12 instruction is not an integral component of school library preparation programs (Green et al., 2017). The nation's abrupt pivot



to remote schooling due to COVID-19 highlighted this knowledge gap: teacher librarians had little time, support, or energy to acquire or deploy effective practices for culturally competent and inclusive online instruction, or digital environment development, despite having unique skills in technology tools and information literacy skills that help online learning flourish (McLaughlin & Resta, 2020).

Research Problem

While there is significant research exploring the teacher librarian's role in technology integration (Everhart & Johnston, 2016), as well as K-12 online teacher preparation (Archambault, et al., 2014) there is a lack of research examining the link between teacher librarian preparation and online pedagogical training, beliefs, and practices as informed by community demographics and needs analysis. This research examines, assesses, and addresses the teacher librarianship knowledge gap on the design and delivery of targeted and culturally responsive online learning. This research is being conducted in three phases and this report of the YEAR 1 findings focuses on the research question: What is the influence of professional development (PD) on teacher librarians' knowledge related to online culturally relevant pedagogy?

Literature Review

Culturally responsive programming is a pedagogical approach that “empowers students to maintain cultural integrity, while succeeding academically” (Ladson-Billings, 1995, p. 445). Culturally responsive programming acknowledges the strengths of students' diverse heritages, comprehensively using “cultural resources to teach knowledge, skills, values, and attitudes” (Gay, 2010, p. 34). Inclusion of personal culture is important because classroom culture is influenced by the explicit or implicit presence of several groups: students, teachers, school, and community. Teacher librarians must develop a strong sense of cultural competence in order to meet the needs of the diverse students they serve.

Hill and Kumasi (2011) describe a culturally competent teacher librarian as “an individual with the ability to understand and respect [students'] cultural differences and to address issues of disparity among diverse populations competently” (p. 2). Culturally responsive practice is not new, (Bellwether Education Partners, 2019; Council of Chief State School Officers, 2018; Darling-Hammond & Bransford, 2005) but it is understudied in online contexts. Scholars use



words like cultural broker (Darling-Hammond & Bransford, 2005) to define this emerging role for educators who decipher the needs of their learners and plan appropriate interventions and strategies. Librarians, by nature, are connectors and thus well-suited to do this work, connecting school culture, student needs, and learning goals. There is emerging evidence that teacher librarians, with training, can improve their cultural competencies when protocols or coursework are deployed (Hill & Kumasi, 2011; Kumasi & Hill, 2011). Given that videoconference-based online schooling necessarily inserts school culture into the home environment (Fontichiaro & Stephens, 2021), it is critical that online teacher librarians gain more understanding about their students' diverse backgrounds. Thus, for teacher librarians to build thriving online library portals and services, they need not only more pedagogical fluency but more cultural competency in serving others.

Methodology

This study utilized a pre/post-test quasi-experimental design to determine the influence of the professional development (PD) on teacher librarians' knowledge related to online culturally relevant pedagogy (Creswell, 2018). All participants were given a pre-test self-assessment survey as part of the registration process. While pre-test results help measure a starting point or the amount of pre-existing knowledge, skills, and abilities, the post test results served to measure the learning as a result of the implementation of the PD.

Recruitment

In order to reach a diverse mix of teacher librarian participants across the US, participants were recruited through national webinars, postings on national and state listservs, and through contact with professional organizations. Additionally, recruitment efforts involved direct contact with school systems, school library system coordinators, leveraging pre-existing contacts held by Co-PIs and Advisory Council members. There were 35 applicants. Potential participants filled out an application that was reviewed by the project Advisory Council via a rubric that included participant qualification criteria and a commitment statement. Nine participants were selected.



Online Ready PD

Three mini-courses that were developed for the Online Ready professional development: (a) Understanding community, (b) Culturally competent design of digital learning, and (c) Instructional design for online spaces. Each mini-course was scheduled for a 2-week period making the Online Ready professional development a 6 week program. Participants also had to fully design and develop an online learning product that they would implement during the upcoming school year.

Data Analysis

The quantitative data was analyzed using a paired t-test to evaluate the impact of the PD. SPSS was utilized to conduct a paired-samples t-test. Only eight of the nine participants finished the course and were considered for data analysis. A paired-samples t-test was utilized to determine if there were significant changes in the participants' knowledge and abilities.

Findings and Implications

This report of the research focuses on the findings from YEAR one of this project in order to determine the influence of professional development on teacher librarians' knowledge related to online culturally relevant pedagogy. On the pre /post test questions where participant were asked to rate their knowledge on understanding the needs and culture of their community, a paired samples t-test showed that the participant's level of knowledge increased from pre-program ($M = 3.57$, $SD = .916$) to post-program ($M = 4.35$, $SD = .297$; $t = -2.66$, $p > .32$, $d = -.940$). On the 16 questions where participants were asked to rate their abilities in designing online instruction, a paired samples t-test showed that the participant's ability in designing online instruction increased from pre-program ($M = 2.79$, $SD = .440$) to post-program ($M = 4.09$, $SD = .354$; $t = -7.28$, $p < .001$, $d = -2.57$). Then on the 12 questions where participants were asked to rate their knowledge on culturally responsive pedagogy, a paired samples t-test showed that the participant's level of knowledge increased from pre-program ($M = 3.01$, $SD = .678$) to post-program ($M = 4.23$, $SD = .436$; $t = -6.78$, $p < .001$, $d = -2.4$). Implications for teacher librarians and teacher librarian educators will be discussed in this presentation.



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Conclusion

The results of this project will establish foundational research on culturally competent school librarianship in K-12 online settings and impact both the scholarly and practitioner communities. Teacher librarian educators will benefit from research that informs the types of online pedagogical and cultural competency practices that should be part of preservice teacher librarian candidate preparation.



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Biographies

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